



TRADITION, MODERNISATION, AND EDUCATION REFORM IN BHUTAN: IRREDUCIBLE TENSIONS?

*Thesis submitted for the degree of
Doctor of Philosophy in Education*

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Trinity Term, 2014

Abstract

This exploratory study examines the modernisation of the education system in Bhutan. It focuses on three key dimensions of the modernisation process. The first dimension concerns the debates and discussions surrounding the question of modernisation. As is to be expected, there are strongly held views that modernisation is a ‘good’ thing for Bhutan; however, conversely, there exist equipotent views that traditional culture may erode in the quest for modernisation. The study seeks to tease out these contestations through the examination of available text, including oral texts such as radio discussions, written policy documents, newspaper articles, and conversations. The second key dimension of this study examines the translation of decisions from the aforementioned debate – it is significant that modernisation policies have already been shaped though the debate is ongoing – into the delivery of education. Thus, the study focuses both on curriculum policy as well as pedagogic strategies. Finally, the third key dimension focuses on the role of the teacher as a mediator. Here, the inquiry focuses on how teachers manage the tensions.

The primary purpose of this research is to contribute to our understanding of changes in Bhutan’s education policy and curriculum (1990-2010), which charge the education sector with supporting the continuity of tradition and mediating the tension between tradition and modernisation. There is a growing body of literature that examines Bhutanese discourses on tradition, culture, and modernisation of Bhutan’s education sector (see Phuntsho, 2000; Roder, 2012; Ueda, 2003; Wangyal, 2001; Whitecross, 2002). However, despite the comprehensive education reforms currently underway which position teachers at the centre of a number of initiatives (VanBalkom & Sherman, 2010), a gap exists in available studies that bring the voices of teachers to the fore. Given that teachers occupy a central role in the education system and that the implementation of curriculum innovations succeed ‘only when the teachers concerned are committed to them and especially, when they understand as well as accept, their underlying principles,’ (Kelly, 2009:15) this study is an exploration of interplay between policy and practice and considers teachers as the focal point.

This research was conducted in 2010 and 2011 in the Thimphu and Paro *dzongkhags*. It included semi-structured interviews with 9 prominent policy makers and politicians, 11 education leaders, and 51 middle secondary school teachers, 7 of which were observed. More specifically, this study tells the stories of individuals who were involved in the modernisation of the national system of education from its inception in the 1960s and uncovers the experiences of a younger generation of educators.

Overall, the findings of this study reveal that in Bhutan, traditional and modern epistemologies are strong currents that converge and intermingle. However, at particular points of intersection, they flow in two competing directions. Education stakeholders are thus positioned at a critical juncture where different knowledge ‘flows’ (Appadurai, 1996) converge and diverge, generating fracture lines and, at times, hindering the possibility of balance. The participants in this study revealed a range of complex and contradictory voices as many attempted to reconcile the evident tensions. (Word Count: 81,296)

This thesis is dedicated to Shirley Mae Robles (1953-2011).

Acknowledgements

Completing this thesis would not have been possible without the support of many people. I will acknowledge some of them here.

I am very grateful for the guidance of my two supervisors. Dr. David Johnson helped shape this thesis during my many years in Oxford. I would also like to thank Dr. Ann Childs for her encouragement, critical feedback, and the countless hours of tutorial time spent to help me structure, refine, and complete this thesis. Many thanks are also due the examiners who provided critical feedback at several stages of this study: Dr. Ann Childs, Professor David Phillips, Professor Amy Stambach, Professor John Furlong, Dr. Karma Phuntsho, and Dr. David Mills. I would also like to thank Dr. Richard Whitecross, Dr. Dolma Roder, Dr. Akiko Ueda, and Dr. Rieki Crins for sharing their expertise on Bhutan and offering advice at various stages of analysis and refinement of the chapters in this thesis.

In Bhutan, warm thanks are due to Ugyen Namgyel. Had I not met him, I'm not sure that this thesis would have been possible in its present form. His advice and friendship during my first year in Oxford and in Thimphu as well as his help making the fieldwork for this study possible were invaluable. I would also like to thank Tshewang Tandin at the Ministry of Education for facilitating my research in public schools. This study owes much to the many participants who invited me into their offices, schools, and classrooms and generously shared their time and experiences. Yeshe Penjor, Tashi, Kuenga, Lojin and many others must also be thanked for their friendship in Thimphu.

In Oxford, Osama Aldalahmah, Nabanita Deb, Venus Tsang, Jessica Chan, and David Jackson provided much needed friendship. I am thankful to the members of my study group in the Department of Education for their sharp comments on my work during our many study and mock viva sessions. I am also grateful to Carryn Yong and Marcos Calo Medina for taking time away from their own research to proofread the chapters in this thesis. Thanks are also due to Osama and his family and the doctors and nurses at an emergency room in Amman, Jordan, who ensured I was able to finish writing up this thesis.

Immense gratitude goes to my family – Arturo, Shirley, Leila, Mike, Faust, Gribis, Uncle Nomi and Uncle Bill – for their unwavering support and encouragement.

Finally, I wish to thank the Frederick Williamson Fund, the International Federation of University Women, P.E.O. International, and the American Association of University Women for providing funding necessary to help carry out this study and two phases of fieldwork in Bhutan. I am also grateful to Linacre College and Oxford University Careers Service for employing me during the last two years in Oxford.

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ACRONYMS

CAPSD	Curriculum and Professional Support Division
DCRD	Department of Curriculum Research and Development
EFA	Education for All
GNH	Gross National Happiness
ICT	Information Communication Technology
MOE	Ministry of Education
MSS	Middle Secondary School
NAPE	New Approach to Primary Education
UN	United Nations
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNICEF	United Nations Children's Fund



Adapted from CIA Factbook (2013)

Chapter One: Introduction to the study

1.1 Introduction to the chapter

This thesis explores the question of tensions between tradition and modernisation in the arena of education. ‘Tensions’ are conceptualized as forces that strain in opposite directions. Some may be resolvable; others might not. This study attempts to locate and typify tensions in two realms: (1) Education policy and politics and, (2) the curriculum. It also aims to understand teachers’ pedagogic strategies for addressing any tensions. Whether or not and how tensions might be mediated will be explored throughout this thesis. This study looks particularly at modern education in Bhutan; a country where policy suggests that tensions exist and has long articulated a ‘pressing need to achieve a balance or synthesis between the heritage of the past and a programme of modernization’ (Aris, 1994).

This study investigates the perceptions and experiences of political and policy officials, education leaders, and teachers in Bhutan – all of whom are charged with ‘striking a balance between progressive development and preserving the tested value system of a traditional society’ (Ministry of Health and Education, 2003: 8). The overarching aim of the study is to contribute to addressing the absence of research on the tensions in the discourse on the modernisation of education in Bhutan and, beyond this, to research on educational modernisation and curriculum re-orientations toward the accommodation of different epistemologies.

This chapter presents the rationale for this thesis; elaborating why the subject of this study merits theoretical and empirical attention. Described are the tensions that are brought about by processes of modernisation and how these are exacerbated within a climate of increasing international connectivity and rapid change. The implications of the tensions are correlated to the Bhutanese context. Next, the aims of the study and research questions are set forth. There follows an outline of the gaps and deficiencies in the contextual and theoretical literature. This chapter concludes by defining the key operational concepts in this thesis and summarizing the remaining chapters in the thesis.

1.2 Rationale for the study

In non-Western countries, a Western model of education introduces knowledges and views of the world that might differ from those considered traditional at the local level (see Sections 1.7, 3.2, and 3.3). As Boven and Morohashi (2002: 6) point out, ‘[traditional] sets of understandings, interpretations and meanings are part of a cultural complex that encompasses language, naming and classification systems, practices for using resources, ritual, spirituality and worldview’ (see Sections 1.7 and 3.3.1). An example of contrasting ways of knowing is provided by Le Grange’s (2007) research in South Africa. Le Grange (2007: 588) highlights that ‘the scientific perspective that lightening is caused by discharge of electricity between clouds or from a cloud to the earth is in conflict with learners’ cultural understanding that lightening is caused by, for example, witchcraft’. Similar discontinuities may exist in any country when there are ‘alternative explanatory modes or organizing metaphors for coping with experience’ (Ogunniyi, 1988: 2). This research queries what actually happens at points of contact

between different knowledges and worldviews in the arena of education where we might expect different ways of knowing to interact.

Some scholars suggest that educational and national modernisation has an effect at the individual level, ultimately influencing the knowledges and worldviews in a particular society (Ball, 1981; Carnoy and Samoff, 1990; Fägerlind & Saha, 1989; Ingelhart & Welzel, 2005; Shipman, 1971). This ‘modernising’ effect is reflected in increased literacy, social mobility, and movement away from rural areas and toward growing urban centres (Fägerlind & Saha, 1989). It can also be associated with the ideologies that underpin a Western model of mass education, which include the promotion of individualism, a view of ‘the nation as a society made up of individuals,’ and a belief in ‘progress’ (Ramirez & Boli, 1987: 10). These ideologies – or ‘myths’ in Ramirez and Boli’s (1987) words – are considered to contribute to the mobilization of national modernisation agendas as well as support political, economic, and cultural changes. With processes of modernisation and the implementation of a Western model of mass education, children inevitably spend more time in school and, as Coe’s (2005: 4) study on Western education in Africa demonstrates, ‘they generally have less opportunity to learn local knowledges, closely tied to complex local social relations and ecologies’.

Educational and national modernisation can also influence the knowledges and worldviews that hold currency in society (Portes, 1973: 249). Literacy in school knowledge may become a compulsory entry point into the job market and higher education and both of these may represent a pathway to a desirable life. Ingelhart and

Welzel (2005: 6) add that ‘as the work force shifts from the agrarian sector to the industrial sector, people’s worldviews tend to shift from an emphasis on traditional values to an emphasis on secular-rational values’. Accordingly, socioeconomic development and modern schooling can bring about changes in ‘what people believe and want out of life’ (Inglehart & Welzel, 2005: 20).

In addition to influencing ways of knowing in a particular society, modernisation agendas can disrupt the locations where traditional knowledges are situated, taught, and learned. Traditional ways of learning might occur outside of the classroom when young people engage experientially as they observe and interact with their communities (Bates, Chiba, Kube & Nakashima, 2009; Gutiérrez & Rogoff, 2003). As Bates and Nakashima (2009: 6) point out:

Changes to the social environment, generally brought on by the introduction of new technologies, lifestyles and market economies through colonisation and modernisation, undermine the transmission of ‘indigenous’ or ‘traditional’ knowledge. This process is often accompanied by the transformation of the natural milieu, for example when rainforests are converted to pasturelands, or valleys are flooded to become reservoirs, radically altering the arenas in which indigenous knowledge would be acquired and passed on.

However, this does not necessarily mean that traditional knowledges and culture deteriorate. In their work on a revised conceptualization of modernisation theory, of which national systems of education are part, Inglehart and Welzel (2005: ix) see modernisation as a humanistic process that is ‘shaped by an interaction between the forces of socioeconomic development and persisting cultural traditions’. It resists the

linear thrust away from tradition implied by modernisation theorists of the 1960s and 1970s and accommodates the possibility of confluence (or irreducible division) of traditional and modern epistemologies. Thus, this study seeks to explore if tensions emerge at the juncture of traditional and modern knowledges, ways of life, and views of the world when they interact in national education in Bhutan.

Over the past decade, there has been a surge of literature that recognizes the affordances for learning that ‘local wisdom’ offers to modern school curricula (e.g. Aikenhead, 2001; Ares, 2007; Gutiérrez & Rogoff, 2003; Jungck & Kajorsin, 2005, Lauer, 2009, Le Grange 2007, McGovern, 1999, 2000, Sarangapani, 2003; Semali & Stambach, 1997; Shizha, 2007; Thaman, 1993). Culturally based pedagogic approaches are acknowledged for their relevance toward helping students generate connections between ideas in school texts and locally constructed knowledges (Ares, 2007). Enabling learners to understand and assess different knowledges in relation to concepts learned in modern schools may also facilitate new information becoming part of a learners’ long-term memory (Le Grange, 2012). Attaining a degree of literacy or fluency both in the ‘texts’ of modern schools and those considered traditional enables learners to move with dexterity between the communities in which particular knowledges and worldviews are part (Aikenhead, 2001; Gutiérrez & Rogoff, 2003). Further, the ability to draw on different reservoirs of knowledge allows teachers and learners to ‘choose the one that better fulfils their goals at any given moment’ (Aikenhead, 2001: 350).

Volumes have been compiled that demonstrate the value of traditional epistemologies, particularly in communities where ways of life and ways of knowing are largely traditional. Bates and Nakashima (2009: 6) point out that ‘acquiring indigenous knowledge of how to navigate and survive on the land, and how to use local resources to feed, clothe and provide for one’s family, may be of much greater relevance for the contexts in which many indigenous groups continue to live today’ (see also Avalos, 1993). The ‘wisdom of the past’ may hold equal (or greater) utility than the modern knowledges taught in schools.

Nevertheless, even when a foundation is arranged to support the inclusion of traditional knowledges and worldviews into the school setting, achieving a balance within a modern school curriculum may be tenuous. Localized school materials and methods may remain predominantly embedded with Western ideas and images, potentially giving rise to tensions for teachers and students who have alternative explanations and views of the world. One might also speculate that a curriculum too heavily saturated with traditional content may hinder students from engaging in ways of living that are changing owing to modernisation and global connectivity. For example, a ‘too traditional’ curriculum may leave students insufficiently prepared to make a smooth transition into a modern jobs market (e.g. white-collar work) or tertiary education. Attempts to bring different knowledges into a national curriculum may be further complicated in countries with diverse ethnic, linguistic, and culturally and geographically isolated minority populations; ideas about what tradition means may be varied, uncodified and preclude formalised teachable concepts (Bates & Nakashima, 2009). Underpinning this study is the question

of whether or not it is possible for a modern curriculum to embody traditional knowledges and ways of understanding the world and ameliorate extant tensions.

Adopting Agrawal's (1995) *neo-indigenismo* stance, this thesis considers that indigenous or traditional knowledges and ways of viewing the world have something of value to offer. From this perspective, an ideal situation would be one in which traditional knowledges and worldviews are not forsaken, but rather are brought together with modern knowledges and views of the world with each benefiting from the other, i.e. a 'middle way' as suggested (yet unexplored in extant literature on Bhutan) in Bhutanese education policy (Ministry of Education, 2009, 2012). Following in this line of reasoning, a less ideal situation would be one where traditional knowledges and worldviews are forsaken in favour of those considered modern. The same would be true if people clung solely to traditional knowledges and worldviews. As Sillitoe (1998: 227) cautions, 'we need to guard against any romantic tendency to idealise [traditional knowledge]. It may be inadequate, especially in situations of rapid change'. What this study is interested in, essentially, is if these knowledge 'flows' (Appadurai, 1996) can be mediated and brought together in school curriculum.

In order to explore the role of education stakeholders as mediators between different knowledges and worldviews, a sociocultural conceptualization of knowledges as situated among people and communities, largely influenced by Rogoff (2003) and Lave and Wenger (1991), was adopted by this research. This view recognizes that particular ways of knowing are generated as people participate in different cultural communities that are

not static but continually change. This theoretical grounding is tied to a constructivist understanding that knowledge is socially constructed and in every society there exists multiple socially constructed ways of knowing (Robson, 2002: 27).

1.3 Tradition, modernization, and education reform in Bhutan: Contextual rationale

1.3.1 National rationale

My work as a teacher at a school in Thimphu in 2005–06 and subsequent study on modern education in Bhutan during a Master’s Degree in International Education (Robles, 2008), underpinned the focus of the present study – to understand an attempt by a national system of education to reform a modern curriculum to support the conservation and promotion of traditional knowledges and cultural heritage. Over time, I worked with students who aspired to a life in which education, white-collar work, and fluency in modern literacies were central. Nevertheless, in a school where the curriculum presented ideas that differed from some students’ ways of understanding the world, questions emerged about if and how tensions between these contrasting ways of knowing might be addressed. Upon my return to Bhutan in 2010 and 2011 to carry out the fieldwork for this thesis, the continuity of tradition and the imperative to continue shaping society in modern directions through the national system of education were a central part of education policy documents (Ministry of Education, 2009, 2012; Ura, 2009), and were also current in public discourse including local media (Tobgye, 2012). Significant educational and national changes were under way.

The structure of the government had radically transformed from a hereditary monarchy to a fledgling democratic constitutional monarchy when His Majesty Jigme Singye Wangchuck abdicated the throne one year prior to the start of fieldwork for this thesis. International contact was increasing and the nation was cautiously seeking engagement in the global knowledge economy – evidenced, for example, by the government’s planned construction of an ‘Education City’ which would house satellite campuses of foreign universities and create a centre for international academic collaboration. At the same time, the national system of education was undergoing reforms to align the curriculum more closely with the imperative of the development philosophy of Gross National Happiness (GNH), aiming to conserve the country’s traditional knowledges and cultural heritage while continuing to steer the curriculum toward international standards and include ‘the best in modern knowledge and technological developments from abroad’ (Education Sector Review Commission, 2008: 12). Highly visible in education policy text and everyday discourse were fervent attempts to balance change and the continuity of tradition.

However, the dynamic interplay between traditional and modern ideologies is not new. Bhutan is characterized by its long-held ‘policy of strict isolationism, both culturally and economically, with the goal of preserving its cultural heritage and independence’ (Balamurugan & Tobgay, 2008: 246). Distinguishing Bhutan’s path toward development is its relatively recent shift toward educational and national modernisation. As Phuntsho (2000: 98) writes:

Because of the fairly recent introduction of modernization and the historic isolation and conservatism that Bhutan maintained, the concepts of modernity, and of tradition as opposed to modernity, are relatively new to the Bhutanese. Nonetheless, the dichotomy of tradition and modernity, their conflicts and convergence [...] can nowhere be more vivid than in the sector of education and learning.

The imperative of national policy to carry forward the country's rich cultural traditions, while preparing its citizens to contribute to national modernisation, can be traced to a particular moment in 1961 when modern education was chosen deliberately by the Third King, His Majesty Jigme Dorji Wangchuck. As will be examined in detail in Chapter Two, a Western model of education ultimately represents the introduction of exogenous knowledges into Bhutan. While the national curriculum has been localized to various degrees, adopted thoughts, techniques, and imageries are part of the educational materials and approaches to teaching and learning used in Bhutan's Western style schools (Choden, 2008), potentially giving rise to tensions for actors in the educational sphere. Further to this, as Aris (1994: 9) aptly points out, Bhutan's modernisation paradigm, of which national education is part:

rests on the assumption [...] that those responsible for its implementation not only have the necessary discrimination to identify what is valuable and worthy of being preserved or introduced but also the practical ability to do so. Moreover, as development gathers pace and foreign contacts multiply in all directions, it is clear to everyone that the key issue of integration becomes increasingly complex, raising more and more questions and yielding far fewer and fewer answers.

This thesis, then, represents an effort to tease apart the strands of the interplay between policy and practice and to explore the evident tensions perceived by key stakeholders in the education sector about tradition and the modernisation of education.

1.3.2 Regional rationale

Understanding discourses on tradition and the modernisation of education in Bhutan calls for attention to not only the national, but also the regional context. In countries embarking on the modernisation process, ways of living often transition most rapidly from traditional to modern in urban areas (Shipman, 1971). This is strikingly apparent in Bhutan, where the thrust in government policy toward modernisation can perhaps be most clearly observed in the capitol city of Thimphu and its surrounding areas. A new class of increasingly cosmopolitan civil servants resides in Thimphu (Roder, 2012). Providing contrast, ways of life considered traditional are also visible, for instance, in some teachers' insistence that their students adhere to *driglam namzha*, i.e. the traditional code of conduct dating back to the 1600s and the time of the *Zhabdrung* (Chapter 2). Certainly, rural Bhutan is considered to be more heavily 'tradition-bound' than Thimphu. However, this study sought to explore the modernisation of the education system and, therefore, the Thimphu and Paro *dzongkhags* provided optimal proximity to both the seat of government and numerous secondary schools.

Economic activity is growing in Thimphu with 29.8% of the nation's establishments involved in economic activity being centred in the capitol (National Statistics Bureau, 2011: 107). The country's urban population stands at 196,111 and accounts for roughly 30% of the overall population of 695,822 (National Statistics Bureau, 2011). Numerous modern institutions including government offices, research centres, organizations promoting democracy, and secondary schools are centred in this area. Also located in Thimphu is the Ministry of Education and international organizations involved in

education (e.g. UNESCO). At the time of writing, the Department of Curriculum Research and Development (formerly the Curriculum and Professional Support Division), was housed in Paro, a dzongkhag located close to the capitol.

Regarding education, particularly at the middle secondary level, schools are accessible in terms of infrastructure in the Thimphu and Paro dzongkhags. There are six public middle secondary schools in Thimphu and three in Paro (Policy and Planning Division, 2010). The number of students enrolled in the national system of education through class 10, the last year of mandatory education, was highest in Thimphu schools with 25,682 students, while 10,678 students attended public schools in Paro (National Statistics Bureau, 2011: 46). Notably, the schools in these areas can be reached by motor transport. In contrast, in rural regions, schools are scattered geographically and poor road conditions – or an absence of roads and reliance on mule tracks and trails – would be prohibitive to the frequent data collection required by this study (Chapter Four). Thus, the factors described in this section formed a strong basis for selecting the regional research context of the Thimphu and Paro dzongkhags.

From the contextual considerations and the theoretical rationales that supported this thesis, emerge significant deficiencies and gaps in the literature. These will be explained in detail in the section below.

1.5 A need for more research and the significance of the study

This study has identified significant gaps and deficiencies in the contextual and theoretical literature. The gaps in the research on modern education in Bhutan and

deficiencies in the theoretical literature that this study attempts to address and the theoretical and empirical contributions this research aims to achieve will be explained in turn below.

Foremost, this study has identified a substantial lack of research on modern education in Bhutan, particularly studies that examine the different knowledges and worldviews that interact in the arena of national education. As Roder (2012: 1) points out, the gap in the research is significant because ‘social science is a new field of inquiry and scholarship to Bhutan’. There is historical literature (e.g. Aris, 1979; Aris & Hutt, 1994; Sinha, 1991; White, 1909) and emerging research on the contrasting purposes of traditional, monastic education and modern education (e.g. Phuntsho, 2000). There is also scholarship examining discourses on education, modernisation, and globalization with a focus on the views of young Bhutanese (e.g. Roder, 2012; Ueda, 2003) and interdisciplinary studies related to social changes associated with modernisation (e.g. Crins, 2008; Whitecross, 2002, 2008). Two edited volumes of essays have examined the changes in society brought about by modern education (Rennie & Mason, 2008; The Center for Education Research and Development, 2002). However, these volumes have not engaged with the broader interdisciplinary theoretical literature on education and modernisation, curriculum theory, and indigenous knowledge theories. There are studies by Childs et al. (2012) and Alison (2009) which suggest tensions between traditional and modern knowledges, particularly in the realm of science. However, there are no available studies which explore if and how traditional ways of knowing interact in modern Bhutanese classrooms, i.e. if this interaction elicits tensions, and, if so, how education stakeholders

address these tensions. This study offers different perspectives from previous research on Bhutan's modern system of education and a rigorous multifaceted empirical investigation of an area that has received little academic attention thus far.

There are also deficiencies in theoretical studies in four main areas: (1) the modernisation of education, (2) the adoption of Western education policies and practices in non-Western countries, (3) studies examining the implications of modernisation for school curriculum and, (4) the pedagogies teachers might employ to mediate between different knowledges and views of the world. First, other research on education and modernisation focuses on the cultural, political, and economic changes associated with the development of Western education systems to mobilize modernisation agendas (e.g. Fägerlind & Saha, 1989; Inglehart & Welzel, 2005; Shipman, 1971). However, what remains underspecified in studies examining modern systems of education – often introduced through modernisation or colonization – in non-Western countries, are the associated tensions and the ways these present across the levels of state education. Developing a comprehensive understanding of the fracture lines is crucial in order to bring policy into closer alignment with practice. This thesis contributes to the body of literature on education and modernisation by taking focus on the experiences of key actors across the educational sphere.

Second, there is considerable research on education policy formulation (e.g. Ball 1998; Ball & Bowe, 1992; Cowen, 1996) and on the global spread of Western education policies and how educational practices considered 'successful' in other nations are

adopted, adapted and sometimes resisted (e.g. Johnson, 2006; Grigorenko, 2007; Haplin & Troyna, 1995; Spreen, 2004; Steiner-Khamsi, 2000; Ochs & Phillips, 2004). These policy discussions, however, often overlook how much awareness education policy makers themselves possess about the different ways of knowing that come into contact in the classroom and focus more on, in Ochs and Phillips' (2003: 452-53) words, the 'impulses' behind the use of 'foreign examples' to 'solve existing or emerging or potential problems' in education systems.

Third, research has been conducted on traditional, cultural, or indigenous forms of knowledge and how these might support modern school curriculum with regards to teaching and learning (e.g. De La Piedra, 2009; Le Fanu, 2012) or engender tension when modern school curriculum is misaligned with the local setting (Carney & Rappleye, 2011). There are also studies conducted by international organizations which examine the utility of traditional knowledges for educational and national development (e.g. Boven & Morohashi, 2002; Bates et al. 2009). Recent works by world culture theorists examine how the curriculum of schools that are based on a Western educational paradigm spread 'global norms' which impact traditional ways of knowing. This line of scholarship gives attention to how Western modeled schools are adapted in local settings (see works compiled by Anderson-Levitt, 2005). There is also vast scholarship on the crucial role of the curriculum in both conserving culture and national values and the preparation of young people for modern life, including movement into the workplace or tertiary education (e.g. Aronowitz & Giroux, 1991; Giroux & Simon, 1984; Bruner, 1996; Kelly, 2009). Again, research probing the awareness of individual stakeholders about what

actually happens at points of contact between these sometimes competing purposes in contemporary educational settings is limited.

Fourth, there is research that examines the value of accommodating traditional knowledges through teachers' pedagogic approaches in modern school settings (e.g. Thaman, 1993; Flinn, 1992; Ares, 2007). Numerous studies have been carried out in the field of science education that demonstrate the affordances of making connections between learners' existing traditional understandings and modern scientific knowledge, particularly in African contexts (e.g. Gallard & Gallagher, 1994; Ogunniyi, 1988; Shumba, 1999; Yakubu, 1994). Sociocultural research examines more broadly the utility of capitalizing on the knowledges and skills extant in learners' homes and communities (Rogoff, 2003; Gutiérrez, Baquedano-López & Tejada, 1999; Phillips et al. 2004; Greenberg & Moll, 1998; Lave & Wenger, 1991). However, what actually happens when different knowledges and worldviews meet in the school setting remains under researched. As mentioned above (see Section 1.2), teachers and students may have alternative knowledges and ways of thinking about the world, particularly in locations with rich traditional knowledge bases. This study recognizes that we do not know enough about what occurs in the classroom when one explanation contradicts the other. If and how teachers select from and employ alternative ways of knowing to enable connections to be made between modern school knowledge and traditional ways of knowing is an area that remains under researched.

Having established the gaps in the literature, there are three key theoretical and empirical contributions this research aims to achieve. First, understanding the tensions between traditional and modern ways of knowing and how these present across three key dimensions of the education sector will make a significant contribution toward understanding how education policy can be brought into closer alignment with classroom practice. This study has collected perspectives on the tensions between traditional and modern ways of knowing relative to the national system of education from political and policy level actors, education leaders, and a view from inside the classroom – a perspective absent from previous studies on education in Bhutan. This study explores the experiences of stakeholders in the modern education sector and queries if tensions have emerged in the process of adapting a Western model of schooling in the context of Bhutan. Understanding the views of education stakeholders may provide meaningful implications for present and future education reforms in Bhutan.

Second, this thesis analyses the disparate perceptions of traditional and modern knowledges. By exploring how participants understand these key concepts, this thesis may contribute to understanding the tensions between traditional and modern epistemologies and the construction of a ‘shared meaning’ (Fullan, 2009) among stakeholders. As a result, the findings of this thesis may encourage cooperation across the various levels of the educational sphere and contribute to the bridging of the gap between policy and practice.

Finally, this study highlights the role of traditional knowledges in a modern system of education. By providing a window into the everyday experiences of education stakeholders, this study explores whether they encounter different ways of knowing and how they address extant tensions between traditional and modern epistemologies through their work. In doing so, this study emphasises the pedagogies developed by teachers in Bhutanese classrooms to mediate between different knowledges and worldviews. Additionally, this study offers new knowledge on Bhutan and a new example to the international literature on how teachers' pedagogic approaches toward accommodating different epistemologies by examining if and how traditional knowledges are incorporated into modern lessons and the rationale for doing so or not.

These gaps in the research led to the formation of the study's research questions and aims which will be set forth in the section below.

1.6 The study

1.6.1 Aims of the study and research questions

The overarching aim of this study is to explore and develop an understanding of the tensions evident in the discourse on the modernisation of Bhutan's educational system at the policy level and, building on this foundation, examine the observable tensions in the translation of policy and discourse into practice. The following three research questions emerged from these considerations:

- (RQ1) At the political and policy level, what tensions are evident in the discourse on the modernisation of the education system in Bhutan?
- (RQ2) At the level of the curriculum, what tensions are observable in the translation of discourse and policy into implementation?
- (RQ3) How do teachers mediate the tensions?

1.6.2 Approach to the study

A qualitative approach is employed for the purpose of exploring the nuanced perspectives of individual education stakeholders and examining if tensions exist in the discourse on the modernisation of education (see Chapter Four). The study seeks to typify and locate tensions in the realm of policy and politics as well as in the realm of the curriculum. It then attempts to identify teachers' pedagogic strategies for mediating tensions inside the classroom. These aims are approached by analysing historic and contemporary literature in the context of Bhutan and by interviewing actors at different levels of the education system and observing teachers' classroom practice. An interdisciplinary set of theoretical perspectives forms a theoretical lens through which the empirical data is analysed (see Chapter Three).

First, the tensions brought about by educational modernisation are examined (e.g. Fägerlind & Saha, 1989; Inglehart & Welzel, 2006; Shipman, 1971). Considering the contemporary climate of increased international connectivity, concern is paid to global 'flows' of knowledge and the sometimes disjunctive impact of these on attempts to balance the 'old' and the 'new' (Appadurai, 1996). Attention is also given to literature examining the role of the curriculum in conserving the culture of society while preparing students to engage with modern life (e.g. Bruner, 1996; Kelly, 2009). Given that different

knowledges and views of the world exist, this study asks if tensions emerge between school knowledges in textual form (e.g. school curriculum, syllabus, class texts) and traditional epistemologies and how the fissures might be mediated. Two strands of literature allow this line of inquiry to be explored. The first examines the contrasts between traditional knowledges and the materials of modern Western style schools. The second strand enables the examination of mediation pedagogies. Here, literature on culturally relevant forms of pedagogy and the ‘funds of knowledge’ employed when teachers navigate different ways of knowing is explored (e.g. Rogoff, 2003; Gutiérrez et al., 1999; Greenberg & Moll, 1998).

The three research questions are also addressed through investigation of the realities of individuals from across three layers of the educational sphere. Adopting Bronfenbrenner’s (1979) ecological perspective allows an inclusive analysis with attention to the interplay between the macro (policy level), exo (level of educational leadership), and micro (classroom teachers) layers with recognition of factors exogenous and endogenous to the educational sphere (see Section 4.13).

1.7 Definition of key terms

In order to explore if tensions exist between the traditional and modern epistemologies that might interact in Bhutan’s education system, a brief clarification of the key terms deployed in this thesis is necessary. These terms and their associated problems and limitations are described in more detail in Section 3.3.1. This thesis recognizes that these terms are contested and reify binary relationships. However, they enable discussion of concepts that are embedded in policy and curriculum framework documents and, most

importantly, were understood and used by the participants in this study. Working definitions are provided here.

In this study, ‘modern education’ refers only to the public system of formal education provided by the state. As mentioned above, this education system was implemented in the 1960s under the Fourth King, His Majesty Jigme Dorji Wangchuck (see Section 2.3.1). Having been modelled on ‘British independent schools,’ the ‘modernness’ of the national system of English-medium education was characterised by its external origins, including its use of Western materials and methods which were imported directly from the West or by way of India (Collister, 1991: 13). Thus, the term ‘modern knowledges’ denotes knowledges that are largely exogenous, generally concerned with analytic representation, ‘globally situated,’ and less context bound than traditional epistemologies (Sillitoe, 2010: 13)(see Section 3.3.1).

Defining ‘tradition’ is complex (see Section 3.3.1 for details). By ‘traditional knowledges,’ this study refers to locally situated knowledges that are ‘*continually influenced by internal creativity and contact with external systems*’ (Shizha, 2007: 304). In this study, traditional knowledges are considered dynamic and are not bound in a polarized relationship with other forms of knowledge (Agrawal, 1995). A distinction is to be made between knowledges and ‘worldviews’. While there are bodies or stocks of knowledge considered by the participants in this study to be traditional (e.g. driglam namzha, Buddhist scriptural knowledge, and the traditional system of medicine), in this study, traditional knowledges are considered rooted in a ‘worldview’. Liu and Lederman

(2007: 1283), analysing Kawagley et al. (1998) define a worldview as: *‘a collection of values and beliefs that forms the frame of reference for a group of people to make sense of the world’*. This study considers that individuals’ ways of thinking about and understanding the world are produced within particular ‘sociocultural, agroecological,’ and ‘political and economic settings’ (Semali and Stambach, 1997: 6). These settings are part of ‘culture’. The term ‘culture’ is conceptualised here as *‘the way of life of a discrete group of people, including its body of accumulated knowledge and understandings, skills, beliefs and values’* (Thaman, 1993: 249). In this study, culture will refer to the knowledges and ways of viewing the world that are situated in a particular community. In referring to ‘culture,’ this study focuses on ‘people’s participation in their communities’ cultural practices and traditions, rather than equating culture with the nationality or ethnicity of individuals’ (Rogoff, 2003: 3).

In addition, the term ‘mediator’ implies that the participants in this study held intermediate positions between different knowledges, ways of life and worldviews (adapted from Oxford English Dictionary, 2007).

1.8 Structure of the remaining chapters in this thesis

For the purpose of guiding the reader through the thesis, the structure of the remaining eight chapters will make up the final section of this introductory chapter.

Chapter Two demonstrates how the three research questions evolved by examining the historic and current elements influencing curriculum reform in Bhutan. This chapter reviews the historic and contemporary cultural aspects that have influenced curriculum

and educational reform as a whole in Bhutan, including, *inter alia*, its primarily Buddhist population, major transitions in government from theocracy to monarchy to democratic monarchy, and the shift in education from a solely monastic system to the development of a secular, modern system now prevalent in terms of social attention and enrollment. This chapter examines how curriculum reform has been driven by modernisation and highlights the key initiatives aimed at ‘balancing’ traditional culture with planned development. Relevant literature is drawn from several layers. One layer includes relevant historical literature and articles. In another layer are government documents on education policy, official curriculum plans, reports and studies from local education and international organizations, and school procedural documents. This chapter will show that Bhutan – with its strong thrust in policy toward ‘balancing’ cultural conservation with planned modernisation – provides an ideal setting in which to examine the modernisation process in education policy and practice. The interdisciplinary and historical literature provided in this chapter will provide an understanding of the modernisation of the educational arena and indicates aspects of education that call for further theoretical exploration in order to understand the current tensions in the discourse on the modernisation of Bhutan’s education system as discussed subsequently in Chapter Three.

Chapter Three continues the debates set out in Chapter Two, which indicate aspects of the educational system that play a crucial role in modernisation, and provides a review of current extant literature which will guide the theoretical and empirical exploration of the extant tensions between tradition and the modernisation of education in this study. This includes discussion of literature on education, modernisation, and the global spread of the

Western educational paradigm. The review also examines literature on the relationship between traditional knowledges and the curriculum of Western forms of schooling, including studies which focus on the tensions that emerge in science. Consideration is given to concepts of traditional and modern knowledges. This chapter also examines the implications of modernisation and curriculum change for teachers. The literature presented here will consider what teachers, as front-line agents, experience in the classroom. In particular, this chapter will provide a review of socio-cultural perspectives relevant to how teachers might mediate the tensions between different ways of knowing.

Chapter Four describes the qualitative approach employed in this study to understand the discourse on the modernisation of the education system from the views of three key groups of stakeholders in Bhutan's education sector. This chapter begins with an argument for the use of qualitative methods. There follows a summary of the pilot study. After which is an overview of the research design, questions, and discussion of access issues navigated throughout the study. Subsequently, the criteria guiding selection of participants and research sites are detailed. Data collection techniques – i.e. in-depth interviews and observations of a sub-set of teachers – are outlined and the role of reflexivity in this research is discussed. Cross-cultural issues, which affected several aspects of the study, are set out and the methods of addressing these are then described. A description of the analytic approach to data analysis concludes this chapter.

Chapter Five is the first of three findings chapters in the study, all of which will be similarly structured in order to systematically explore the language of tension and

contradiction deployed across three groups of stakeholders. While Chapters Two and Three set out why tensions emerge in processes of educational modernisation and why Bhutan presents an ideal setting for exploring the tensions, Chapters Five, Six, and Seven turn to the actual tensions perceived from stakeholders across three levels of the education sector. This chapter examines the tensions in ambit of politics and policy (i.e. the macro-layer). Illuminated are the historically informed perspectives of political and policy level stakeholders, many of who have been engaged with modernisation of education – and the nation as a whole – since the 1960s. Throughout these findings chapters, relevant literature that contributes to the understanding of data is referred to and discussed.

Chapter Six describes the tensions perceived in the translation of policy into the living and designed curriculum (i.e. the exo-layer). This chapter draws on interviews with education leaders and teachers, all of who are active interpreters of education policy. Here, the perspectives on the tensions from 51 class ten middle secondary school teachers and 11 education leaders, which comprise of curriculum developers and decision makers, principals and vice principals, and a teacher trainer are examined. Their perspectives are important and relevant as they are all each charged with translating education policy into school curriculum. This chapter also considers the different interpretations about *why* the tensions exist despite the call of policy to achieve a balance of traditional and modern ways of knowing in the education system.

Chapter Seven moves into the center of the educational sphere, the classroom, or micro-layer and reports how teachers respond to the tensions and contradictions that were evidenced in Chapter Six. This chapter queries the role of the teacher as a mediator and focuses on how teachers, as front-line agents, manage the tensions and contradictions based on their own understanding of the modern and the traditional. Through an analysis of the interviews with teachers from across the curriculum subjects as well as an analysis of the data generated through observations of a sub-set of seven science teachers, Chapter Seven presents the findings from the afore mentioned interviews, buttressed by observations of science teachers, which show how the discontinuities and tensions are addressed. Having presented the findings, the next chapter presents a critical analysis of these findings.

Chapter Eight, the analysis chapter, examines critically the findings from across the previous three chapters. In light of the literature reviewed in Chapters Two and Three, and the empirical findings presented in Chapters Four, Five, and Six, the analysis presented in this chapter elaborates on the complex and sometimes contradictory nature of participants' voices. In order to bring focus to the complexity of the evident tensions, this chapter provides an analytic account of the tensions in the discourse on the modernisation of national education in Bhutan by looking across three levels of the educational sphere. This chapter synthesizes the findings, analyzing these critically against the extant literature, and addresses all three of the research questions before turning to the final chapter of this thesis.

Chapter Nine, the concluding chapter and culmination of the thesis, summarizes the key findings, which address the three research questions put forth in this thesis. A critical analysis of the data across the three groups of participants will provide the convergences and divergences across the three groups of participants and will set out the theoretical claims, thereby deepening understandings of the role of education in the mediation of tension between tradition and modernisation. Here, the divergences and convergences of themes that emerged from the three preceding chapters are discussed in relation to the literature and theory set out in the second and third chapters. The methodological challenges and limitations to the findings are discussed and some areas for future research will be provided.

* * * * *

Having provided an overview of the study, the next chapter, Chapter Two, examines the literature on the development of modern education in Bhutan.

Chapter Two: Historical overview of education and modernisation in Bhutan

2.1 Introduction to the chapter

As was indicated in the introductory chapter, the theoretical literature this study draws upon examines multiple layers and discourses to unravel the tensions associated with the modernisation of education in Bhutan during a time of rapid change. Before approaching the theoretical framing of the study, it is important to first provide a background to the discourses on tradition, modernisation, and education in Bhutan. This chapter, therefore, describes aspects of the socio-cultural and historical context that influenced the development of the modern system of education. First, this chapter will briefly describe the context in terms of location and population. Monastic schooling, which was the only formal education offered inside Bhutan prior to the late 1950s, is examined next. The subsequent section traces the history of the modern system of education, i.e. the public system of secular schooling. Finally, some of the salient aspects of contemporary life which are understood to be integral to framing the present study are discussed – namely, the formal introduction of television and the Internet in 2001 and the transition in national leadership from monarchy to democratic monarchy in 2008. This chapter also points to the lack of research which examines how policy and discourse unfold into curriculum implementation and brings the voices of teachers to the fore.

2.2 Bhutan: overview of the setting

Bhutan is a landlocked country positioned in the eastern region of the Himalayas amidst rugged, mountainous terrain between China and India. Much of the literature on Bhutan draws attention to its geographically isolated location and national policies directed at

restricting foreign influence – thus, generating the image of a culturally secluded country (e.g. Balamurugan & Tobgay, 2008; Collister, 1991; Crins, 2008; Sinha, 1991; Solverson, 1995). As scholars such as Crins (2008) maintain, the geography and isolationist policies enabled Bhutan's rich traditional culture to develop relatively undisturbed by external influence (c.f. Whitecross, 2008). Further distinguishing the history of the country is the absence of rule by any foreign power after its establishment.

Political unity was established by Zhabdrung Ngawang Namgyel (1594-1651), a Tibetan abbot (Wangyal, 2006) whose efforts to unify the state were 'religiously inspired' and 'a fulfilment of a higher prophecy' (Ura, 1994: 26). Under the Zhabdrung, Bhutan was governed as a theocracy whereby rule was carried out under divine guidance. The main function of the state was to support the Mahayana Buddhist religious order. As White (1909: 103), a British political officer who visited Bhutan in 1905, wrote, Buddhism was 'all in all with the Bhutanese'. Ura (1994: 26) further maintains:

The state was the main organ of the principal religious preceptors: the Shabdrung, his reincarnations, the head of abbots of Bhutan and many other high lamas. In the Mahayana Buddhist tradition, such preceptors are divine Bodhisattvas in human form, and are, in principle, accorded higher status than temporal rulers who are simultaneously their students and patrons. The secular and the religious often become indistinguishable.

It is the sense of reverence held for the Zhabdrung and the view of the state leader as guided by deific force that seems to permeate contemporary public discourse about the Wangchuck monarchy, the rulers who came into power in 1907.

During the time of the Zhabdrung, ‘dance, drama, secular philosophy, meditation, pharmacology, astronomy, astrology, poetry, metallurgy, and printing’ were developed under the religious order (Ura, 1994: 26). Along with these was the development of *driglam namzha*, a code of conduct and values associated with the Zhabdrung’s efforts to forge a ‘distinct national identity’ (Whitecross, 2002: 71). Bhutanese values associated with tradition are ‘guided by *driglam namzha* (code of behavior or discipline), *tsawasum* (King; the government and kingdom), *tha damtshig* (loyalty), and *le judre* (karmic action retribution, cause and effect)’ (Crins, 2008: 81). Social relationships and conduct are organized around these values. Moreover, they define what is and is not acceptable in Bhutanese society. *Driglam namzha* not only sets out rules for ‘wholesome’ behaviour, but also outlines morals, values, and rules for dress (Dampa & Tenzin, 1999). The traditional style of dress (i.e. the *kira* for women and *gho* for men) was instituted during the Zhabdrung’s rule and remains the mandatory dress code in government offices, schools, and in most professional settings.

It is thoroughly documented in the literature that ways of life in Bhutan remained largely unchanged since the time of the Zhabdrung (e.g. Aris, 1979; Aris & Hutt, 1994; Crins, 2008; Rutland, 1999; Ueda, 2003; White, 1909). As Rose (1977: 211) notes, ‘the social structure, value system and life style of the Bhutanese did not differ very much from that of their ancestors around 1500’. Rutland (1999: 284), the former tutor to the Fourth King, describes Bhutan prior to modernisation as:

a virtually unknown kingdom, with no roads, no telephones, no mail service, no airports, and virtually no shops. The economy was almost entirely based on barter. Health care was primitive or non-existent, schooling was confined to the monasteries.

As will be discussed in greater detail in the findings chapters of this thesis, the senior participants in this study experienced this ‘pre-modern’ way of life prior to the social, economic, and political changes associated with planned modernisation.

2.2.1 Population: ethnic and linguistic diversity

Bhutan’s population currently stands at 695,822 (National Statistical Bureau, 2011) with 104, 214 residing in Thimphu, the country’s largest city (“Thimphu Dzongkhag,” 2010). The literature thoroughly documents that Bhutan’s dominant culture is associated with that of the Northern Bhutanese and the *Drukpa* tradition, yet the population is composed of a plurality of ethnic, linguistic, and religious groups (Hasrat, 1980; Mathou, 2000; Pommaret, 2009; Whitecross, 2002).

Here, it is relevant to draw attention to the diversity of the population because an underlying theme of this thesis concerns participants’ conceptualizations of tradition which sometimes were equated to ‘Bhutanese culture’ or ‘tradition’. As Hasrat (1980) maintains, the socially prominent section of the population are of Tibetan origin. This group is positioned as the ‘predominant element of national and political life in Bhutan’ (Hasrat, 1980: 17). Accordingly, ‘Bhutanese culture and tradition’ often refers to that of this dominant group. However, minority groups are spread out across the country, e.g. the *Lhop*, *Monpas*, and *Brokpas*. The residents of south-western Bhutan are mainly of Nepali origin and are known as the *Lhotshampa*. Hasrat (1980: 17) highlights the diversity of the *Lhotshampa*. He maintains the *Lhotshampa* represent numerous ethnic groups, including the *Rais*, *Gurings*, *Limbus*, *Bahun*s, *Chettris*, and *Tharus*. The religious beliefs and languages spoken across these populations differ.

Along with a diverse population, Bhutan also has a rich and varied linguistic landscape. Van Driem (1994) indicates there are nineteen languages in Bhutan which can be subdivided into four main language groups: 1) Central Bodish, 2) East Bodish, 3) Bodic languages of the Tibeto-Burman family, and 4) an Indo-Aryan language. The national languages of Bhutan are English and *Dzongkha*. The latter recognized as ‘a linguistic repository of the country’s rich cultural heritage and it is a medium through which the country’s culture, tradition, law, spirituality, and politics are carried forward’ (Ministry of Education, 2012: 18).

Considering Bhutan’s ethnic and linguistic composition, as Whitecross (2002) maintains, conceptualizing the country’s residents as homogeneously ‘Bhutanese,’ i.e. belonging to one distinct ethnic group, is to ignore the diversity of the population. However, following Whitecross (2002), this study will refer to its participants as Bhutanese rather than by their specific ethnic or linguistic affiliations for the ease of distinguishing respondents who were Bhutanese citizens from the foreign educators who held Indian citizenship.

2.3 Educational development in Bhutan

This section will outline the history of traditional education in Bhutan before describing the emergence of the modern system of education. It is necessary to first explain the distinguishing features of traditional education because recent reforms in the national system of modern education centre on the inclusion of traditional elements of Bhutanese culture, some of which are related to monastic schooling. Furthermore, as stated earlier, Bhutan has a distinct history that has influenced curriculum change and education reform as a whole – characterized by the shift in education from solely monastic to the

development in the late 1950s of a secular, modern system which is now considered highly prevalent in terms of social preference and total enrolment (Wangyal, 2006). It merits mention that while the literature on traditional and modern education in Bhutan refers mainly to monastic and Western-style schooling, Penjore (2005: 51) describes a traditional non-formal education among Bhutan's agricultural communities:

Farmers use the oral tradition to express their ideas, values, norms, beliefs, superstition, culture (or indigenous knowledge system), and to pass them onto their children orally, and through active participation in and passive observation of both formal and customary socio-religious, cultural and political institutions and events. They have used this indigenous learning system to acquire and acquaint with the local knowledge required for interactions with man, nature and spirits.

Penjore (2005) asserts that this non-formal form of education exists today primarily in rural areas and is associated with the traditional knowledges of Bhutan. As will be described in Chapters Five, Six and Seven, the particular knowledges described by Penjore (2005) emerged in the Bhutanese classrooms in this study. Both the non-formal knowledges and education described by Penjore (2005) and monastic schooling are associated with a traditional past seen by some scholars to be giving way to modern life (Phuntsho, 2000; Ueda, 2003; Wangyal, 2006). As Wangyal (2006) posits, '[w]hile it was every parents' wish to send at least one son to become a monk earlier, it is the dream of every parent, today, to see that his or her children complete college education and become a "graduate.'" A university degree is now considered essential toward the pursuit of a desirable job and a comfortable life (Roder, 2012).

In order to understand the broader shifts in Bhutan's educational landscape, the next section sets forth the features of traditional monastic schooling in terms of its purpose and function in Bhutanese society and its curriculum. Against this backdrop, the subsequent sections will review the literature related to modern education in Bhutan.

2.3.1 Traditional education

Religious education has a long and rich history in Bhutan. As Dorji (2008: 18) points out, the visit of Padmasambhava, an omniscient saint from the Swat Valley of what is now considered Pakistan, to Bhutan in AD 746 and is considered to have influenced the 'social and cultural life of Bhutanese people, particularly those in Bumthang through his teachings'. While his visit may have contributed to the development of an early form of religious education, there is agreement in the literature that the monastic system of education can be traced to the establishment of political unity in Bhutan under Zhabdrung Ngawang Namgyel. Under the rule of the Zhabdrung, a Central Monk Body was established for the purpose of providing formal education in 'Buddhist philosophy, liturgical chanting, dialectics and linguistics' (Stiles, 2009: 61). The monastic system of education is referred to in the literature and by participants in this study as the traditional system of education.

As Pommaret (2009: 104) points out, there are two main religious schools in Bhutan: (1) the *Drukpa*, which translates to 'those of the Thunder Dragon, a branch of the Kagyupa or '[f]ollowers of the oral transmission,' and (2) the Nyingmapa or 'Elders'. While they adhere to similar doctrinal principles, Pommaret (2009) maintains they differ 'in their interpretation of the doctrine, in the importance they give to intellectual knowledge as

against religious practice, in their attachment to particular texts rather than others, and in the way they perform rituals’.

While there is variation within the monastic system, as a whole it can be considered to contrast in content and purpose from the secular, modern system. Prior to the late 1950s, there were no Western style schools in Bhutan and the monastic system were the only formal systems of education in the country (Rutland, 1999). As of 2010, there were 207 monastic training institutes with a total enrolment of 7,363 (National Statistical Yearbook, 2011).

2.3.2 The curriculum of traditional education in Bhutan

The focus of traditional, monastic education was not on formal curriculum, but rather on informal lessons in philosophy, ritual, and meditation techniques, which formed the core of the curriculum (Phuntsho, 2000). Students attained literacy in *Chöke*, a script used mainly for memorizing religious texts. *Chöke* was reserved for liturgical purposes and for authoring legal documents (Gyatsho, 2004; Roder, 2012; van Dreim, 1994). In addition to learning *Chöke*, monks also studied written and spoken Dzongkha, which was used for daily communication. The traditional curriculum also included training in the arts, such as music and dance, painting, embroidery, and carving (Collister, 1988). Students could also pursue studies in ‘astrology and astronomy, numerology and mathematics, calculation, book-keeping and accounting’ (Collister, 1988: 13). Upon completing a monastic education, monks were qualified to perform necessary rituals in households and monasteries. A monk’s service to his community included ‘offering basic education, healing people, governing the village with village elders and providing moral and ethical

guidance based on Buddhism’ (Ueda, 2003:331). Pommaret (2009: 105) adds that the role of a trained monk is to ‘give laymen spiritual support and help in performing acts of piety correctly’. In this way, the monastic curriculum combined didactic religious instruction and practical training. As Phuntsho (2000) aptly points out in Table 1, the pedagogy, function and content of traditional training are generally dissimilar to modern education.

Table 1: Contrasts between traditional training and modern education

	Traditional Training	Modern Education
Purpose:	Mainly Introvert Spiritual Training culminating in Omniscience	Mainly Extrovert Skills for Human Development
Content:	Religion or Religion Oriented, Liberal	Secular and Scientific, Technical
Approach:	Mostly Passive Reception, Static, Conservative	Mostly Innovation, Creative, Progressive
Perspective:	Faith, Reverence, Sanctity, For Religious Edification	Interest, Curiosity, Rationality, For Acquiring Knowledge and Skills
Medium:	<i>Chökey/Dzongkha</i>	English
Methodology:	Buddhist monastic methods of memorization, debates, contemplation, exposition, etc.	Systematic Western educational techniques of critical scrutiny, statistics, experiments, etc.

(Cited from Phuntsho, 2000: 100)

Monastic education was, however, limited in terms of its curriculum and enrolment. The singular purpose of the monastic curriculum was to prepare students to become monks. Furthermore, admission into monastic institutions was, according to Penjore (2005), not

widely available and undertaken mainly by students from ‘privileged’ families. Prior to planned modernisation, parents endeavoured to ‘send at least one son to become a monk’ (Wangyal, 2006: 118). Restricted not only in terms of enrolment, but also in terms of gender – monastic training was offered primarily to males. Penjore (2005: 51) asserts that ‘[w]omen were excluded, with the exception of a few nuns’. Roder (2012) and Zangmo (2009) stress that the religious training provided to nuns was of a lower quality than the education provided to monks. Upon completion of training, monks were considered well educated and held prominent positions in society and were also qualified to undertake roles in the government. In contrast, educated nuns ostensibly held a lower status and were ineligible to engage in religious or political affairs (Roder, 2012; Zangmo, 2009). Thus, modern education expanded educational opportunities for Bhutanese citizens – particularly for women.

2.3.3 The emergence of modern education

Aris (1994: 10) notes that shift from a traditional theocracy to a monarchy in 1907 marks a change in the function of the government away from ‘maintaining the institution of religion’. Following this transition, the Buddhist ideology of the country remained intact, however, the primary function of the state was no longer solely religious. The government took on a new purpose – that of guiding the nation toward development and shifting away from decades of self-imposed isolation from the outside world. Thus, the country’s planned development activities required an education system that would support national development as discussed in further detail below.

Developing the infrastructure of modern education: 1960s – 1971

Initially, the decision to adopt a Western system of schooling was intimately tied to the commencement of modernisation. In Bhutan, planned modernisation can be traced to the rule of His Majesty Jigme Dorji Wangchuck who led the country from 1952–1972. He was known as the ‘father of modern Bhutan’. Much of the literature considers His Majesty’s reign as a critical turning point. Ura (2010: 59) sees his reign as ‘the watershed between Bhutan as it was – and Bhutan as it would be in the future. His reign marked the true crossroad or juncture for Bhutan’. His Majesty sought to ‘achieve a balance and synthesis between the heritage of the past and a programme of modernization and reform’ (Aris, 1994: 9). Indeed, the literature is steeped in both visions of ‘progress’ and the continuity of age-old traditions. While 1961 marks the year the first Five Year Plan (1961-66) for development was rolled out, Ura (2010) demonstrates that political and social changes began taking place in the 1950s. Bonded labourers were set free, commodity taxes were converted to cash taxes, a National Assembly was established in 1953, and a series of laws were developed. Building on these social and political changes, the First Five Year plan focused mainly on infrastructural modernisation. Along with laying a modern groundwork, including ‘roads, power, communication system, transport, agriculture and animal husbandry,’ building modern institutions, such as schools, was part of the planned development activities (Planning Commission, 1961: 1).

The Western education model and curriculum of modern schooling

Describing this system of education, Phuntsho (2000: 98) states it consisted of ‘various strands of western methods of education and pedagogy received either directly from the West or through India and transacted mainly in the medium of English. Hence, it mainly

constitutes a western import'. Thus, it is referred to by Bhutanese as the 'modern' or 'Western' system of education. As Pommaret (2009) points out, Western-style schooling in Bhutan was established by the government with monetary support from Great Britain. A British-based educational model was imported from neighbouring India for the purpose of quickly establishing a modern system of education. The decision to look outside the country for an education system suited to national development goals was steered by His Majesty Jigme Dorji Wangchuck. His Majesty's decision may have been influenced by his own educational experience as a student in Kalimpong where he was educated in a 'British manner' (Pommaret, 2009). Regarding the development of modern education, as Ura (2010: 62) writes, His Majesty 'drew influence from his visits to Scotland and Switzerland and 'chose elements that were suitable to Bhutan'. In other words, Bhutan's 'attraction' toward Western education seems to be tied to the third King's experience as a student and a view of education in the West as being a pillar of modernisation. Therefore, this form of education was considered an appropriate vehicle to 'usher in' planned modernisation. It is generally agreed in the literature that the first modern schools appeared in the late 1950s in the Haa valley (Collister, 1991; Ura, 2010).

It merits mention that not only were English-medium schools modelled on 'British independent schools' (Collister, 1991: 13) brought in from India, but so too were textbooks and teachers. For these reasons, many Bhutanese viewed the modern system of education as alien to the Bhutanese context (Dyenka, 1999; Solverson, 1995; Stiles, 2009; Ueda, 2000). Most Bhutanese were sceptical of modern education and there was little recognition of its social utility (Phuntsho, 2000). Consequently, the first students

were conscripted into schooling. Despite efforts to localise the curriculum – a process that is still ongoing – this critical view remains visible in contemporary media discourse in references to the system as a ‘colonial relic’ (Tobgye, 2012) and in political and policy discourse.

The development of the modern education system and the role of Father Mackey

Father Mackey, a Canadian Jesuit priest who taught the children of His Majesty King Jigme Dorji Wangchuck, had a significant influence on the development of modern education in Bhutan in the early 1960s. Although several primary schools had already been established prior to the 1960s, they were independently operated and were not unified by a common curriculum. Mackey was recruited to help build the infrastructure for a modern system of schooling. During his time in Bhutan, Mackey became involved in drafting the first education policy document in 1963 (Solverson, 1995).

Father Mackey’s influence also extended to the selection of the curriculum for use in these schools. There were two major choices to be made regarding the selection of a curriculum. The first was the medium of instruction. According to Solverson (1995), Mackey recognized that the curriculum used in Bhutan’s schools would need to include the basic subjects of science, math, history, and geography. A medium of instruction also had to be chosen. To this end, choosing a local language of instruction was problematic because there was no single language that was widely written and spoken throughout Bhutan. Over 17 dialects are spoken in the country. Out of these dialects, Chöke was the only form of language that was written as well as spoken. However, Chöke was reserved solely for religious purposes and it was thus determined to be inappropriate as a medium

of instruction in a secular system of education (Phuntsho, 2000). Dzongkha was the national language at the time and it was also the dominant language used in the Western region of Bhutan; however, if used as the medium of instruction, graduates would not be equipped linguistically to pursue higher education abroad. Stakeholders eventually settled on English as the chosen medium of instruction in the secular school system. Motivation for this decision derived from the perception of English as an ‘international’ language. Additionally, it was used ‘generally’ by neighbouring India (Solverson, 1995); and the implementation of English could situate Bhutan for enhanced interaction on a more global level. At the same time, English was not an official language of any of Bhutan’s neighbouring countries, and it was perceived as having less of a cultural influence than, for example, Hindi (Solverson, 1995). For these reasons, English was chosen as the medium of instruction in most public middle and higher secondary schools. It is also the language of most available government education documents and reports.

Alternatively, Collister (1991) suggests that the choice to develop school curriculum in English stems from the provision of secondary education in India to the Bhutanese prior to the 1960s. Because there was no form of secondary education available in Bhutan prior to the 1960s – and only a small number of primary schools – the Indian government allowed a select group of Bhutanese students to attend secondary school in India. Many of these students attended English-medium schools modelled on ‘British independent schools’ (Collister, 1991: 13). The Bhutanese involved in developing the modern system of education in the 1960s likely underwent this Indian education abroad, ostensibly

serving as an influence on their decision to conduct the modern Bhutanese system of education in English.

The second significant factor in selecting the curriculum for the modern school system was the way in which the curriculum would position its graduates. Father Mackey considered which curriculum would best enable graduates to pursue higher education. The choice was made to adopt a curriculum that aligned with the Indian system of education. The curriculum Father Mackey chose to use in the modern schools system was borrowed from the West Bengal Board of Secondary Education and included the basic subjects of math, science, history, and geography. The Indian curricular model positioned graduates of primary schooling to pursue secondary education in India. This was important as there were few secondary schools in the country. Furthermore, the Indian curriculum also prepared graduates to enter Indian colleges. Enabling graduates to pursue further studies abroad was important because Bhutan had no universities in the early 1960s (Solverson, 1995). Due to an absence of qualified Bhutanese teachers and school administrators, Father Mackey filled these positions with staff from India (Solverson 1995; Ueda, 2000). During the process of constructing an educational infrastructure, choices were based on practical considerations.

There is a paucity of information on the early planning and development of the modern system of education regarding the intended purposes and functions of the curriculum in the early 1960s. Moreover, the First Five Year Development Plan (Planning Commission, 1961: 1) states only that ‘considerable progress was made’ as by the end of this plan 108

schools had been built. However, the careful assumption can be made that at this early stage of development, the cultural effects of using an imported curriculum were not of primary influence upon the decision to adopt an Indian curriculum. Rather, the function of the early curriculum was to provide education to Bhutanese youth, and to prepare them for an emerging job market as the country embarked upon a process of modernisation.

In the early stages of educational development in Bhutan, the trade-off for ‘quickly’ establishing basic education was the adoption of an available curriculum which was not highly relevant to the Bhutanese cultural context. Consequently, the modern system of education was viewed by many Bhutanese as an ‘alien’ system (Solverson, 1995; Ueda, 2000).

Education and curriculum localization: 1980’s

As has been discussed, in the first two decades of the modern system of education, the goal was to ‘establish and expand’ this system (Planning Commission, 1981). Previous development plans had placed an emphasis on creating the foundation of a modern system of education, including the construction of schools and training and recruitment of teachers. By the 1980s, an educational infrastructure had been constructed. The Fifth Development Plan (1981–1986) placed further attention on the conservation of the country’s traditional heritage and emphasised the inclusion of Bhutanese culture in the school curriculum (Planning Commission, 1981). What emerges in policy documents and academic literature from the 1980s onward is a strong emphasis on the conservation of traditional culture and the pursuit of a ‘balance’ between tradition and modernisation.

Exemplifying the government's vision of modernisation was the concept of Gross National Happiness.

The fourth King, Jigme Singye Wangchuk, who reigned from 1972 until he stepped down from the throne in 2006, is credited with conceiving the development philosophy of GNH. The concept was introduced formally in the late 1980s. However, some scholars argue that the origins of GNH can be traced to a 1729 legal code which identifies 'happiness' as a purpose of the government (Ura, Alkire, Zangmo & Wangdi, 2012). GNH is centred on the development of spiritual and cultural aspects of society and the rejection of a development paradigm that puts primary emphasis on economic indicators (Simoni & Whitecross, 2007). Further to this, GNH is underpinned by the belief 'that the beneficial development of human society takes place when material and spiritual development occurs side by side to complement and reinforce each other' (Simoni & Whitecross, 2007: 6). Much of the rhetoric on GNH is bound up in a vision of the future where the conservation and promotion of traditional culture is carried forward alongside modern development goals. While there is no single definition, Ura and Galay (2004: vii) describe it as:

a specific Bhutanese path to development in pursuit of values that [are] consonant with Bhutan's culture, institutions and spiritual values, rather than values that [are] defined by factors external to Bhutanese society and culture.

GNH is divided into four main pillars: 1) sustainable and equitable economic development, 2) environmental conservation, 3) the preservation and promotion of culture, and good governance. The four pillars are divided into nine domains: 1)

psychological wellbeing, 2) health, 3) time use, 4) education, 5) cultural diversity and resilience, 6) good governance, 7) community vitality, 8) ecological diversity and resilience, and 9) living standards (Ura, 2010). As Simoni and Whitecross (2007: 175) maintain, the philosophy of GNH is underpinned by ‘a shared cultural understanding expressed in *driglam namzha* ("rules of etiquette"), the absence of foreign political and economic domination, and Buddhism as a component of national identity’. During the reign of the fourth King, the inculcation of GNH began to permeate the discourse on the modernisation of the education system.

At the start of the Fifth Five Year Plan for development, part of the curriculum reform efforts included the translation of educational materials from English into Dzongkha. In doing so, the curriculum would serve the purpose of introducing a ‘strong national-cultural orientation’ to the classroom (Planning Commission, 1981: 98). The Fifth Plan (Planning Commission, 1981: 98) included the following objectives:

to provide educated and trained manpower to meet the growing needs of development programmes; to bring about a modernisation of society by introducing them to science and technology and thereby enabling them to join the mainstream of contemporary civilization; and, to preserve and promote the country's rich cultural and spiritual heritage, preventing the alienation of the educated from this heritage.

The national efforts to support the continuity of tradition were also realized with the establishment of a Special Commission for Cultural Affairs in 1985 (Pain & Pema, 2000). Under the direction of His Majesty, the Commission was charged with compiling the first written handbook on *driglam namzha* which was previously transmitted only

orally (Tshering, 1999). Shortly thereafter, in 1986, the ‘New Approach to Primary Education’ (NAPE) was launched in order to bring the curriculum into alignment with Bhutanese society, and further, reorient pedagogy from rote methods to an inquiry-based approach (Collister, 1991). Bray and Packer (1993) and Collister (1991) point out that while NAPE was intended to ‘Bhutanise’ the curriculum and, concomitantly, draw on the expertise of foreign education specialists to improve the overall quality of education at the primary level, it was met with criticism and, ultimately was derailed. Collister (1991: 30) asserts that the program failed to gain acceptance owing to the perception that ‘it was a foreign-imposed scheme in which foreigners had a high profile’ (Collister, 1991: 30).

From the start of the Sixth Five Year Plan (1987–1992) (Planning Commission, 1987), successive education reforms have sought to both contextualize the curriculum and orient schooling toward national development goals, i.e. economic and social development. The Sixth Plan states that ‘having been structured on the Indian system, the education system in Bhutan needs to be reformed to relate it to the values, environment and the history of Bhutanese people’ (Planning Commission, 1987: 33). The Sixth Plan builds on the policy and plans described in the Fifth Plan, however, it puts additional emphasis on the conservation of traditional Bhutanese heritage. The objectives for the education sector include a ‘re-orientation’ of the curriculum in order to make the content relevant to the Bhutanese people. At the secondary level, this plan states that textbooks will be rewritten and teaching guides will be produced. Expanding the purpose of the curriculum, the Sixth Plan describes a reemphasis on the Bhutanese concept of *driglam namzha*.

Mathou's (2000: 245) work provides one perspective on the purpose of re-emphasizing driglam namzha in the school curriculum:

During the 1980's, sections of the *Lhotshampa* (Nepali) minority started to consider that integration was detrimental to their identity and that homogenisation resulting from modernisation was leading to the exclusive domination of the *Drukpa* culture. The declaration of *Dzongkha* as the only national language, the termination of the teaching of Nepali in schools, the promulgation of a code of etiquette (*Driglam Namzha*), and the identification of illegal immigrants through census operations were assimilated to a "Bhutanisation" process whose only purpose was to favour the culturally and politically dominant group.

Incorporating driglam namzha and re-orienting the curriculum was part of the broader purpose of 'Bhutanisation' under the concept promulgated by His Majesty of 'one people, one nation' (Mathou, 2000). The Gross National Happiness development goals are also cited as supporting the introduction of Bhutanese examples into the curriculum (Ezechielli, 2002). Some scholars describe this process and the resulting changes to the curriculum as discriminatory to the Nepali population (Evans, 2006; Hutt, 2003) rather than a movement to carry forward Bhutan's culture. Prior to the Sixth Plan, the Nepali population was recognized by the curriculum and classes at some schools were taught in the Nepali language (Ueda, 2000). Significant political and educational changes took place during the Sixth Plan, marking a general shift in the function of the curriculum. While still serving the purpose of contributing to national development, the curriculum was employed to promote a unified vision of national culture.

Education and curriculum reforms in contemporary Bhutan: 1997-2010

The period is characterised in policy documents such as, the Eighth, Ninth, and Tenth

Five Year Plans, and academic literature by the added problems of rapid social change which is given momentum by increased international engagement (Crins, 2008). This period is distinguished by the formal introduction of television and the Internet in 2001 and the shift in state leadership from monarchy to democratic monarchy in 2008.

While the Eighth Plan for Development (1997–2002) (Ministry of Planning, 1997) asserts that modern school curriculum had ‘largely been localized’ by the start of this national development plan, it is in the Ninth Plan for Development (2002–2007) (National Planning Commission, 2002) that GNH is featured prominently. The Ninth Plan calls for a whole school approach in order to integrate traditional values into the school community ‘through exemplary activities, participatory rules and organizational models in classrooms and schools’ (National Planning Commission, 2002: 72). The preservation of culture, as an imperative of the education sector, ostensibly stems from what the Tenth Plan (2008–2013) describes as the ‘rapid socio-economic transformation taking place,’ and the country’s cultural heritage is seen as an important tool to balance out the influences of globalization and its attendant pressures and impacts (Planning Commission, 2008: 15).

At the same time, with regards to the education sector, in 2011 a nation-wide project to promote ICTs in the national system of education had been introduced. Some of the first *Chiphen Rigpel* teacher training programs were held in Thimphu at the time of fieldwork for this study as part of an ambitious project aimed at the ‘ICTization of schools’ and the development of a knowledge society (Cabinet Secretariat, 2011:26). While global

connectivity enabled by ICTs is relatively new to the education sector and Bhutan as a whole, it is seen by some scholars as bringing ‘global culture into Bhutan’ (Faris, 2004: 159) and potentially hindering the continuity of traditional culture. The impact of global connectivity facilitated by the internet and other forms of new media is critiqued for its negative impact on Bhutan’s young people, mainly for enabling the prominence and prestige of the English language and social preferences for Western culture and values.

According to some scholars (Dorjee, 2006, Wangyal, 2001), the proliferation of the English language through electronic and print media – both international and domestic – drastically reduces the usage of Dzongkha and other local languages. As Phuntsho (2000: 112) asserts, in modern Bhutan, literacy is now equated with fluency in the English language. Dorjee’s (2006: 126) study revealed that for most Bhutanese, ‘English is regarded as a language of education, social status, social position, and prestige’. Consequently, local languages are seen by some as representing traditional (pre-modern) Bhutan and, therefore, holding limited utility in modern life. Roder (2012) maintains that the ability to fluently speak English is now a requirement for entry into prestigious types of work, e.g. positions in the civil service. The proliferation of English in Bhutan is seen by Mancall (2004: 10) as an ‘agent of the cultural homogenization that is the servant of economic global integration, of Globalization’. He maintains that the dominance of English in everyday life is diminishing ‘cultural self-reliance and independence’ of the nation (Mancall, 2004: 10). However, Simoni and Whitecross (2007: 169) aptly point out that ‘[w]hatever meaning is given to the concept of globalization and all it symbolizes, Bhutan is certainly one of the last countries to have been affected. Its context is indeed

quite unique'. Global engagement in Bhutan has not been an attempt to replace 'local' with 'global,' 'traditional' with 'modern,' or 'Bhutanese' with 'Western,' rather; the government has attempted a slow and cautious approach emphasising a balance between these different elements.

Scholars such as Mathou (1999: 617) observe this as a significant national dilemma centred on 'increasing access to the outside world while having to deal with the questions of what effect the information age might have on their society and how to preserve their age-old traditions and culture'. This issue is highly visible in national media such as the Kuensel and Bhutan Times as well as the Centre for Bhutan Studies (2002) compilation of discussion papers, *Globalization: The Argument of Our Time*. Recently, the Bhutan Times (2008) published a volume of works, *Flies in the Forgotten Tea: Essays and Opinions of Changing Bhutan* (2008), all of which focus on the paradoxical relationship between increased global influence and concomitant efforts to retain aspects of tradition from local perspectives. Dorji and Choden (2005: 101) observe in Bhutan the emergence of:

a cultural setting that is increasingly drawing on a set of values and characteristics from the 'rest of the world,' some being fused with the local, traditional genre and some directly 'imported' or imitated. With this phenomenon comes a different set of conditions, perceived needs and attitudes.

It is in this climate that citizens might develop flexible worldviews in order to interact with the shifting ways of knowing with which they come into contact. Against this backdrop, some scholars caution that Bhutan's traditional social harmony is in danger of

becoming unhinged (Wangyal 2006, Ueda, 2003). From this perspective tradition is conceptualized in a tensional relationship with modernisation and the increased global influence brought about by the Five Year plans for development.

Rennie and Mason's (2008: xii) edited volume, *Bhutan: Ways of knowing*, in a series of essays describes the sense of 'immanent change' observable in Bhutan. Changing ways of life are seen today in 'the first escalator in the country, widening the main road from a single track to a dual carriageway, the first democratic election, the availability of satellite television, and Internet expansion'. The essays in this volume largely focus on the vast social changes brought about by education and given new momentum by global interconnectivity (see also Center for Education Research and Development, 2002). Ura (2004) notes that Western culture and values are gradually impacting Bhutan's 'philosophy of life'. He observes a deeply embedded modernity – where the 'artefacts and ideologies' of Western origin are visible not only in urban centers but also in 'the remote mountains and among the migratory cattle-herders in the deep forest area' (Ura, 2004: 291). During the researcher's own experience working with an educational institution in Thimphu in 2006, a colleague described his practice as an educator to the *Lhop* community through his position with the Tarayana Foundation, a local educational development organization. The *Lhop* – a geographically isolated minority group with a way of life and worldview described by Dorji (2003) and Sharma (2005) as distinct from the dominant Northern Bhutanese Drukpa culture – were provided informal education in order to prepare them to engage with changing ways of life, including basic business development skills to enable the sale of goods and a transition out of a barter economy.

Paralleling national modernisation discourse, Dorji's (2003) account indicated that a cautious approach should be taken toward educational provision to Lhop communities with attention to the conservation of their distinct cultural knowledges and values, which Dorji (2003) stressed could be lost with the next generation. Supporting this line of reasoning, scholars such as Whitecross (2002: 5) describe an 'underlying tension between the desire to 'modernise' and the concerns of losing or distorting the social values which are viewed as central to Bhutanese society' (see also Allison, 2009; Ueda, 2001; Wangyal, 2006). The literature reveals that a significant challenge faces Bhutan's education system, namely, the prospect of harmonizing social and economic change with the country's rich culture (Evans 2006; Aris, 1994; Mathou, 2000). As Wangyal (2006: 107) points out:

there is a need to provide a sense of continuity amidst change. In addition, since culture and traditional values form the bedrock of Bhutanese national identity it is important for the Bhutanese to ensure that its culture and values are not undermined.

Today, the concept of GNH is gaining increasing international attention in contemporary Bhutan, most recently with its 2012 adoption by the United Nations as an economic development paradigm. What emerges is a clear thrust in policy text and discourse toward Bhutan's distinctive notion of modernisation, which calls for 'maintain[ing] a harmony between economic forces, spiritual and cultural values' by positioning GDP equally alongside GNH (Planning Commission Secretariat, 2000). That is, policy at the national level calls for a confluence of traditional and modern ideas at the individual level.

The promulgation of GNH through the education sector is also about redirecting the attention of young people away from consumerism and toward traditional values (Mancall, 2004: 27). This is seen by scholars like Mancall (2004) as creating a paradox where the curriculum positions students for modern sector employment that is not yet available. For example, in economics classes convey fundamental ideas about business and economic management. However, while the demand for white-collar work is increasing, 60% of the population is engaged in work in agriculture and forestry (National Statistical Yearbook, 2011: 58). Roder (2012) holds that this schism is widened by the general expectation and preference among graduates of secondary schooling for ‘white-collar’ positions in the civil service and an attitude among young people that less desirable jobs such as positions in agriculture, forestry, and teaching are considered a ‘last resort’. Pommaret (2009: 79) adds that there are a greater number of school graduates than in the past yet there is an increasing lack of ‘doctors, nurses and other professionals for the great number of blue collar jobs’. The Eighth Plan states that the relatively small population of the country further constrains the supply of manpower. Additionally, graduates who complete secondary school are not prepared to ‘make good the shortage of manpower with the necessary skills for a developing economy’ (Ministry of Planning, 1997: 7). To this end and in response to the aforementioned discontinuity between the curriculum and the labour market, Bhutan has recently added career guidance and ‘orientation to vocational skills’ as the new developmental offerings at the secondary level (Gross National Happiness Commission, 2009: 60). However, as will be examined in Chapter Five, the interviews with policy makers and curriculum officers

indicated that – despite recent market oriented initiatives – the modern curriculum prepares students for a labour market which does not yet exist.

Despite the discord recognized in policy text and seen by Phuntsho (2000) and Wangyal (2006), scholars such as Dorji and Chodon (2005) and Pommaret (2009) argue that in contemporary Bhutan so deeply embedded are traditional knowledge and values that modernisation and interaction with the global knowledge economy have had negligible effect on the continuity of Bhutanese tradition. Pommaret (2009: 16) observes that for Bhutanese citizens ‘much of daily life is governed by certain inherent norms and values such as inter-dependence within the community’. Traditional Bhutanese social structures remain largely intact owing to the country’s relatively isolated history and deliberately slow pace of modernisation. As Pommaret (2009: 15) stresses, Bhutan’s citizens have not rejected their traditional values and ‘spiritual heritage’ in exchange for modern and global ideologies. Similarly, Dorji and Choden (2005: 16) hold that traditional cultural values are deeply held by the population despite the aims of policy to advance socially, economically, and politically on a global level. Evidencing this stance was the recent social resistance to the pivotal transition in government from absolute monarchy to a constitutional democratic monarchy. Sinpeng (2007) and Ura (2010) hold that the opposition to the Fourth King’s decision to devolve power away from the monarchy and to a system of democratic governance stems from a deeply held social reverence for the monarchy.

On December 14, 2006, the fifth King, His Majesty Jigme Khesar Namgyel Wangchuck

assumed the throne on and was crowned on November 6, 2008. Commencement of democratic rule was closely tied to changes in the modern system of education. Policy documents such as the National Curriculum Framework (Ministry of Education, 2009) and the Tenth Five Year Plan (Gross National Happiness Commission, 2009) charge the education system with instilling in Bhutan's citizens' the values and the skills and abilities for engaging in a democratic state and reorienting the national mind-set away from an unquestioning reverence for authority to a critical stance toward governance. Literacy and media literacy ensure citizens have access to information and can make informed decisions regarding governance. Today, strengthening democratic governance is a priority of the Fifth King, who recently called for a greater media presence in order to enable citizens to analyse and engage with national affairs. In 2010, the Bhutan Media Foundation was launched (Ura, 2010: 153). At the time of fieldwork in 2011, the Ministry of Education had commenced a series of media literacy training courses for teachers in order to bring greater use of technology into the national education system. We might expect that the imperative for education to foster ways of thinking and interacting within a democratic society, which diverge from the older view of government, might represent a new source of conflict between the 'old' and the 'new'. Thus, reflecting the central theme of this thesis – to examine the perceived tensions emerging during processes of 'advancement' along modern lines while promoting the continuity of Bhutanese traditions.

A flurry of education policy papers from 2000 onward indicates a deliberate attempt to guard against the perceived decline of traditional knowledges and values associated with

modernisation and globalization (e.g. Ministry of Health and Education, 2001; Ministry of Education, 2009; Ura, 2009). Bhutanese government documents maintain that the education system is the ‘core instrument’ through which Bhutanese culture and values are conveyed to citizens (Ministry of Education, 2009). For instance, Bhutan’s National Human Development Report (Planning Commission Secretariat, 2000) states that the social changes associated with the country’s planned development, may lead to conflict as a result of changes in traditional lifestyles. This report maintains that developing the nation will ‘depend on mitigating the foreseeable conflict between traditional cultural values and the modern lifestyles that inevitably follow in the wake of development’ (Planning Commission Secretariat, 2000: 18). As Realising the Vision 2020: Policy and Strategy (Department of Education, 2001: 19) document states:

As modern life becomes increasingly complex for adolescents with competing and sometimes destructive demands on their attention, the whole secondary curricula will be realigned to instil, as much as possible, core values and ethos of Bhutanese society. Teachers will develop capacities to employ new methodologies, which promote active learning, new subject matter and current developments in the subjects being taught.

However, education policy related to the implementation of GNH is still in a formative stage. At the time of fieldwork in 2011, formal teacher training manual was under development. The first GNH training for trainers workshops were conducted in Thimphu to build a cadre of 70 teachers and school leaders prepared to facilitate GNH at their school sites. The green schools initiative was also in the early stages of implementation. During fieldwork, memos on bulletin boards at the school research sites iterating the goals of this new program developed to operationalize GNH into school communities.

This initiative is set out in the recent iteration of Bhutan's National Education Policy (Ministry of Education, 2012: 3) guidelines as follows:

Green schools can be nurtured through a harmonious co-existence of the various areas that shape a child's development in the school system, which are cultivated and distilled through eight dimensions of green school: Environmental greenery, Intellectual greenery, Academic greenery, Social greenery, Cultural greenery, Spiritual greenery, Aesthetic greenery and Moral greenery. A green School builds and promotes an active involvement of the parents and the community in education of the children. It also prepares children for the world of work as well as life.

These imperatives are translated and delivered to teachers in the form directives from education authorities, e.g. memos, school policy documents. However, in the absence of formal training, at the time of fieldwork, teachers also relied on their own interpretations and strategies toward the inculcation of traditional ways of knowing. We might expect these directives to elicit tension, not only with the sometimes contrasting modern worldview inherent in educational materials and methods borrowed from the West, but these directives might also be troubled by practical demands of the school, e.g. overwork, overcrowded classrooms, limited resources, and insufficient or shortened class periods.

While GNH is the focus of new education initiatives and much academic attention, empirical studies on its reception and how it is enacted – particularly by practitioners in the classroom – is largely absent from the literature.

2.4 Summary and reflections

This chapter summarized the interdisciplinary and historical literature and provided an understanding of why a Western model of education was implemented as part of planned national modernisation in the 1960s. Analysis of the expansion of modern state education and its rapid expansion – which supplanted the once prevalent system of traditional monastic schooling in terms of social attention and enrolment – supports the argument that tensions have emerged from the introduction of modern education into Bhutan.

This chapter discussed the developments and influences on modern education in three key phases. The first phase began in 1961, when the third King commenced planned modernisation and began the process of building a modern system of education to support planned development. This period focused on the development of the physical infrastructure of education. From the second phase beginning in the mid-1980s, attempts were made to localise the curriculum through the NAPE initiative.

This chapter also described how today – in the third key phase – the imperative to balance traditional and modern ways of knowing is at the fore in policy, curriculum, and new demands on teachers' pedagogy owing to the GNH policy. Despite the imperative of GNH to achieve equilibrium between tradition and educational and national modernisation, the literature suggests that tensions have emerged. This chapter has also addressed the dearth of available research bringing the voices of teachers to the fore. At the time of writing, their voices were largely absent from independent qualitative studies on the modernisation of the education system. Having located this research in a particular

place, the next chapter will turn to the literature which serves to frame the study theoretically.

In the context of modernisation and increasing global interconnectivity, three predominant areas emerged with respect to the modern system of education. These call for further exploration in order to understand the tensions in Bhutanese discourses on the modernisation of the education system. In the next chapter, theoretical literature on education and modernisation, curriculum theory with regard to modern and traditional knowledges, as well as studies on how teachers mediate tension between competing knowledges and worldviews will be reviewed.

Chapter Three: Theoretical framing of the study

3.1 Introduction to the chapter

The historical and contemporary literature on Bhutan and the policy documents reviewed in the previous chapter suggests that the path toward development in Bhutan is one of modernisation. Premised on the notion that tensions are brought about by processes of educational and national modernisation, this chapter sets out to explore how this concept unfolds in three sites in the arena of national education.

We might expect tensions to emerge in the site of politics and policy where direction is given to the national system of education. Toward this end, literature is reviewed which gives attention to the cultural, political, and economic changes associated with the modernisation of education systems (e.g. Abdollahian, Coan, Oh & Yesilada, 2012; Fägerlind & Saha, 1989, Ingelhart & Welzel, 2005; Inkeles, 1969). The literature reviewed here also considers Bhutan's relatively recent, but increasing, connections across its borders where education is also impacted by global 'flows' (Appadurai, 1996) of exogenous ideas.

The national curriculum might also be a site of tension, struggle, and debate about the content of what is taught and for what purpose. Therefore, the next section presents literature on curriculum theory as it relates to modern education and curriculum re-orientations that are inclusive of different knowledges and worldviews. Literature that explores how the curriculum plays a fundamental role in the competing demands to

conserve traditional ways of knowing while preparing students for life in society (e.g. Bruner, 1996; Kelly, 2009) is included.

Given the literature highlighted thus far, which suggests the possibility of tensions in education policy and politics and school curriculum, it follows that teachers might encounter tensions between different epistemologies inside their classrooms. Therefore, the final section in this chapter examines the implications of processes of modernisation for teachers working in a location where different epistemologies might come into contact. It is important to note that many of the studies on education, modernisation, and global influences focus mainly on policy issues. Scholarship examining the effects of these on teachers practice is slim. For the purpose of overcoming this limitation in the literature, two strands of conceptual works are examined. The first presents selected literature on the contrasts between traditional and modern epistemologies and draws particular attention to the evident in science subjects as will be discussed later. This is not to suggest that such tensions do not exist in other curriculum subjects, however, studies related to tensions between different knowledges beyond science subjects exceeds the scope of this study. This strand of literature mainly comprises studies that were carried in African nations. However, key studies by Childs et al. (2012) and Alison (2009) place this stream of literature in the context of Bhutan. The second strand of research raises questions about the demands of modernisation on educators, in particular those that require them to mediate between different knowledges and worldviews (e.g. Rogoff, 2003; Gutiérrez et al., 1999).

3.2 Education, modernisation, and the spread of the Western education paradigm

This study examines the evident tensions in processes of educational and national modernisation while seeking to maintain cultural autonomy, not least with regard to China and India. As was shown in Chapter Two, Bhutanese government policy articulates a distinctive notion of modernisation and calls for ‘maintain[ing] a harmony between economic forces, spiritual and cultural values’ by positioning GDP equally alongside GNH (Planning Commission Secretariat, 2000). That is, Bhutanese education policy at the national level is bound in a notion of confluence of traditional and modern mores at the individual level.

However, as mentioned at the outset of this study (see Section 1.2), processes of modernisation may engender tensions related to social change and cultural loss (Ball, 1981; Carnoy and Samoff, 1990; Fägerlind & Saha, 1989; Ingelhart & Welzel, 2005; Shipman, 1971). These tensions might coalesce in the education sector when Western educational models, materials, and methods are employed in non-Western countries to advance a modern agenda. Considering the exogenous origins of Bhutan’s modern system of education and increasing international connectivity, it is in the arena of education that the tensions are potentially most observable and heightened. Therefore, in order to understand the theoretical dimensions of the historic and contemporary debates that frame the research questions, conceptual works on modernisation theory and interdisciplinary scholarship on the impacts brought about by increased global connectivity are examined below in relation to education.

Scholars across disciplines generally consider modernisation to be ‘associated with Western style progress and development’ (Knauft, 2002: 18). Portes (1973: 249) holds that modernisation is characterised by ‘urbanization, literacy, social mobility, mass media communication, a mature industrial plant and a democratic polity’. That is, the features of modernisation are social, political, and economic (Fägerlind & Saha, 1989). Inglehart and Welzel (2005: 19) point out that processes of modernisation, of which state education is a part, move societies in similar socioeconomic directions because:

Socioeconomic development starts from technological innovations that increase labor productivity; it then brings occupational specialization, rising education levels, and increasing income levels; it diversifies human interaction, shifting the emphasis from authority relations toward bargaining relations; in the long run this brings cultural changes.

Scholarship on modernisation has described similar socioeconomic changes taking place in countries around the world – these changes being highly dependent on the support of a national system of education (Abernethy & Coombe, 1968; Armer & Youtz, 1971; Carnoy & Samoff, 1990; Fägerlind & Saha, 1989; Inglehart & Welzel, 2005; Shipman, 1971).

Modernisation theory implies that national systems of education bring about changes at the individual level. This is attributed to the assumption that modern schooling exerts ‘a modernizing effect on the ways that people think, and consequently the way they behave’ (Fägerlind & Saha, 1989: 52). For example, the work of Armer and Youtz (1971) identifies a correlation between exposure to Western schooling and modern social values. They argue that the curriculum of the ‘Western type’ school lends itself to processes of

modernisation (see also Ramirez & Boli, 1987). Armer and Youtz (1971: 605) maintain that school curriculum rather than other aspects of educational systems (e.g. school structure) exerts the strongest ‘modernising’ influence upon students. This modernising influence increases students’ value of ‘independence from family and other traditional authority, belief in science and in man’s ability to control his fate, and orientation toward the future’. At the same time, however, their study also reveals limits to the modernising effect of education, particularly in non-Western societies such as Bhutan, where local, traditional beliefs are acquired at home and reinforced by the community.

From a sociological perspective, Ramirez and Meyer (1980) stress that the social characteristics inculcated through modern schooling are driven by an economic imperative. National development plans may focus on economic growth and call for an educated workforce; however, a market oriented curriculum may engender expectations for modern sector employment. At the same time, modernisation policies may also create conditions that require workers to fill low paid labour positions which need little or no prior training. The potential tensions engendered by a curriculum misaligned with the job market may be further exacerbated when, as Bates and Nakashima (2009: 6) point out, the curriculum is ‘designed for a mainstream and largely urban populace, [which] may be of limited utility for remote rural communities where wage-earning jobs are few and far between’. Moreover, in countries like Bhutan, where generations have been engaged with subsistence agriculture, Abernethy and Coombe (1968: 130) posit that ‘education makes young men disinclined to follow their fathers’ occupation’. The wages of a farmer become less attractive than those associated with higher salaries, such as positions in the civil service. Given the limited modern sector of Bhutan’s economy, we might expect

there to be fissures between students' career expectations and a largely agro pastoral job market (Roder, 2012).

However, schools serve another purpose in processes of modernisation. From Bruner's (1992) perspective, the purpose of schools in every society is twofold. On one hand, schools are responsible for preparing children to cope with the world in which they are living. On the other hand, they are also charged with reproducing the culture of a society. Following in this line of thought, Kelly's (2009) work considers schools to be 'agencies' for handing on a society's culture. From this perspective, an imperative of the school is to provide students with the 'language, knowledge, and values' necessary to conserve and promote 'culture' (Aronowitz & Giroux, 1991: 90). However, when the pace of change associated with modernisation is rapid and uneven, schools may be challenged to serve the cultural and modern development ideologies that may pose competing demands. For example, parents may be engaged in agricultural livelihood where traditional rationales are relied upon to explain the unpredictable forces of nature, while youth might be sent to secondary schools located in or near urban centres where Western knowledges and values (e.g. science and technological progress) are the sources of authority in daily life (Inglehart & Welzel, 2006). Consequently, there may be a visible schism between the 'old' and the 'new' where citizens might live simultaneously in both 'worlds'.

Some scholars maintain modern education can support a modern agenda and carry forward traditional culture. That is, schools can function both as instructional and cultural sites. Furthermore, traditional cultures are not always incompatible with or in opposition

to the curriculum of Western-style schooling (Inglehart & Welzel, 2005; McGovern, 1999). Inglehart and Welzel (2005: 19), in their revised theory on modernisation, add that traditional culture can persist despite economic and political changes associated with modernisation. This view considers cultural traditions to be relatively independent of economic conditions. Inglehart and Welzel (2005: 20) explain:

Although socioeconomic development brings predictable long term changes in what people believe and want out of life, the influence of cultural traditions does not disappear. Belief systems have a remarkable durability and resilience. While values can and do change, they continue to reflect a society's historical heritage. Cultural change is path dependant.

In other words, cultural traditions will continue to exert influence on social changes. For example, Vlastos (1998) maintains that Japan represents an ideal example of a country 'saturated' with traditional values and customs, which are assumed to have contributed positively to its modernisation process.

Japan's education system was deliberately employed to rapidly advance modernisation, initially in 1847 and again in 1941 (Shipman, 1971). At the same time, schooling was also used to uphold the traditional discipline of society by conveying traditional religious beliefs and instilling national pride (Shipman, 1971). From this standpoint, Western forms of education can support both the continuity of traditional culture and modernisation. However, while Shipman (1971) acknowledges that modern education operates in different ways across societies, it is important to point out that this volume does not accommodate the possibility that complex tensions might emerge when

education systems attempt to both support the continuity of tradition and contribute to national modernisation in a climate of increasing global connectivity.

As was shown in the literature outlined above, there are distinct tensions that might emerge from processes of modernisation. These perspectives resonate with the changes associated with modernisation in Bhutan (Chapter Two). However, in Bhutan and arguably most other countries around the world, education and society are also shaped by global influences which may exacerbate and engender tensions between the ‘old’ and the ‘new’.

The globalization of education is a contested term but is described by some scholars as the standardization and spread of formal Western education throughout the world (Grigorenko, 2007). Suarez and Ramirez (2004: 1) assert that, in terms of its influence on systems of education, globalization can be conceptualized as the ‘worldwide spread of models or blueprints’ associated with ‘progress’. More specifically, Popkewitz (2004: vii) points out, the global spread of mass schooling ‘produces talk about the degeneration of culture, the erosion of national identity, and the end of diversity in an increasingly standardized world’ (c.f. McGinn, 1997).

There is a trend in the literature on world culture theory that sees national systems of education converging around Western ideals (see for example works compiled by Anderson-Levitt, 2005). For *Baker and Le Tendre* (2005: xii) the world culture of mass education ‘sometimes mixes with (and other times flattens) national and local cultures’.

From this perspective, the Western model of mass schooling takes similar forms throughout the world and is steered by common ideas about the purpose of schooling. Moreover, deeply entrenched in the world culture of schooling are ‘global norms and rules about what education is and how schools should operate’ (Baker & Le Tendre, 2005: 8). Carney, Rappleye, and Silova (2012: 366-367) examine the ‘complexities and ambivalences of modernity’ and maintain that the global expansion of mass schooling and spread of a Western educational paradigm are driven by ‘global rationalization’ and ‘the logic of science and the myth of progress’. Carney et al. (2012) add that a Western set of values and ‘myths’ about the role of education toward the creation of a ‘good’ society are embedded in education systems around the world (see also Ramirez & Boli, 1987). In addition to scholarship highlighting the antagonistic effects of the global spread of Western education on the continuity of local culture, there is also scholarship that describes numerous other pressures that might impinge on an education sector, particularly in the context of increasing international connectivity.

Steiner-Khamsi (2004) notes that the global spread of ideas about international standards in education places pressure on low-income countries to adopt and comply with these standards. To this end, policy makers might turn to educational ideas and practices considered ‘successful’ in other nations in order to support education reforms. Ideas may also be borrowed ‘out of curiosity, to learn a new way of doing’ or ‘to influence existing reforms’ (Spren, 2004: 226). However well-intentioned educational borrowing might be, it is thoroughly documented in the literature that uncritical transfer of education policy and practices internationally can result in tensions and mismatch with local settings (e.g.

Crossley 2008; Guthrie 1986; Phillips & Ochs 2004; Spreen, 2004; Steiner-Khamsi, 2004; Pain & Zeichner, 2012). For example, as Carney and Rapple (2011: 4) point out, the educational system of Nepal demonstrates that the uncritical adoption of an imported curriculum, which emphasized 'central control and authority, technical/rational knowledge and urban lifestyles,' was considered responsible for a shift away from traditional identity and knowledge and toward a preference for modern social forms and 'superior' Western knowledge (see also Madsen & Carney, 2010). Such situations can contribute to and exacerbate social tensions. Consequently, Spreen (2004: 234) maintains that education reforms should be closely aligned with 'local nuances and cultural understandings' if they are to be accepted by local actors and take hold in the school setting.

However, while international standards do indeed exist and proliferate, they do not always produce a homogenous effect or lead to a 'convergence of educational systems' (Spreen, 2004: 203). Rather, they are adopted for different reasons and also play out differently in different local contexts. Along with this, is the issue of translating the intentions of policy into classrooms. For Ball (1994), policy can be viewed dualistically as text and discourse. As text, policy takes the form of official documents. As discourse, policy can be discerned in directives often emanating from the outer layers of the educational sphere. As Ball and Bowe (1992:83) argue, '[p]olicy texts are not closed, their meanings are neither fixed nor clear, and the 'carry over' of meanings from one policy arena and one educational site to another is subject to interpretational slippage and contestation'. Policy is not static and is subject to interpretation and reinterpretation, a

process whereby the intended meanings are not always translated directly and enacted in classrooms. The present study examines how stakeholders across Bhutan's education sector attempt to navigate particular understandings inherent in educational materials and techniques from the West in the context of globalization where education and society is increasingly influenced by outside ideas (Carney, 2009; Dale, 1999).

Scholars on policy borrowing draw attention to the local processes through which exogenous educational policies and methods become appropriated (e.g. Grigorenko, 2007; Ochs & Phillips, 2004; Steiner-Khamsi, 2004). Scholars hold that this process is complex and, in some cases, it may take a considerable amount of time before new education ideas take hold and become entrenched in the school setting. In other cases, borrowed educational ideas and techniques may never become incorporated. Educators and the school community may eschew foreign inspired curriculum reforms. As the present study examines, education stakeholders in Bhutan are involved in educational changes. However, some policies, methods, approaches, and the modern education system itself were brought about or influenced by external sources. However, recent reform initiatives have not sought to bring in external educational policies and practices on a large scale – thereby replacing what is 'Bhutanese' or traditional – but rather have attempted to gently navigate and adapt particular educational ideas from the West. What emerges here is an educational landscape in which competing ideologies are deeply entrenched yet driven toward a balanced relationship, at least on the surface.

Much of the literature in comparative education recognizes the importance of local actors

as agents who ‘transform the official models they are handed’ (Anderson-Levitt, 2005: 4). Adaptations can occur when education reforms are implemented at the national level. For example, Cowen’s (1996: 158), research on countries that have undertaken education reforms for the purpose of modernisation purports that some have allowed for ‘old structures to work in new ways (West Germany with its retention of stratified secondary education) or new structures to work in old ways (Japan with its combination of an American school structure and Japanese examining practices)’.

Adaptations may also occur at the individual level. Some scholars argue that local actors impose their own meaning on adopted educational materials and methods and transform them to align with the local culture (e.g. Flinn, 1992; Le Fanu, 2012). In the case of the Pulap Atoll, Micronesia, formal Western education was expanded rapidly in the 1960s and seen as the ‘key’ to development and modernisation by both Micronesia and the United States (Flinn, 1992). Generally, the pedagogy and context of formal education was dissimilar to indigenous learning. Flinn (1992: 49) maintains that while the United States constructed a school system and implemented an American curriculum in Micronesia, Pulap teachers ‘nonetheless conduct certain aspects of the class in accordance with their own beliefs about how children learn and their own notions of ideal character traits’. While the education system was foreign to the Micronesian context, Pulap culture has at least partially transformed Western schooling, as evidenced by classroom ‘expectations of behavior and values [being] largely consistent with other aspects of life on the island’ (Flinn, 1992: 45). Additionally, educated members of the

Pulap elite remain at the forefront of efforts aimed at conserving traditional Pulapese culture.

However, even though Western educational forms may be reinterpreted in local ways, the global spread of Western education models, ideas, and practices engender, in some nations, a renewal of ‘localization’ or ‘indigenization’ efforts. That is, counter-discourses might emerge. As Ramirez (2005: 252) notes, ‘[t]he world culture is Western in origin, but both its universalistic aspirations and its rationalizing thrust paradoxically facilitate de-Westernization efforts’. Such a response may be evidenced not only at the policy level but also, for example, among teachers who reject educational innovations brought in from abroad due to perceived discontinuities with traditional epistemologies. For example, Le Fanu’s (2012: 144) study on the Western curriculum employed in state schools in Papua New Guinea evidenced that there were teachers who were ‘instinctively opposed to the democratic ethos’ of the Western curriculum. These teachers favoured an older authoritarian teaching style and insisted their students follow ‘tightly structured and narrowly focused exercises in language lessons’ (2012: 144).

From Appadurai’s (1996: 3) view, modernity is influenced by global interconnectivity, rendering it ‘decisively at large’ and ‘unevenly experienced’. Appadurai (1996) maintains that ‘flows’ of information, ideologies, culture, media, and technology move between and across nations. These ‘flows’ have different ‘speeds, axes, points of origin and termination, and varied relationships to institutional structures in different regions, nations, or societies’ (1996: 5). The movement of these ‘flows’ is often rapid and their

social effect is ‘disjunctive’. Indeed, these global ‘flows’ may create friction in local settings (Appadurai, 1996). In the case of Bhutan’s national system of education, we might expect that ‘flows’ of ideas about international standards of education might generate top-down demands for child-centred pedagogy where the teacher acts as a facilitator. At the same time local ideologies of ‘teaching’ and ‘authority’ may place pressure on teachers to resume an authoritative role and renew the use of rote-style teaching and learning.

Knaft (2002: 106) adds that ‘modernity proliferates and becomes acerbic through the disjunction or contradictions between globalizing forces and localizing ones’. He terms this notion the ‘oxymodern’. Knaft (2002: 131) identifies three features of oxymodern tensions: ‘first, as an antimony between the past and the present; second, as the awkward second-classness of local people in regimes of modern symbolic distinction; and third, as exposure to the possibility of progress in the face of its economic impossibility and political disempowerment’. Accordingly, these tensions present themselves in problematic relationships between the ‘old’ and the ‘new’; ‘traditional,’ and/or rural beliefs are often typecast as ‘backward’; and aspirations for national development and economic progress are often caught in contradictory relationships with ‘a frustrating lack of material possession’ (Knaft, 2002: 131-132). While this stance reifies dichotomous and polarized traditional and modern ideologies – therefore, constructing a ‘mythic past’ against which modernity is set (Comaroff & Comaroff, 1993) – it attempts to understand contradictory relationships with both.

The literature here points to the importance of examining educational modernisation in Bhutan with attention to the interconnections between local, national, and global discourses. The movements and relationships are not always linear and interpretations vary among actors across the educational sphere. The tensions brought about by the modernisation of education and globalization are important themes throughout this study. With the complexity described above in mind, the conceptual work relevant to the role of the curriculum in processes of educational change toward modernisation and localisation will be outlined below.

3.3 Curriculum, traditional epistemologies, and the Western education paradigm

School curriculum serves to standardise knowledges and ‘social practices’, thereby determining which aspects are legitimated and reproduced and which are let go (Giroux & Simon, 1984: 142). Here, it is important to construe what the curriculum encompasses. It is not limited solely to school documents and educational materials but, for Kelly (1982: 7) comprises ‘the total program of an educational institution’. Scholars on curriculum studies, such as Kelly (2009), distinguish between the ‘actual’ and the ‘official’ curriculum, i.e. the living and designed curriculum. The former is what occurs in practice and is experienced by students. The latter is set out in curriculum documents, school policy, syllabuses, and educational materials. Bock and Arthur (1991: 316) broaden our view and maintain the curriculum also denotes ‘a particular kind of consciousness’. It serves to guide the learning that takes place in the school setting and, as Goodson (1994: 105) holds, it ‘specifies a common set of goals and objectives’.

Curriculum theorists hold that the content of the curriculum and the objectives that it serves are products of negotiations over the forms of knowledge, values, and selections of the culture that should be legitimated and passed on to citizens (see for example Apple & Christian-Smith, 1991; Giroux, Simon, 1984, Goodson, 1994). Some scholars question ‘what knowledge’ and ‘whose knowledge’ is of the most worth (Apple & Christian-Smith, 1991: 1). While Bhutan’s curriculum policy supports the continuity of tradition within a modern system of education, there may be competing views among stakeholders about the particular forms of knowledge that are considered relevant to modern schooling. Thus, the curriculum of modern education may represent a contested terrain in Bhutan. Understanding the role of the curriculum in carrying out Bhutan’s educational goals is therefore important in this study.

However, before we can examine literature on curriculum theory as it relates to traditional and modern knowledges and ways of understanding the world, it is important to first indicate what is meant by these terms. In the next section, conceptualizations of these key terms will be examined.

3.3.1 Traditional and modern epistemologies

The overarching intention of the present study is to understand the response of Bhutan’s education system to what its political and policy level decision makers, education leaders, and teachers frame as the tension between tradition and modernisation. These terms permeate Bhutanese discourses on educational and national modernisation and reify dichotomies between ‘modern’ and traditional,’ ‘home’ and ‘school knowledge,’ and ‘scientific’ and ‘local belief’. Nevertheless, as Phuntsho (2000: 98) stresses, the

traditional-modern dichotomy is visible in many aspects of Bhutanese society, however, ‘the encounter of the two can nowhere be more vivid than in the sector of education and learning’. While traditional or ‘indigenous’ forms of knowledge have long been subjects of research in anthropology, these ways of knowing are gaining increasing attention from education researchers and practitioners for their affordances for education.

The terms ‘indigenous,’ ‘local,’ ‘traditional,’ and ‘cultural’ knowledge are often used interchangeably to denote *ways of knowing passed down through the generations and often transmitted orally* (e.g. Gusfield, 1967; Hobsbawm, 1983; Vlastos, 1998). Scholars such as Shizha (2007: 304) expand the definition of indigenous knowledge to include ‘*the local knowledge that is unique to a given culture or society, but continually influenced by internal creativity and contact with external systems*’. From this standpoint, these forms of knowledge are not static and can accommodate new, external ideas. This conceptualization views these ways of knowing as dynamic and changing. Lauer and Aswani (2009: 323) study add that indigenous knowledge ‘is generated and sustained during context-specific activities’.

Indigenous forms of knowledge are expressed in a plurality of ways, for example, in stories, folktales, songs, dances, myths, values, beliefs, languages, as well as agricultural, ecological, and medicinal practices (Bates et al., 2009). They may be tacit and are not always codified or codifiable (World Bank, 1998) and are generally developed outside formal education systems (Lodhi, Mikulecky, 2010). Indeed, as was shown in Chapter Two, there are bodies of knowledge in Bhutan considered to be traditional. Regarding modern knowledges, borrowing from Phuntso (2000), while ‘tradition is frequently seen

as an indigenous culture of a particular society inherited from its past, modernism is viewed as a more recent development strongly influenced by innovative and scientific methodologies'. Regarding modern forms of knowledge, they are generally more abstract, concerned with analytic representation, 'globally situated,' and less context bound than traditional ways of knowing (Sillitoe, 2010: 13). Regarding modern and traditional forms of knowledge, Semali and Stambach (1997: 6) hold that neither should be conceptualized as 'unitary 'bodies' or 'stocks' of knowledge. Instead, they represent contrasting epistemologies produced within sociocultural, agroecological, and competing political and economic settings'.

Some scholars see the contrasts between different epistemologies as rendered in highest relief in the area of science. Agrawal (1995), Shiva (2006), Sillitoe (2000), and Williams (2000) have suggested the misperception of modern, Western science as 'universal' and 'objective' and 'prestigious' positions traditional knowledges as subordinate. Exemplifying this perspective, Shiva (1997: 162) adds that modern science 'has displaced all other belief and knowledge systems by its universality and value-free neutrality'. Lauer and Aswani (2009: 318) attribute this view, in part, to the characterization of Western scientific knowledges as 'formal and systematized,' therefore, part of a body of legitimate modern and 'academic' knowledge. Related to this point, Kidman, Yen, and Abrams (2013) assert that young people residing in non-western countries, through the influences of globalization, are exposed to 'media representations of culture, scientific knowledge, and political economies that provide subtle lessons about the kinds of cultural

dispositions and values that are considered to be of high status or which are considered legitimate in the “developed” world’.

While traditional and modern scientific knowledges are characterised by contrasts, it merits mention that in historically Buddhist countries, like Bhutan, where religion fortifies aspects of traditional knowledges – the tenets of Buddhism and a Buddhist view of the world are considered by some scholars to be compatible with scientific thought (Jayatilleke, Spencer & Shu, 2008; Liu & Lederman, 2007; Pickering, 1995). As Jayatilleke et al. (2008: 2) notes, Buddhism’s ‘general account of the nature of man and the universe is one that accords with the findings of science rather than being at variance with them’. Jayatilleke et al. (2008: 8) trace this compatibility to the Buddhist worldview being one that is ‘objective’ and consistent with a ‘detached view toward the nature and destiny of man’.

Discerning the general differences between modern and traditional ways of knowing, Agrawal (1995: 418) summarises these in three main ways:

- 1) substantive-there are differences in the subject matter and characteristics of indigenous vs. western knowledge; 2) methodological and epistemological - the two forms of knowledge employ different methods to investigate reality, and possess different world-views; and 3) contextual - traditional and western knowledge differ because traditional knowledge is more deeply rooted in its context.

That is, these *knowledges* are associated with different *worldviews*. As highlighted in the outset of the study, Liu and Lederman (2007:1283), analysing Kawagley et al. (1998)

define a worldview as: *‘a collection of values and beliefs that forms the frame of reference for a group of people to make sense of the world’*. For example, Le Grange (2007: 585) points out that a Western scientific worldview assumes *‘[a]ll events have natural causes,’* whereas an indigenous worldview considers events as having *‘natural and unnatural causes’*. Going further, Liu and Lederman (2007: 1282) point out that *‘[i]n some non-western cultures, people may not see the natural world as an object for investigation or of exploitation for human benefit’*.

While the terms related to traditional and modern forms of knowledge hold descriptive utility and serve to differentiate some of the features of different ways of knowing, Agrawal (1995) strongly maintains that the theoretical divide held up by both modernisation and indigenous theorists should be *‘dismantled’* and a linear relationship resisted (see also McGovern 1999, 2000; Le Grange, 2007; Lauer & Aswani, 2009). From this standpoint, the modern scientific/indigenous knowledge debate moves beyond the previously accepted dichotomy and the validity and possibility of separating these ways of knowing is queried. As Agrawal (1995: 433) argues *‘the same knowledge can be classified one way or the other depending on the interests it serves, the purposes for which it is harnessed, or the manner in which it is generated’*.

Recognizing that there are problems and limitations associated with these terms, in this study, traditional or indigenous *‘knowledge’* will generally refer to the forms of knowledge passed down through the generations and often transmitted orally. This study will use the term *‘knowledges’* rather than the singular to indicate the broad

conceptualizations about traditional ways of knowing in Bhutan. Continuing in this line of thinking, ‘modern knowledges’ will denote the exogenous content of the curriculum of Bhutan’s ‘Western-type’ system of education (see also Chapter Two). This study also makes a distinction between ‘knowledges’ and ‘worldviews’ (see Section 1.7). Building on the conceptualizations set out in the literature, the participants’ understandings of these terms are considered central toward understanding what these mean in the context of Bhutan. Accordingly, this study recognizes that the terms ‘traditional’ and ‘modern’ are contested in the literature and were often used in ambiguous and contradictory ways by the interviewees in this study. It should therefore be stressed that there is debate over what these terms mean and encompass and, furthermore, that the meaning of these terms is considered through the eyes of the participants.

Having construed the notions of traditional and modern knowledges and worldviews, the next section will review literature on how these ways of knowing are treated in Western-style school curricula in non-Western contexts.

3.3.2 Western-style curriculum in non-Western contexts

In contexts where formal education is based on a Western curriculum, schools may be in locations where different knowledges and worldviews interact. As the literature reviewed thus far suggests, there might be tensions between what is taught in schools and traditional knowledges and ways of understanding the world. Accordingly, teachers might act as mediators between the designed curriculum and traditional epistemologies and may attempt to translate or refer to what students know. This thesis examines how such tension might be mediated from the perspectives of a range of education stakeholders.

Therefore, in the following section, literature on relationships between traditional knowledges and modern school curricula are examined.

Traditional knowledges and practices have been devalued in the past – often regarded as obstacles to ‘progress’ in the context of educational modernisation projects (Kelleher, 1992). However, since the 1990s, and most notably in the past decade, there has been a surge of literature on the relationship between ‘local wisdom’ and modern school curriculum (e.g. Booth, 1997, Gallard & Gallagher, 1994, Jungck & Kajorsin, 2005, Lauer, 2009, Le Grange 2007, McGovern, 1999, 2000, Sarangapani, 2003; Semali & Stambach, 1997; Shizha, 2007, Thaman, 1993). Much of this literature shows that traditional knowledges were presented as subordinate in the past, often as the result of curricula inherited from colonial legacies. For instance, Shizha’s (2010: 4) study shows that formal schooling in Zimbabwe based on a Western curriculum, ‘promoted the displacement and silencing of African knowledge systems and pedagogical practices in academic institutions’. Traditional knowledges were considered irrelevant to the goals of modern schooling. As Bates and Nakashima (2009) note, the devaluation of traditional ways of knowing may be attributed to a view that knowledges and practices developed outside of formal schooling as subordinate to school knowledge. Bates and Nakashima (2009: 6) explain:

In the classical Western understanding of the term, education tends to involve learning through instruction and reading, and by internalising abstract information which may later be applied in specific real-world contexts. For many indigenous cultures, however, learning occurs through the process of observing and doing, and by interacting over long periods of time with knowledgeable elders and the natural environment.

Not only does a curriculum misaligned with the local setting lend to a negative view of traditional knowledges and ways of understanding the world, some scholars have found that a culturally incongruent curriculum without interconnection with the knowledges and practices extant in learners' homes and communities presents learning challenges to students. For example, Sarangapani's (2003: 206) describes Western schooling in the Baiga community in Central India, which showed that in societies with traditional systems of knowledge, formal schooling presents knowledge 'out of context,' not directly experienced' by learners. For some students, connections between worldviews must be made explicit in order to render some aspects of the curriculum comprehensible. Semali and Stambach (1997: 4) stress that contemporary ideas are imbricated with older ways of knowing. A curriculum that positions traditional and modern epistemologies in opposition thus 'ignores the ways in which "modern" cultural beliefs and practices draw from folk and indigenous ways of life' (Semali & Stambach, 1997: 4).

The literature thoroughly documents that accepted ways of knowing in some cultures may differ from the knowledges of a Western curriculum in many non-Western countries. Differences have been examined by studies on a range of curriculum subjects, e.g. maths (Ares, 2006), environmental science (Lauer & Aswani, 2009; Pizmony-Levy, 2011), indigenous and modern languages (Walsh, 2005) and science (Shiva, 2006). However, the debates regarding discontinuities come to the fore particularly in the literature examining the interaction between traditional and scientific forms of knowledge (Kidman et al., 2013; Lee, 2002; Ogawa, 1986; Shiva, 2006; Shumba, 1999a, 1999b; Yakubu, 1994). For

example, traditional and modern ways of thinking about well-being, the environment and the cosmos might differ. As discussed in the previous section, modern scientific knowledge is sometimes afforded higher prestige and considered to hold greater utility in modern life than traditional epistemologies. From this standpoint, modern knowledges and worldviews are positioned in an opposing relationship with those considered traditional. Consequently, traditional knowledges are often devalued and considered as ‘backward’ (Sillitoe, 2000). However, a growing body of literature recognises the co-existing utility of Western scientific knowledge and indigenous cultural beliefs (Gallard & Gallagher, 1994; Lee, 2002; Shumba, 1999a, 1999b; Yakubu, 1994). While much of the literature in this vein has been carried out in African countries, recent key studies by Childs et al. (2012) and Alison (2009) endorse the assertion that there are contrasts and tensions between traditional and modern scientific knowledges and worldviews in the Bhutanese context.

Ogawa’s (1986) research on science education in Japan indicates that indigenous ways of knowing can be accommodated within a modern science curriculum. As Ogawa (1986: 117) notes, ‘one of the main aims of science education in a non-western society should be to compare the traditional and the scientific view of man and nature and ways of thinking, and to clarify similarities and differences between them’. In relation to this point, Ogunnyi (1988: 8, emphasis added) argues that in traditional societies ‘the aim [of science education] should be geared towards *accommodation* rather than *assimilation*’. That is, they should be presented side-by-side and on equal footing. Similarly, Ogawa

(1986: 118) argues that '[s]cience as a culture should be seen within the context of students' traditional culture'.

Since the 1990s, the international community has also augmented the field of research on traditional knowledges and their relationship with education. Practitioner research – under organizations such as UNESCO and the World Bank – recognizes the applicability of traditional knowledges and practices to the implementation of education reforms. The World Bank's publication, *Indigenous Knowledge for Development* (1998) and UNESCO's volume of case studies, *Best Practices Using Indigenous Knowledge* (Boven & Morohashi, 2002) examines the utility of local forms of knowledge toward the 'sustainability' of educational reform projects. From this stance, recognition of different situated knowledges can enable 'policy-makers and development practitioners [to develop] deeper insight into the many different aspects of sustainable development and the interrelated role of local peoples and their cultures' (Boven & Morohashi, 2002: 7). These publications highlight the value of indigenous ways of knowing toward increasing local actors' acceptance and implementation of development projects and also highlight the need for 'balance' of different knowledges. The UNESCO volume, *Learning and Knowing in Indigenous Societies Today*, describes the Western curriculum, often employed in modernisation projects, as 'both a major cause of the decline of indigenous knowledge, and also as a remedy to its demise' (Bates & Nakashima, 2009: 6). Furthermore, the authors in this volume caution that aligning curricula with 'local' epistemologies is a tenuous process, i.e. the 'interrelationship and balance' between these knowledge forms is 'delicate' (Bates & Nakashima, 2009: 6). Following in this line of

thought, a context of rapid change may not be conducive to maintaining – or even establishing – a delicate balance between different epistemologies within a curriculum.

As shown in the previous section, traditional epistemologies are not always codified and, therefore, may require standardization to be rendered suitable for the formal curriculum. Coe (2005: 6) stresses that this process ‘undercuts itself’. She adds that ‘[r]ather than appropriating vernacular knowledge, standardization creates a new field of knowledge – a school knowledge that has different connotations and meaning than vernacular knowledge’ (Coe, 2005: 6). In other words, ways of knowing that are situated in a particular context are altered in the process of adaptation into the curriculum. For example, we might expect that definitions of rural farming practices or ways of interacting with local deities in order to ensure harmony in daily life might be presented and learned differently than the experiential learning of traditional epistemologies through interaction with elders in the community or engagement with these practices in daily life. Further, as Coe’s (2005: 6) research in the Ghanaian context found, ‘local elders and chiefs are esteemed for their knowledge and practice of the most “authentic” culture’. However, the traditional knowledge taught in schools was an ‘objectified and nationalised culture’ which was ultimately ‘devalued’ by the broader school community and ‘considered suitable only for children and adolescents’ (Coe, 2005:6).

Montero-Seiburth (1992: 177) asserts that curriculum in developing country contexts could benefit by a ‘reconceptualization of curricular practice, a way of seeing curriculum as part of a larger process in which teachers, pupils, parents, and the community correct

and supplement the experiences of each other’. From this perspective, the development of curriculum is a *generative process* rather than a *product* (Montero-Seiburth, 1992; Shizha, 2010; Bates et al., 2009). That is, the development of the curriculum takes cognizance that knowledge is ‘diversely determined and variably dependant on cultural settings’ (Shizha, 2010: 127). Such an approach recognizes communities as ‘contributors to and users of knowledge’ (World Bank, 1998). Furthermore, this approach is imbued with flexibility, allowing teachers and students ‘a degree of accommodation with local conditions and concerns’ (Goodson, 1994: 105). As McGovern’s (2000) literature review also shows, knowledges generated within local contexts may retain significance and meaning, while imported curricular content may remain maladapted or hold limited relevance when adopted into another country context.

Given the tensional relationship between traditional and modern epistemologies within school curriculum, it is necessary to examine if and how these fissures unfold into the classroom and how teachers might address them.

3.4 Teachers as mediators

As discussed above, there may be differences between the modern knowledges and ways of viewing the world of a modern school curriculum and traditional epistemologies. Such may be the case in the Bhutanese research setting where teachers might assume a critical role as mediators of tension between different epistemologies. In other words, teachers might confront conflict between the policy imperative to promote Bhutan’s ‘age old cultural wealth’ and the modern content of the curriculum (Cabinet Secretariat, 2013: 73). However, a narrative of the experience about if and how these tensions are negotiated by

teachers in Bhutan has not yet been provided. One aim of the present study, as indicated in the introductory chapter, was to develop a framework to understand the pedagogic strategies employed by teachers in Bhutan to navigate the tensions, if any, between traditional and modern knowledges and views of the world. Given the central location of teachers in the educational sphere, this area of analysis is critical in order to understand how education policy – driven toward a balance of traditional and modern ways of knowing – unfolds into practice. In this section, two strands of interrelated literature will be outlined: (1) literature on pedagogies relevant to the mediation of contrasting ways of knowing and, (2) literature examining the affordances of learning offered by different reservoirs of knowledge.

3.4.1 Teachers' meditational pedagogies

A large corpus of research (e.g. Apple, 1992; Guthrie, 1986; Mitter, 1987; Lewin, 1985) indicates that teachers occupy a 'make or break' role in the education system and the implementation of curriculum reforms succeed 'only when the teachers concerned are committed to them and especially, when they understand as well as accept, their underlying principles' (Kelly, 2009: 15). Further, the functioning of curriculum in the classroom largely depends upon the individual teacher responsible for its provision. Apple (1992: 10) asserts that teachers have a 'long history of mediating and transforming text material when they employ it in classrooms'. In this way, teachers determine what is conveyed and how the curriculum is conveyed to students. Shifts in curriculum policy are interpreted and enacted through each teacher's unique filters of experience, beliefs, available resources, theories, school context, and ideologies (Stoffels, 2005: 533). Following in this vein, Ginsberg, Kamet, Raghu and Weaver (1992:421) posit that

‘[w]hile teachers general do not have full autonomy officially to determine the curriculum, they do, to varying extents, choose to accommodate, resist, or create alternatives to the curriculum determined by others’. Furthermore, the interpretation of the curriculum may fluctuate even amongst teachers of the same curriculum subject at the same school. In this way, teachers determine *what* is conveyed and *how* the curriculum is conveyed to students.

Given the nascent state of GNH’s formal inclusion in the curriculum, we might expect that recent policy directives toward the balance of tradition and modernisation have not yet taken hold across the education sector and, further, might vary in their interpretation by individual agents. In the current climate of educational and national change – teachers may take on a complex role. Examining teachers’ pedagogy in a climate of political, social, and cultural flux, Giroux (1990: 55) argues for a postmodern approach that emphasises transgression across borders, recognition of the arbitrary nature of boundaries, and ‘attention to the sphere of culture as a shifting social and historical construction’. Giroux (1992: 30) asserts:

These are not only physical borders, they are cultural borders historically constructed and socially organized within rules and regulations that limit and enable particular identities, individual capacities, and social forms. In this case, students cross over into realms of meaning, maps of knowledge, social relations, and values that are increasingly being negotiated and rewritten as the codes and regulations that organize them become destabilized and reshaped.

‘Border pedagogy’ enables teachers to incorporate into the classroom diverse forms of knowledge ‘that make up the experiences of students who often find it impossible to

define their identities through the cultural and political codes that characterize the dominant culture' (Giroux, 1992: 32). This approach encourages teachers to cross epistemological borders as a way to further students' learning. Le Grange's (2012) study on how teachers in South Africa facilitate the crossing of borders between scientific and traditional understandings identified two main pedagogic approaches. One approach involved teachers acting as 'travel agents' of the borders between contrasting epistemologies. In their role as travel agents, teachers provide the 'topics, activities or events that create the need to know' among students (Le Grange, 2012: 588). This resembles a discovery- (Bruner, 1961) or inquiry-based approach to teaching where learners 'must discover or construct essential information for themselves' (Kirshner, Sweller & Clark, 2006: 75). Le Grange (2012) also identified instances where students required guidance in order to navigate contrasting epistemologies. Here, teachers acted as 'tour guides', whereby active connections were made between contrasting epistemologies. Both of these approaches ostensibly require considerable skill and constant attention on behalf of teachers.

Sociocultural perspectives on teaching also recognise the changing relationships between individuals and their worlds. Much of this scholarship stresses that forms of knowledge situated in communities should be considered as resources to inform and supplement teachers' practice, thereby connecting epistemologies from students' everyday lives to contrasting lessons in the curriculum. Greenberg and Moll (1990) apply the term 'funds of knowledge' to denote the 'historically accumulated and culturally developed bodies of knowledge and skills' that might be invoked by teachers (cited in Moll, Amanti, Neff &

Gonzalez, 1992:132). Scholars such as Rogoff (2003), Gutiérrez et al. (1999), Greenberg and Moll (1998), Lave and Wenger (1991) argue variously that teaching should be directed at building upon previously acquired knowledge. For these scholars, teachers can capitalize on the knowledge and skills extant in learners' homes and communities as they may offer affordances for learning.

This view is underpinned by the notion that 'people develop as participants in cultural communities. Their development can be understood only in light of the cultural practices and circumstances of their communities which also change' (Rogoff, 2003: 3-4). Communities are conceptualized as socially constructed groups. The participants in 'cultural communities' engage with 'cultural traditions' and ways of knowing relevant to the community. A sociocultural-historical perspective recognizes 'people's use and transformation of cultural tools and technologies and their involvement in cultural traditions in the structures and institution of family life and community practices' (Rogoff, 2003: 10). Lave and Wenger (1991: 98) apply the term 'situated practice' to denote the 'set of relations among persons, activity and world, over time and in relation with other tangential and overlapping communities of practice'. Rogoff (2003: 7) goes further and asserts that the identification of 'cultural regularities' within each community illuminates the differences across communities. Moving between communities, for instance, from home to school, may require shifting ways of knowing and communication, from 'folk terms to academic terms' (Rogoff, 2003: 32). Accordingly, understanding cultural regularities unique to each community facilitates movement between them.

Rogoff (2003: 62) recognizes that ‘all people participate in continually changing communities. Individuals and generations shape practices, traditions, and institutions at the same time that they build on what they inherit in their moment in history’. Indeed, the knowledges and practices of individuals and their communities are continually in flux, particularly in times of rapid social change as in Bhutan at the time of this study. With increasing global connectivity and engagement with foreign media and international migration, Rogoff (2003: 326) posits that ‘children’s lives are increasingly connected with more than one community’s practice’. Such a context may deepen generational divides and may require young people to engage with older ways of knowing with elders in their communities and Western ideologies in the context of formal schooling.

Some scholars highlight the utility of a ‘multiliterate’ pedagogy, particularly in societies that are – or are becoming – multilingual, multicultural, and confronted with exogenous ideas through new digital medias (Johnson & Kress, 2003; Kalantzis & Cope, 2002). In the context of globalisation, formal schooling may require some students to ‘read and master texts that convey the knowledge and traditions of a particular community of practice, with no knowledge of the social practices within which those texts are used’ (Johnson & Kress, 2003: 10). In such a context, Kalantzis and Cope (2002: 9) move away from a pedagogy where the focus is on rule bound transmission of official knowledge. They maintain that ‘pedagogies of conformity’ do not engage learners with the ‘representational world’ and, as a result, ‘cannot hope to foster innovation, creativity, ease with change’ (Kalantzis & Cope, 2002: 12). Indeed, during times of social change

brought about by globalization, achieving ‘fluency’ in different ‘literacies’ enables teachers and students to mediate between global and local knowledges and ways of understanding the world (Kalantzis & Cope, 2002; Johnson & Kress, 2003; Johnson, Garrett & Crossley, 2003).

A multiliterate approach is not restricted to ‘monolingual, monocultural’ modes of transmission but can be conceptualized as ‘one in which language and other modes of meaning are dynamic representational resources, constantly being remade by their users’ (Kalantzis & Cope, 2002: 9). From this perspective, teaching is not merely the formal transmission of official knowledge but is inclusive of different ‘representational’ resources. As Le Fanu (2013: 142) also found in the case of teachers practice in Papua New Guinea’s Western-style schools, ‘[g]iven the characteristics of learners and the nature of knowledge, teaching must be an essentially facilitative act – the dexterous creation of flexible learning opportunities’.

Johnson, Kress (2003) have added to Kalantzis and Cope’s (2002) analysis. Johnson and Kress (2003: 8) see multiliterate teaching as conveying ‘a set of social practices, forms of knowledge, and variety of resources for representation and communication that enable individuals to participate and function fully in society’. For example, as De La Piedra’s (2009) study demonstrates, the need for literacies relevant to life in urban and rural Peru are the result of citizens engaging with two distinct epistemologies. De Pa Piedra (2009: 110) writes:

In Urpipata, alphabetic Quechua and Spanish literacy, learned by comuneros [commoners] in diverse social institutions (i.e., the school, the community as a political and social organization, and the Protestant churches), coexist and at times are integrated with textual practices that are related to the agricultural lives of Quechua people, syncretic religious beliefs (Andean and Catholic) and a worldview guided by the principle of reciprocity.

This approach considers traditional and modern knowledges as offering co-existing utility to teachers' classroom practice. Ares (2006: 405) summarises the main features of a culturally relevant pedagogy:

- 'uses the cultural practices of students as valuable, legitimate resources for learning;
- treats use of those practices as central issues in design and implementation; and
- scaffolds students' learning of academic content by drawing on those practices in service of generative learning'.

These approaches to teaching have important implications for students' learning, as has already been suggested, and will be examined further below.

3.4.2 Implications of teachers' pedagogic approach for students' learning

With the pedagogic approaches outlined above in mind, this section will examine 1) the potential tensions that students might experience when they encounter different epistemologies and 2) the affordances that these points of conflict might offer for students' learning.

First, we might expect that when the knowledges and worldviews inculcated in young people's homes differ from those of formal schooling, students may experience tensions between different epistemologies. For instance, building on Rogoff's (2003) work, Phillips, McNaughton and MacDonald (2004) observed dissonance between home and

school knowledge among Maori students in New Zealand. As their study demonstrates, ethnic minority children who reside in communities with limited access to the mainstream cultural resources do not perform as well academically as their peers. Their main argument is that Maori children experience discontinuity during the transition from the learning practices of home to those at school, leading to the trend among Maori children to perform at a lower level than their peers, most noticeably in text based literacy.

Phillips et al. (2004) highlight the Maori students associated text-based learning with the approach employed in church where material is memorised. Approaches to literacy – and goals of literacy – at church contrasted with the approaches used in homes and schools (c.f. Kadar-Fulop, 1988). Phillips et al. (2004) maintain that this point of tension is not new and has long been recognized by constructivist scholars such as Piaget and Inhelder (1969) and sociocultural theorists like Bruner (1980) and Vygotsky (1978). However, this tension is considered by Philips et al. (2004) and other scholars to present an opportunity to facilitate students' learning.

De Haan (2001) observed dissonance among teacher-pupil pairs in a Mexican Mazahua community. Applying the term 'intersubjectivity' to conceptualise the different ways of understanding among students and the 'symmetrical dialogue' of Western pedagogy, De Haan (2001: 176) found that intersubjective conflict may be necessary in order to achieve mutual understanding. Here, the tension experienced by students offers opportunities for learning. Similarly, Rogoff and Paradise (2009: 104-5) call for pedagogy that draws on a

‘wide range of everyday activities that take place in family and community settings’. Such an approach to teaching draws on contextually bound knowledges and practices and considers this a crucial part of teachers’ ‘repertoires of practice’ (Gutiérrez & Rogoff, 2003).

Gutiérrez et al. (1999: 288) present the term ‘third space’ to describe the zones of proximal development (Vygotsky, 1978) that emerge when incongruent sets of knowledge and worldviews come into contact in the classroom. From this standpoint, the ‘competing discourses and practices, the official scripts and counterscripts, of the various social spaces of learning communities’ are considered as educational resources (Gutiérrez et al., 1999: 287). Similarly, La Grange’s (2007: 581) study on bringing indigenous knowledge into teachers’ classroom practice in South Africa demonstrates it is critical that teachers are cognizant of the interaction between different ways of knowing and ‘understand the way [these] could complicate the learning process’. Accordingly, understanding the potential tensions enables teachers to act as mediators, thereby facilitating students’ navigation among contrasting knowledges and, further, addressing extant tensions when different epistemologies come into contact. For example, Le Grange’s (2007: 589) study on the use of indigenous knowledge within the Western science curriculum in the South African context showed that when knowledges are viewed as situated in a particular context educators are enabled to ‘compare seemingly disparate knowledge traditions more equitably and work with both’. This approach enhanced students’ abilities to make sense of unfamiliar ideas in the curriculum.

From the socio-cultural standpoints presented here, different ways of knowing are *accommodated* (Ogguniyi, 1988). This study argues that *accommodating* different worldviews enables both to coexist on equal footing – an approach which aims to avoid ‘supplanting’ or ‘denigrating’ indigenous forms of knowledge (Ogguniyi, 1988) – a line of inquiry which will be carried forward in Chapter Seven. Rogoff (2003: 331) maintains there are benefits to understanding and incorporating cultural knowledge and traditions into one’s teaching practice. For example:

Children who are encouraged to understand the dynamics among communities, to value their own background, and to know how to function in two or more cultural systems are more successful and confident.

Shumba’s (1999b: 336) study in the context of Zimbabwe demonstrates that a thorough grounding in indigenous knowledge and the cultural context enables teachers to ‘better exemplify and link their subject domain to realities and everyday experiences of their students’. That is, students might make better sense of what they learn when curricular content is connected to their social experiences. Lee’s (2002: 47) study supports ‘the notion of instructional congruence as a process of mediating the nature of academic disciplines, such as science, with students’ language and cultural experiences to make the academic content accessible, meaningful, and relevant for all students’.

Adopting these views is important to this study in order to understand how teachers in Bhutan might address the competing discourses which may come to bear on their classroom practice. The literature in this section also explored the potential affordances for learning that are offered by a multiliterate pedagogy. Although their classroom

practice might be influenced by a plurality of different epistemologies, we might expect that teachers in Bhutan act as ‘creative agents’ (Vogler, 2010) whose pedagogic strategies shape the modernisation discourse in Bhutan. This is an area which, at present, remains largely unexplored by social scientists inside and outside Bhutan.

3.5 Summary and reflections

This chapter outlined three key strands of theoretical literature that frame the tensions between tradition and modernisation in relation to education policy and practice. The conceptual works presented here complement each other by explaining the potential tensions that arise when western models of education are employed to advance national modernisation. Fägerlind and Saha’s (1989) idea that education is critical to processes of modernisation by bringing about a reorientation of social values, attitudes, and beliefs from traditional to modern explains, at least in part, the tensions surrounding social change and cultural loss. The literature reviewed here also highlighted the limitations of theories on educational modernisation which assume linear shifts away from tradition. Western models of education when enacted in non-Western settings for the purpose of planned modernisation may be adapted and accepted or resisted by different stakeholders across the educational sphere. This chapter has also shown that increased global connectivity, and the rapid movement of knowledges, gives rise to disjunction and contradictions – visible in problematic relationships between the ‘old’ and the ‘new’ where aspirations for national development and economic progress become caught in contradictory relationships.

A second strand of literature demonstrated that in non-Western contexts, when formal education is based on a Western curriculum, schools may be in locations where traditional and modern worldviews interact. Teachers play a significant role in mediating the tensions that emerge when different worldviews conflict. Therefore, a third strand of conceptual works which drew attention to teachers' pedagogies in relation to mediating different ways of knowing that stem from the changing relationships between individuals and their worlds. Based on socio-cultural perspectives, this chapter demonstrated how forms of knowledge situated in communities can be considered resources to inform and supplement teachers practice, thereby connecting epistemologies from students' everyday life to contrasting lessons in the curriculum. The notion of 'multiliteracies' which explains why teachers and students may need to gain literacy in 'texts' that convey the knowledge situated in particular 'communities of practice' was also highlighted.

Having framed the study theoretically, the following chapter will describe the qualitative methods employed to examine if and how the tensions between traditional and modern epistemologies might be mediated by actors across three levels of Bhutan's education sector.

Chapter Four: Research design and methodological approach

4.1 Introduction to the chapter

This chapter describes the methodological approach used in this study to understand the views of three key groups of stakeholders in Bhutan's education sector and examine the discourse on the modernisation of the education system. This chapter begins with an argument for the use of qualitative methods. There follows a summary of the pilot. Following is an overview of the research design, questions, and discussion of access issues navigated throughout the study. Next, the criteria guiding selection of participants and research sites are detailed. Data collection techniques are outlined and the role of reflexivity in this research is discussed. Cross-cultural issues, which affected several aspects of the study, are set out and the methods of addressing these are described. A description of the analytic approach to data analysis concludes this chapter.

4.2 Chronology of the fieldwork and pilot study

The fieldwork was carried out in two phases as displayed in the table below:

Table 2: Chronology of fieldwork

Pilot Study	Main Period of Data Collection
October – December 2010	June – October 2011

A rigorous pilot phase of the study proved useful in several ways, with a primary contribution being a development in thinking about the research design. The validity of the research questions, semi-structured interview questions, elements of the methodology,

and analytic strategy were tested during the pilot phase. Additionally, access issues with regard to the school sites were addressed and are described in detail in Section 4.4.

Here, it is important to point out that the twenty-two interviews conducted during the pilot elicited rich quality data and the resulting transcripts were considered viable for inclusion in the overall analysis for two reasons. First, the semi-structured interview questions were determined to be effective during the pilot and therefore remained unaltered throughout the study. In other words, the interview questions and approach were consistent throughout the fieldwork. Second, the researcher was introduced to several high-level individuals during the pilot who agreed to participate in an interview. The opportunity to interview these individuals was considered rare owing to their busy schedules and the researcher felt fortunate to interview them during the pilot stage of the project.

For the pilot study, a hierarchical sample of twenty-two participants was identified using snowball and purposive sampling. In other words, participants were identified ‘through referrals made among people who share or know of others who possess some characteristics that are of research interest’ (Biernacki & Waldorf, 1981: 141). In order to test the three research questions, the sample comprised three key groups, i.e. policy level decision makers, education leaders, and teachers.

Perspectives on the modernisation of the education sector were gathered during both in-depth semi-structured and informal, conversational interviews with key stakeholders in

the education sector. Recognizing that in certain settings, ‘even taking notes interferes with, inhibits, or in some way acts on the setting and the participants,’ the researcher refrained from taking field notes during some of the informal, conversational interviews (Marshall & Rossman, 2006: 152). Immediately following these informal interviews, notes and impressions were recorded outside of the interview setting. In these cases, the conversational interviews enabled contact to be established and laid the foundation for future in-depth, semi-structured interviews during the main period of data collection. Thematic analysis was applied to the interview transcripts in order to systematically ‘make sense’ of the data. By comparing and contrasting participants’ narratives, themes on the discourse on Bhutan’s modern education sector emerged.

During transcript analysis of the interviews and observations of teachers, certain tensions and pedagogic strategies for addressing these became visible. Teacher responses frequently comprised a mix of *accommodating*, *inviting discussion*, *subordinating*, and *dismissing*. This moved me to develop a framework toward understanding these responses (see Table 4). While teachers of all curriculum subjects negotiate conflicts and contradictions, teachers specified that the lessons are most strongly and frequently embedded with tensions are those which present modern, scientific knowledge which contrasts greatly with traditional knowledges and ways of viewing the world. Pilot observations of a range of classes also provided support for narrowing the scope of observations conducted during the main period of fieldwork to science subjects. Examples included biology lessons, which may contrast the traditional and modern approaches to medicine and ways of understanding illness; physics classes presenting

views of the cosmos, which contrast with the traditional. These lessons were identified as the most heavily embedded with tensions between traditional and modern ways of knowing. This was also evidenced by pilot interviews with education leaders who maintained that ‘spiritual’ or traditional rationales are frequently employed by teachers of science subjects to enhance students’ understandings of concepts in the science curriculum. Therefore, in order to illustrate teachers’ accounts, the scope of the observations focused on science lessons, which elicited tension between traditional epistemologies and curricular content.

In addition to testing the research design, the pilot project enabled the researcher to re-familiarize herself with Bhutanese culture, in particular, those aspects of the culture that might affect the study. Most notable was the commonly held notion of ‘Bhutanese stretchable time’ (BST). In Bhutan, the concept of time is generally considered non-linear and flexible. Meetings were often scheduled and rescheduled, typically with very short notice. A significant degree of flexibility was required in the arrangements made with all participants in order to accommodate varying schedules within the time constraints of the fieldwork.

4.3 Research design

The inquiry is concerned with experience as lived by the participants and, therefore, this study does not attempt to quantify or analyse statistically. Rather, it seeks to understand the views of stakeholders engaged in constructing the discourse on the modernisation of the educational system in Bhutan. Therefore, the nature of this study lends itself to

qualitative design. Table 3 below displays the research questions and the qualitative methods chosen to address each.

Qualitative methods were employed in order to address the three research questions. Rossman and Rallis (2003: 2) characterize qualitative research as ‘(a) naturalistic, (b) draw[ing] on multiple methods, (c) focus[ed] on content, (d) ...emergent and evolving, and (e)...fundamentally interpretive’. This study has a societal focus and is concerned with the perspectives of key stakeholders engaged at three different levels within Bhutan’s modern education sector: policy makers, education leaders, and teachers. As noted previously, research on Bhutan is scant, particularly in the social sciences (Roder, 2012), and earlier studies on the education sector have not brought the perspectives of educators to the fore. Therefore, qualitative methodology is particularly well suited to this study for two main reasons highlighted by Creswell (2003: 1) ‘a concept or phenomenon needs to be understood because little research has been done on it,’ and 2) ‘the topic has never been addressed with a certain sample or group of people’. Additionally, this study employs multiple methods of data collection as a means to corroborate data drawn from different sources (Silverman, 2009). Interviews, observation data, and documents were collected in order to triangulate the findings (Cohen & Manion, 2001; Robson, 2002).

Table 3: Research questions, participants, sampling and data collection methods

RQ1. At the political and policy level, what tensions are evident in the discourse on the modernization of the educational system in Bhutan?			
Key Participants	Sample	Sample Size	Method
Policy Makers Ministry of Education Officials Member of Parliament	Stratified Purposeful Sampling Snowball Sampling	9	Semi-structured Interviews
RQ2. At the level of the curriculum, what tensions are observable in the translation of discourse and policy into implementation?			
Key Participants	Sample	Sample Size	Method
Curriculum Developers Education Researchers Education Organization Officials Principals Teacher Trainers Teachers	Stratified Purposeful Sampling Snowball Sampling	11	Semi-structured Interviews
RQ3. How do teachers mediate the tensions?			
Key Participants	Sample	Sample Size	Method
Teachers	Criterion Sampling	51	Semi-structured Interviews
Sub-set of Observed Teachers	Criterion Sampling Snowball Sampling	7	Unstructured Observations
Total Sample Size			71

4.4 Navigating access

Contemporary scholars, particularly those in the social sciences such as Allison (2009), Crins (2008), Roder (2012), Whitecross (2002), and Ueda (2003), highlight the rigorous and time-consuming processes often associated with seeking permission to conduct independent research in Bhutan. As Allison (2009: 54) posits, restrictive policies toward foreign researchers are tied to ‘Bhutan’s insistence on keeping ownership of its own knowledge resources’. While conversations during the pilot project with government officials indicated there is movement toward building a ‘research culture’ in Bhutan, and scholars such as Roder (2012) point out that the government’s historically restrictive

standpoint is relaxing; the paucity of available doctoral dissertations authored by non-Bhutanese scholars suggests a cautious stance toward researchers from outside the country remains. At the time of writing, Ueda's (2003) study was the only available doctoral work on the modern education system conducted by a non-national under government approval. Bearing the aforementioned information in mind, the researcher adhered as closely as possible to cultural conventions and local research protocol while navigating multiple levels of access (Shah, 2004). Gaining authorization to conduct fieldwork for this research was a multistage process, requiring access to be granted from numerous gatekeepers throughout the project.

His Majesty Jigme Khesar Namgyel Wangchuck's Secretariat granted the first level of access for this study, a research visa, for the duration of the project. The research visa allowed entry into the country and permitted me to carry out interviews with members of the government, curriculum developers, and other individuals working with research organizations, but not those associated with public schools. Accessing the school research sites required a second level of approval from the Ministry of Education. A formal research proposal and CUREC forms (see Appendix VI), detailing the ethical considerations of the study, was submitted for review by a panel of MOE officials. Following review of these documents, the researcher met with Ministry members at the start of the pilot project to discuss the study, the proposed methodology, and to answer questions regarding the school-based data collection. Upon approval from the MOE, the researcher was given latitude to choose secondary schools for participation in the project. These schools were then listed on a formal authorization letter. While the authorization

letter gave full authority to conduct the project at the named schools, each individual school principal was considered as a ‘gatekeeper’. In other words, access was not assumed until, through conversations with the leadership at each school, it could be determined that participation was both informed and voluntary.

As Shah (2004: 557) points out, ‘how access has been gained and granted influences the relationship and rapport as well as the nature of data collected’. Therefore, the researcher was aware that her status as a student, invited to conduct her study through His Majesty’s Secretariat – with additional authorization through the Ministry of Education – likely had an effect on the participants and the data generated during the interviews. Given the tendency to respect and follow authority in Bhutan, the participants may have felt obligated to become involved in the study. Therefore, the information provided to participants was considered key in dispelling any perceived obligation to participate. Research protocol required that a copy of the letter of authorization, in addition to the information sheet and informed consent documents, be presented to each school principal or vice principal when initially soliciting participation in this study. However, the researcher made it clear, both verbally and in the documents, that participation was completely voluntary and could be terminated for any reason and at any point in the project. This was communicated to all participants at multiple points throughout the duration of the study. All of the participants were informed that their identity would be kept anonymous as far as possible. The observed teachers were duly informed that this study was in no way an evaluation of professional competence or pedagogic quality. While exhaustive attempts were made to clarify that this research was an independent

DPhil project, admittedly, the study's formal affiliations likely bore on the data collection and relationships with participants. Nevertheless, as will become apparent in Chapters Five, Six and Seven, the personal narratives and rich interview data elicited from the interviews provide evidence that rapport was established and trust was built.

4.5 Locating the fieldwork sites

As explained in the outset of this thesis, this study sought to explore the modernisation of the education system and, therefore, locating the study in the Thimphu and Paro districts provided optimal proximity to both the seat of government and numerous secondary schools. While many villages are within walking distance of a primary school, most secondary schools are located in more heavily populated areas. Furthermore, in rural regions, schools are scattered geographically and poor road conditions – or an absence of roads – prohibited frequent data collection. Therefore, it was only possible to address the three research questions while positioned in the Thimphu area.

Even while conducting field-work at schools near the capitol, the researcher sometimes found herself unexpectedly stranded due to sporadically serviced bus routes and an absence of taxis outside the city centre and reliant on rides back to the city from passing motorists. Most importantly, however, accessibility to the policy level individuals and education leaders would not have been achievable had the study been situated in any other area of the country. While there is urban bias in the collected data, the Thimphu and Paro districts permitted access to populations most relevant to the enquiry.

4.6 Sampling framework, sample sizes, and participants

As shown in Table 3 above, a duality of techniques guided the recruitment of participants. Non-probability sampling was employed to draw data from ‘particular named section[s] of the wider population’ (Cohen et al., 2000: 99). Participants were recruited from three bounded populations, namely, political and policy level officials, education leaders, and teachers. A purposive approach was also chosen as a means to achieve a sample ‘relevant to the research questions being asked’ and in order to ensure variety among participants (Bryman, 2008: 414). In other words, participants were sampled in a ‘deliberate way, with some purpose or focus in mind’ (Punch, 2005: 187). While this study will be weak in terms of empirical generalizability, the questions posed by this study are perhaps better addressed by the accounts of a limited number of participants and observations of the phenomenon in question. Furthermore, much of the data collected for this project is in the form of in-depth interviews, which are of course subjective. However, the researcher believes that the complex perspectives of participants are essential to addressing the research questions. While generalizability and reliability have been constrained by the sampling strategy, the limitations have been chosen consciously.

A description of the key participants and a framework for sampling decisions has been divided into three main categories and is described in Table 3. In order to protect the anonymity of the political and policy level (L1) participants and the education leaders (L2) as much as possible, a pseudonym has been ascribed to each. It is important to highlight that owing to the relatively small population of L1 and L2 participants the

possibility exists that they might be easily identified if their institutional affiliations were listed alongside their pseudonym and details from their backgrounds. Additionally, while they all hold high posts with considerable responsibilities, the exact titles of their posts are not identified in the study. The teacher participants will be identified by a pseudonym and their curriculum subject. Teachers' demographic information is available in Appendix III. An important distinction to be made is between the full sample of teacher participants and the observed teacher participants, which are a subset of the full sample.

4.6.1 Sample sizes

In addition to practical constraints associated with carrying out fieldwork as an independent DPhil student, the total number of interviews conducted was guided by two principles highlighted by Rubin and Rubin (1995: 1) completeness, and 2) saturation. *Completeness* is described as 'choos[ing] people who are knowledgeable about the subject and talk[ing] with them until what you hear provides an overall sense of the meaning of a concept, theme or process' (Rubin & Rubin, 1995: 73). In order to achieve *completeness* in the interview data, individuals considered to have expert knowledge, engaged at different levels with Bhutan's education sector, were interviewed until an overall understanding was attained which addressed the three research questions. The concept of *saturation* was also applied and was indicated by analysis, which was ongoing during fieldwork. Borrowing from Guest, Bunce and Johnson (2005: 60), saturation must be determined by the researcher, as there is little guidance in the literature regarding how 'saturation might be determined and no practical guidelines for estimating sample sizes for purposively sampled interviews'. The point of *saturation* with regard to the interviews was determined through ongoing analysis of the data. Following each audio-

recorded interview, a transcript was generated on the same day. Memos and reflections on the data were recorded simultaneously. A strong repetition of themes and concepts in the transcripts indicated that *saturation* had been achieved. In other words, interviews were conducted with each population until it was determined that further data collection would yield little new knowledge (Glaser & Strauss, 1967; Kvale, 1996; Rubin & Rubin 1996).

4.6.2 Political and policy level participants (L1)

At the first level (L1) of the hierarchy are officials in highly prominent positions who currently or previously held key roles in developing education policy. All but one of the members of this cohort hold honorific titles of *Lyonpo* or *Dasho*. The former being awarded to government ministers and the latter bestowed by the King in recognition of service to the country. The distinguished backgrounds of these individuals position them among the ‘elite’ in Bhutanese society. As Walford (1994: 227) points out, elite individuals are exceptionally knowledgeable and can ‘act as experts about events processes, [and] institutions’.

Some members of this group remain directly involved in shaping official education policy while others have been appointed to high level positions outside the Ministry of Education, e.g. the Royal Civil Service Commission, the National Council, the Department of Culture, Parliament, the Royal University of Bhutan. Others are or have also been engaged in key positions with research institutes. One member of this group has retired but his views were considered highly relevant given his lengthy experience with the education sector, the government, and his current expert knowledge of policy,

political, and social issues. As one member of this group pointed out, they can all be characterized as being ‘jacks-of-all trades’ for the reason that there are not enough qualified individuals and experts in Bhutan. The members of this group have all been ‘involved with everything, from the construction of schools to the writing of textbooks’.

This group is distinguished not only by their elite positions in society but also in terms of their lengthy experience with the modernisation of the education sector from its early development. The majority of this cohort grew up during a time of great transition and witnessed the vast social and economic changes that occurred during the process of modernisation. Additionally, education has played a major role in the career trajectories of this group, most of which can be thought of as ‘educational pioneers’ (Roder, 2012). That is, they were among the first in their families to receive a formal education. They were also among the first of their generation to attain graduate degrees abroad. Two members of this group hold doctorates. As a result of their advanced level of education, throughout their careers they were considered among the elite and often appointed into positions, in some cases by the government, their villages, or the King.

The ‘policy perspectives’ (Avalos, 1993) of this group were instrumental in order to provide a macro level understanding of the modernisation discourse on Bhutan’s education sector. Therefore, the nine government officials and high level decision makers who work and have worked on the development of the modern education sector were chosen using a stratified purposeful approach, by identifying from the larger group of political and policy level individuals with a range of relevant expertise. Patton (2002:

243) highlights that this approach ‘capture[s] major variation’ within a small sample. Greatly easing communication and rapport with some of these participants, a contact in the Bhutanese government introduced the researcher personally to several of the key officials involved in this study. This approach is termed ‘snowball sampling’ and it enables participants to be introduced or suggested to the researcher by others who identify ‘good interview participants’ (Patton, 2002: 243). Heeding the advice of Allison (2009: 56), the researcher considered ‘connections and introductions [as] vitally important’. Introductions to members of the L1 group contributed immensely to establishing trust and credibility with these individuals. A semi-structured interview schedule was used to guide the interviews with this cohort. In addition to addressing the semi-structured interview questions, these individuals offered rich narratives and historical accounts.

Concern was paid to the small number of Thimphu elites and the relative ease in which L1 participants’ identities could be compromised. In order to maintain the anonymity of these participants as much as possible, they were assigned pseudonyms and are introduced throughout Chapter Five. Identifying information from the interviews (e.g. reference to specific past positions or experiences which could allow unmistakable recognition of an individual) has been withheld from the analysis.

4.6.3 Education leaders (L2)

The middle level of the hierarchy captures the perspectives of stakeholders involved in translating policy directives into the curriculum. Examples of this cohort include curriculum developers and decision makers, officials with education organizations,

principals, and teacher trainers. In terms of institutional affiliations, members of this group were recruited from Bhutan's Board of Examinations, a College of Education, the Department of Curriculum Development and Research, and educational research institutes. The school principals involved in this study served at the schools which participated in this study. Not only were these individuals engaged as education leaders, many had also been teachers earlier in their careers and therefore held expert knowledge at the level of the school. Stratified purposeful and snowball sampling selected the population in this group. Education leaders were interviewed using a semi-structured schedule (see Appendix IV). The members of this group were given pseudonyms.

4.6.4 Schools

Underpinning the sampling choice of schools was the researcher's agreement with Bhutan's Ministry of Education, which was the local institution overseeing this study while the researcher was in Bhutan and the body through which permission to access public schools was obtained. The following criteria guided the purposive school sampling procedure: 1) the schools selected were public middle secondary level, and 2) the schools were located in an area that allowed for frequent collection of data. Achieving a sample within commutable distance was essential because school schedules often changed unexpectedly due to various events or adjustments in the class schedule for tests, sometimes on the day of scheduled interviews or observations. A high degree of flexibility was required on the part of the researcher in order to conduct interviews and observations at times that would not be disruptive to the school or teachers' schedules.

4.6.5 Foci on class 10 middle secondary school teachers

Several practical factors guided the selection of middle secondary school teachers. Most importantly, teachers at the Middle Secondary level are required to have an academic background in their curriculum subject. Secondary school teachers have completed 16 years of schooling and typically hold a Bachelor's Degree with some also possessing a teaching qualification and/or a Master's degree. At the primary level, teachers are not required to hold a Bachelor's degree or a teaching qualification (iDiscovery & Royal Education Council, 2009; Ministry of Education, 2009). Therefore, the potential exists for primary school teachers to be deficient in basic content knowledge and, therefore, they might be coping with challenges related to their subject knowledge, which might take precedence over any other tensions arising in the classroom.

Relevant to the aim of the study, middle secondary school teachers with deeper content knowledge might be better able to identify and articulate any tensions they perceive between traditional epistemologies and their curriculum subject. Supporting this sampling decision is the emphasis in the curriculum at the middle secondary level on analytic and creative thinking (Ministry of Education, 2009). Therefore, tensions that arise were considered more likely to elicit discussion at the middle secondary level than in earlier levels. In addition, education is mandatory and provided at no cost to students through class 10 – i.e. class 10 is the terminal level of education for most Bhutanese (Policy and Planning Division, 2010). Higher secondary schools were excluded mainly because the majority of expatriate teachers in the education system are employed at that level (Policy and Planning Division, 2010). While expatriate teachers were not excluded from the pool of class 10 teacher participants, a high number of expatriate teachers would assumedly

have altered the study. In terms of practical considerations, there are a greater number of secondary schools in Thimphu than public higher secondary schools therefore providing the opportunity to recruit from a larger pool of potential participants. For all these reasons class ten was determined to be the most relevant to the inquiry.

4.6.6 Teachers (L3)

The cohort of 51 teachers provided the ‘lived experience narrative’ (Connelly & Clandinin, 1990) and micro level (L3) perspective of how policy text is translated into practice. Their practice may be bound to a certain extent by top-down directives and constrained by curriculum. However, teachers’ practice is also shaped by numerous other factors, including traditional knowledges and ways of viewing the world. In order to recruit the teacher participants, school principals were given the criteria to select teachers from across the curriculum subjects and with a diversity of key characteristics, including training, age, years of experience, and native region (see Appendix III). These characteristics were considered the criteria of the criterion sampling strategy (Patton, 2002) employed to recruit the teacher participants. The criteria were also considered pertinent units of analysis. Several key practical constraints also contributed to the selection of teachers. Most importantly, the researcher sought to minimize the demands placed upon participants. The number of teacher interviews also had to be achievable with respect to school timetables. In addition, it was necessary to schedule intervals between school visits to transcribe interviews and engage in ongoing data analysis. Flexibility was required throughout the fieldwork and particularly with the cohort of teacher participants whose schedules changed frequently due to their workload.

The teacher participants represented a range of years of experience, from 2 to 30, and a plurality curriculum subjects (see Appendix III). Many of the teacher participants taught more than one subject and several held additional posts in their schools, e.g. school counsellors, club leaders, and vice principals. Teachers hailed from fifteen of Bhutan's twenty dzongkhags and ten were Indian nationals.

Here, the researcher acknowledges that while some of the principals adhered to the selection criteria and recruited a balanced sample, others admitted selecting certain teachers because they were 'good' or because they spoke 'clearly' and would be easily understood by the researcher. These preferences inhibited the recruitment of a balanced number of Dzongkha teachers. Certainly, the two participating Dzongkha teachers spoke English with less fluency than the other participating teachers, all of whom taught their classes entirely in the English language. Notably, the Dzongkha teachers in this study attended a teacher training program but did not receive formal primary or secondary education. This may have contributed to the tendency among principals to avoid recruiting Dzongkha teachers despite the researcher's efforts to achieve a balanced sample.

4.6.7 Observed teachers

In order to triangulate data from the teacher interviews and illustrate their accounts of the classroom context, this study sought examples (see Table 4) of how teachers mediate the tension between traditional forms of knowledge and the modern curriculum in science subjects. Examples of classes observed include biology lessons, which present modern approaches to medicine contrasting with the traditional; physics classes presenting views

of the cosmos, which contrast with the traditional; and lessons on health which conflict with traditional beliefs. The classes of a subset of seven science subject teachers were observed over a period of four months. Six of the observed teachers were selected according to the criteria of their subject area. In other words, criterion sampling was employed to identify participants from the main pool of teachers (Patton, 2002). At most of the schools, the principal identified a science teacher who would serve as the observed teacher. This sampling decision sought to minimize demands placed upon principals and teacher participants. Therefore, two practical criteria were considered: 1) the teacher's timetable and; 2) the class lesson plan. However, in one instance, a teacher, who had participated in the pilot study introduced the researcher to a science teacher who agreed to be observed. In this case, the observed teacher was selected using snowball sampling. Observations were conducted with the teacher as the focal point, following the procedures outlined in CUREC Protocol 15.1 (see Appendix VII).

4.7 Defining the scope of the observations: selection of science subjects

In order to directly access the pedagogic strategies and situations described by teachers, it was necessary to observe classes where the content of the curriculum was in sharp contrast with traditional forms of knowledge. The decision to observe science classes was steered both by the data drawn from interviews and observations conducted during the pilot study and by the literature (Gallard & Gallagher, 1994; Lee, 2002; Ogawa, 1986; Shiva, 2006; Shumba, 1999a, 1999b; Yakubu, 1994).

The piloted interviews and observations showed that teachers of all curriculum subjects identified varying types and degrees of tension between traditional and modern

epistemologies. However, these tensions seemed to be particularly evident in science classes, where curricular content frequently clashed with traditional knowledges and ways of viewing the world; and, as a result, teachers were charged not only with infusing culture and values into their lessons as required by the GNH policy, but also with mediating the tension between traditional and modern, scientific epistemologies. Furthermore, these tensions seemed exacerbated when modern, scientific topics are taught in class, but are not supported by parents or the community. For example, many teachers cited biology lessons touching on abortion and Western health practices as conflicting with traditional ways of knowing. This is reflective of Childs et al.'s (2008: 14) findings, which identified science teachers in Bhutan 'drawing on examples of science from the locality in their teaching'. The National Curriculum Framework (Ministry of Education: 2009) identifies science subjects as integrated science, physics, chemistry, and biology. Therefore, teachers of these subjects were chosen as the subset of observed teachers for the main period of fieldwork.

The total number of teachers' classes observed reflected practical limitations with respect to timetables, teachers' preferences, and lesson plans. While public school teachers are required to deliver certain lessons prior to exams at the end of the semester, the timing of lessons relevant to the research project was fluid and varied amongst schools. Teachers dictated the number of observed lessons and specific classes were chosen based on their relevance for the purposes of the study (Simpson & Tuscon, 2003). Between 1 and 3 fifty-minute science classes were observed at each of the six participating schools.

4.8 Documents

Available texts, including oral texts such as radio discussions, written policy documents, and newspaper articles were referred to in the analysis. These texts provided important background and contextual information and which resonated with the data. These texts were examined in Chapter Two.

4.9 Data collection techniques

4.9.1 Semi-structured interviews

Semi-structured interview schedules (see Appendix IV) were employed during the sessions with teachers, education leaders, and political and policy level participants (see Table 3: Research questions, participants, sampling and data collection methods). At the initial point of contact, the researcher introduced herself as a DPhil student and presented the research agenda. Information sheets, informed consent documents, (see Appendix VIII and IX) and a business card with the title of ‘Doctoral Student, University of Oxford’ and the researcher’s email address and local phone number were provided prior to the start of the interview. In instances where participants dismissed or refused to review the information sheets, the researcher provided information about the study, including ethical considerations and anonymity orally.

A semi-structured interview format, widely used in qualitative studies, was chosen because, as Punch (2001) notes, semi-structured interviews allow the researcher to utilize a schedule while having the latitude to vary the sequence in which the questions are asked and also ask additional questions. In this style, the ‘interviewer does have a specific agenda to follow and will have selected beforehand the relevant topic areas and themes to

pursue' (Arksey & Knight, 1999: 7). Employing a semi-structured format allows information to emerge that would otherwise be excluded from a structured interview. Additionally, semi-structured interviews lend themselves to increased reliability and replicability by allowing the researcher to identify convergences and divergences between data drawn from multiple interviews conducted in similar formats and questions.

In cases where informal, conversational interviews were determined to be more appropriate, the researcher invoked the semi-structured interview schedule as a guide and similar questions were asked during conversations. The researcher followed the flow of conversation and asked additional questions as salient topics emerged. Informal, conversational interviews were conducted when the researcher determined that audio-recording the dialogue might cause the interviewee an 'increase in nervousness and dissuade frankness' (Arksey & Knight, 1999: 50). Further, the researcher recognizes the importance of building trust in relationships with participants over time (Marshall & Rossman, 2006). While conversational interviews did not contribute to the transcribed, coded and analysed data, they did provide rich contextual information and contributed to the researchers overall understanding of the discourse on the modernisation of Bhutan's education sector.

The interview settings

Bearing in mind that the interview setting is significant and relevant to the overall analysis as it can influence the quality of information yielded from the participant (Arksey & Knight, 1999; Seale, 2004), the interviews generally took place in professional settings, e.g. an office or conference room. The interviews with the L1 and L2

participants were conducted in ‘elite settings’ (Fitz, Halpin & Power, 1994: 34), i.e. locations in which education policy and directives are developed. The interviews in school settings were carried out either in conference rooms or unused office spaces. In all cases, quiet spaces free from noise and other distractions in locations convenient for the participant were sought. An office assistant would usually provide tea and cookies for the researcher and participants, lending to a genial atmosphere.

During all of the interviews, an audio recorder was placed on the table, in clear view of the participant, as well as a notepad and pen to record relevant thoughts and impressions. As many of the participants had not participated previously in an interview study, providing a comfortable and professional context seemed to facilitate the generation of rich data and mitigated any disruption to the ‘flow’ of conversation.

4.9.2 Observational approach and foci

The aim of the observations was to gain understanding and insights into teachers’ classroom practice and observe *in situ* the context within which the curriculum is enacted. In other words, the situations and pedagogic strategies teachers described during the interviews were observed. Further, the observation sessions allowed for additional, unexpected, and otherwise overlooked information to arise. For example, the researcher recorded in her field notes that the teachers who drew heavily on traditional epistemologies in all cases incorporated this into the classroom environment in the form of educational posters detailing aspects of Bhutanese culture. In addition, observations are considered to provide a ‘fruitful source of insights and clues that focus data collection more tightly’ (Marshall & Rossman, 2006: 99). Thus, the observational record served as

an important source of information to illustrate and corroborate teachers' accounts of what they said they did and what they did in practice. As Cohen and Manion (2002: 305) point out:

[Observations] enable[e] researchers to understand the context of programmes, to be open ended and inductive, to see things that might otherwise be unconsciously missed, to discover things that participants might not freely talk about in interview situations, to move beyond perception based data (e.g. opinions in interviews), and to access personal knowledge.

The observation methodology for this research comprised a largely unstructured approach, but sought examples of how teachers mediate the tension between traditional knowledges and the curricular content of science disciplines. The broad focus for the classroom observations was guided by the research questions (Jones & Somekh, 2005) and the organizational rubric (see Table 4: Organizational rubric for classroom observations). However, the researcher kept an open mind while observing teachers' daily routines and recording impressions of the context, classroom events, and unique impressions of instructional strategies. Therefore, the rubric did not blinker the observations, but allowed systematic documentation of the occurrences of the strategies identified by the teachers themselves during the interviews.

Table 4: Organizational rubric for classroom observations

Strategy	Example
Accommodating ¹	Traditional epistemologies are known, subsumed, and paired on equal footing with modern content of the curriculum
Inviting discussion	Discussion of traditional and modern epistemologies is encouraged
Subordinating	Traditional epistemologies are presented as subordinate to modern
Dismissing	Traditional epistemologies are avoided or dismissed

Marshall and Rossman's (2006) procedure for creating an observational record was applied. Systematic note taking documented behaviours and events in the classroom setting. Objective and concrete descriptions provided a record of teachers' classroom practice, particularly the strategies being used by teachers to mediate tensions. This record was also significant to the interviews in that it allowed the researcher to cite specific pedagogic strategies during the interviews, e.g. instances where traditional knowledges and worldviews converged or diverged with the content of the curriculum. Following Brown and McIntyre (1993), citing observed, concrete pedagogic strategies during the interviews with teachers rather than referring to the researchers own ideas or imagined strategies contributed to a more authentic account of classroom practice. Furthermore, citing observed instances of tensions was particularly important as in some cases, the word 'tension' was not understood and referring to an observation served as a prompt during some of the teacher interviews. In some cases, the researcher had the

¹ Ogunnyi (1988: 8) argues that in traditional societies 'the aim [of science education] should be geared towards *accommodation* rather than *assimilation*' (emphasis added).

opportunity to carry out an interview, conduct an observation, and query teachers about their classroom practice during a follow up interview. In these cases, the researcher would refer to particular instances of conflict between the curriculum and traditional epistemologies seen during an observation session. The researcher would then query the teacher about a particular pedagogic strategy employed in their own classroom. In other cases, it was not possible to observe a teacher prior to an interview. In these cases, the researcher would cite tensions observed in other classes or examples of tensions from interviews with other teachers.

In terms of the analytic procedure, the observational record allowed for patterns and analytic insights to emerge. In order to capture the best possible record of the observation sessions, the detailed notes from each session were typed up on the same day. The observational records were analysed alongside the transcript data and contributed to the quality of interpretation and triangulation of data gathered in other phases of this study.

The observation sessions also benefits the inquiry by enabling frequent interaction with teachers and therefore allowing the researcher and teachers to develop rapport with each other. Spending time in the school settings for a prolonged period of time enabled trust to be built and is expected to have diminished any difference in status between the participants and the researcher. Developing equal relationships built on trust generated 'greater openness and insight, a greater range of responses, and therefore richer data' (Punch, 2005: 173). Additionally, these relationships led to greater familiarity with the lives of teachers, and also led to interesting conversations, which enabled a deeper

understanding of contextual information. For example, details about life as a teacher, local culture, and culturally embedded meanings of words and phrases.

4.11 Reflexivity: positioning the self in the fieldwork setting

A reflexive approach was taken toward the project design, data collection, and analysis. Reflexivity considers the ‘researcher [as] a central figure who actively constructs the collection, selection and interpretation of data’ (Finlay & Gough, 2003: 5). As Hsiung (2008: 212) points out, reflexivity is imperative for qualitative inquiry as it ‘conceptualizes the researcher as an active participant in knowledge production rather than a neutral bystander’. Borrowing from Finlay and Gough (2003: 4) reflexivity is defined as ‘the project of examining how the researcher and intersubjective elements impact on and transform research’. In this section, the ontological and epistemological positions adopted by the researcher will be detailed.

4.11.1 The researcher’s role as an interviewer

Following Kvale (1996: 117), ‘the importance of the researcher as a person is magnified because the interviewer him-or herself is the main instrument for obtaining knowledge. Perceptions of the researcher can affect rapport and therefore can affect the overall quality of the data’. Furthermore, the role of the researcher, and how participants perceive that role, may affect the research interview (Rubin & Rubin, 1995).

Recognizing that her own social characteristics (e.g. ethnicity, age, gender, perceived social status, style of dress) may have a bearing on the dynamics of the interview, the researcher sought to mitigate any misperceptions. This was a concern as the researcher was sometimes assumed to be a Bhutanese national because of her physical appearance;

particularly when wearing a *kira*, the national dress for women, which is mandatory at schools, most workplaces, *dzongs*, and government offices. In some instances, the researcher was mistaken to be a teacher, parent, or member of the Ministry of Education assumedly sent to conduct an evaluation. While Bhutanese national dress is considered to be a sign of respect, the researcher did not want to obscure her identity. Therefore, professional Western-style clothing was worn during the field research.

As mentioned previously, Bhutan has a small population and many of the participants held social or familial connections with one another. In many instances, participants had heard about the researcher's personal background and the purpose and aims of the study from others involved in the project. It was important to attempt to ensure that participants' precursory knowledge of the research and researcher did not result in 'contaminated' interview data (Onwuegbuzie & Leech, 2007; Scott & Usher: 1999). Here, the notion of contamination refers to the possibility that previously held knowledge led to bias on behalf of the participants and the risk that the resulting interviews could therefore be contaminated. In order to limit, as much as possible, any bias stemming from preconceived notions, the following strategies highlighted by Miles and Huberman (1994: 266) were employed:

- A prolonged engagement in the field; spending time 'hanging around' and 'fitting into the landscape.'
- Clarifying the aims and intentions of the study to participants; explaining why I was there, my field of study, why I was studying it and what will be done with the collected data.

Participants who had learned of the study from a friend or colleague often stated a positive interest in the project based on what they had heard. Mutual contacts and acquaintances vouched for the competency and credibility of the researcher and the study, thereby creating a climate of goodwill in the researcher-participant relationships.

As will become apparent in the proceeding findings chapters, many of the participants appeared to feel at ease sharing their deeply personal and passionate views during the research interviews. Generally, the participants in each of the three populations shared their opinions with noticeable enthusiasm. The lively discussions and rich quality of the interviews suggested that rapport had been established between the researcher and interview participants.

4.11.2 The researcher's role as an observer

During the observation sessions, the researcher sought an unobtrusive and peripheral role in the classroom (Punch, 2005). A complete observatory stance, defined by its non-participatory and non-reactive characteristics, was maintained (Cohen et al., 2000; Robson, 2002). However, as Simpson and Tuson (2003: 55) caution, 'observation is the most intrusive of all techniques for gathering data'. However, the researcher was also cognizant that her presence in the classroom may hold some effect on the teachers being observed. As Patton (2002: 269) stresses, '[p]eople may behave quite differently when they know they are being observed versus how they behave naturally when they don't think they are being observed'. The researcher, therefore, may impact the behaviour of those observed to some extent (Jones & Somekh, 2005). Furthermore, their influence is not always neutral (Cohen et al., 2000: 315). Borrowing from Simpson and Tuson (2003:

56), in order to diminish potential negative effects as much as possible, the researcher must: 1) 'be sensitive to those [being] watch[ed],' 2) 'build up a relationship of trust' and 3) 'be clear on what your role is'. The researcher sought a 'fly-on-the wall' role in the classroom in order to observe teachers' strategies in as normal a setting as possible.

The researcher made clear to all participants the purpose and planned use of the observational record at multiple points throughout the duration of the study. Additionally, the researcher offered to provide a copy of her field notes, including the observational record to the teacher participants. Informed consent documents (see Appendix VIII and IX) were provided to each teacher prior to engagement in the research project. At the start of each observed class, typically, the teacher participant would introduce the researcher to the class and provide a short description of the study. The researcher would invite the students to ask questions about any aspect of the project. The students were informed that the researcher would only be focusing on the teacher's pedagogical strategies and would not be observing the students, in line with CUREC Protocol 15.1 (see Appendix VI). The researcher would typically sit in the back of the class in an effort to be as nondisruptive as possible. However, given the apparent lack of study-participation experience among the observed teachers and students, the researcher's presence might have bore on the situation. This is expected, however, as a significant consideration when using observation methodology is the extent to which the 'observer affects the situation under observation' (Robson, 2002: 311).

4.11.3 Cross-cultural communication

As mentioned previously, one of the languages used in Bhutan is English and it is also the language of instruction in the modern school system. However, as a researcher in a foreign setting, it was imperative that the implications of communicating cross-culturally be considered during all phases of the study. While the researcher and participants conversed in a common language, as Hymes (1972) points out, cultural perspectives may or may not be shared by interviewer and interviewee.

Engaging in interview research in another country context without a ‘shared cultural experience’ (Shah, 2004: 522) can engender misinterpretation of data, bias, and a failure to accurately interpret communication during interviews. As Maude (2011: 59) maintains, ‘[m]iscommunications and misinterpretations occur because people from different cultural backgrounds have different ways of sending and receiving messages, different communicative norms’. Maude (2011: 57) explains:

Cultural noise – impediments to communication that occur when people from different cultures interact (O’Connell, 1997: 58) – often leads people to misunderstand others’ intentions and meanings in cross-cultural situations. Words such as ‘democratic’ or ‘free,’ for instance, have different meanings for people from different cultures.

The researcher kept in mind the possibility that participants might interpret the interview questions differently than intended. Equally significant was the risk that the researcher might misinterpret participant responses or data gathered during the observation sessions. Knowledge of the ‘cultural vocabulary’ was considered essential in order to frame questions more meaningfully (Rubin & Rubin, 1995). Therefore, a Bhutanese national,

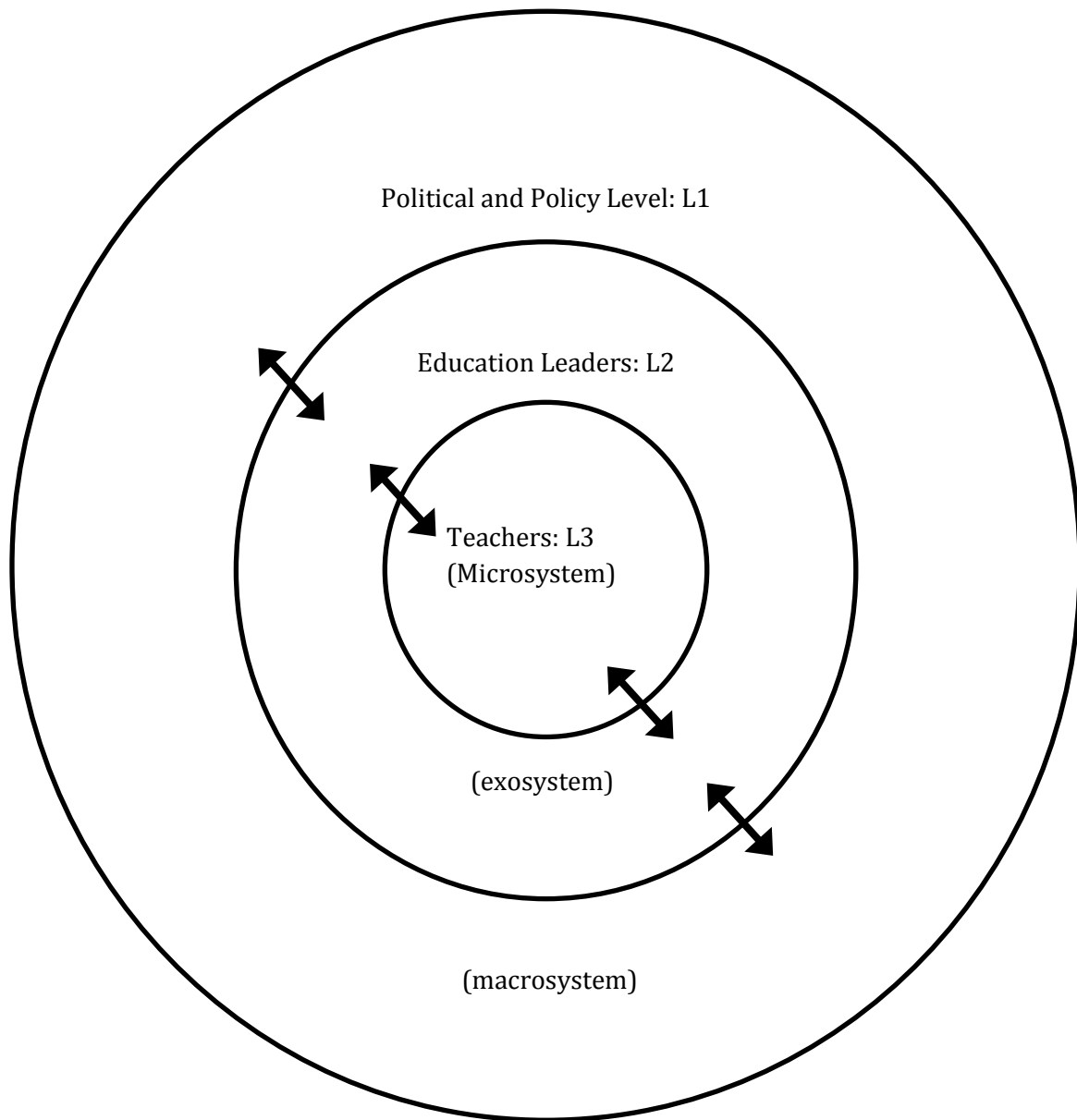
who was also a teacher, served as a cultural and linguistic translator as needed. This individual reviewed the interview questions for clarity and identified words which might be understood differently by the interviewees. For instance, the word ‘tension’ was understood to have a negative connotation and was often replaced by ‘contrast’ or ‘difference’. Further, the cultural translator was consulted when the meaning of language used by the interviewees could not be deciphered. For example, many teachers used the term ‘mugging up’ to denote memorization. Oftentimes the culturally embedded meanings of words or phrases were defined within the flow of conversation. For instance, the recitation of memorized course material was often referred to as ‘pouring out,’ ‘come out’ and ‘vomiting out’. In other cases, the researcher clarified cross-cultural misunderstandings by invoking three strategies outlined by Maude (2011: 66):

- ‘repeating the original point but using simpler words;
- using different illustrations and examples;
- providing extra information so as to set the message in a wider, more comprehensible context’.

Probes were used throughout the conversations to clarify any cultural concepts, which were unfamiliar to the researcher (Rubin & Rubin: 1995). Tentative understandings of words, concepts or phrases were confirmed with the cultural translator. However, it is possible that despite making every effort to understand tacit and subtle meanings of spoken and body language, misinterpretations may exist in the interview transcripts and observational record.

4.12 Analytic approach

This research followed an iterative process of multi-level thematic analysis in order to unravel the tensions evident in the discourse on the modernisation of Bhutan's education system. Analysis was concerned with participants' own definitions of salient terms such as 'modern' and 'traditional'. Analysis privileged participants' own voice and was sensitive to how spoken language and text were used (Punch, 2005) at the macro, exo, and micro levels to construct and represent evident tensions. That is, the ways in which participants 'actively construct[ed] and employ[ed] categories in their talk. Further, all categorization [was] provisional; analysis require[ed] constant reflexive attention to the process of categorization of both the participant and the analyst' (Wood & Kroger, 2000: 29-30). During all phases of analysis, Srivastava and Hopwood's (2009: 78) framework steered a continuous analytic loop in which the following three questions were asked: 'Q1: What are the data telling me? Q2: 'What is it I want to know?' and (Q3) What is the dialectical relationship between what the data are telling me and what I want to know?' In order to address the three research questions, transcripts were organized according to their level in the hierarchy, which is represented visually as a series of interactive 'layers'. Attention was focused on the interconnections between the layers of the populations and the dynamics between them, as illustrated below.



**Figure 1: Bounded populations, levels of analysis, and interrelationship of data across levels
(Adapted from Bronfenbrenner, 1979)**

As a general principle, data (e.g. text, classroom talk, and conversations) were viewed and categorized according to its level of hierarchy and the interrelationships and

interactions between accounts were probed. The analytic process was carried out in three phases and is described below in detail.

4.13 Stages of analysis

This section sets out the three main stages of the iterative process of data analysis applied to the interview transcripts, observational records, and field notes.

4.13.1 Preliminary stage: immersion in the data

Immersion in the data occurred immediately through daily transcription of notes, observational records, and interviews on the same day. The interviews were transcribed verbatim with absolutely no omissions in order to capture the best possible record of the participants' voices. Following transcription, all interviews were read through thoroughly to check for errors. During the transcription and checking process, memos were created, which documented patterns and reflections on the data, theoretical decisions, and issues that arose. From these sources of data, a preliminary analysis identified patterns in the transcribed data. Data was prepared and analysed concomitantly, reflecting the iterative approach used throughout the analytic process.

As a final step in the preliminary phase, and as an additional means to ensure rigor and thorough engagement with the data, all interviews were entered into NVivo, a qualitative data analysis program. NVivo was employed as a tool to manage and code data from the hundreds of transcript pages generated during fieldwork. All transcripts were entered as 'source' documents into NVivo. Each transcript was then formatted as a 'node' according to the participant's level in the hierarchy. Participant nodes were then organized by level into folders. Two additional folders housed data nodes grouped by: 1) codes and, 2) key

interview questions. Nodes were later developed into codes and sub-codes during the next stage of analysis described below. The codes used to label the data were considered to be themes. Following Boyatzis (1998: 4) themes are ‘a pattern found in the information that at a minimum describes and organizes the possible observations and at a maximum interprets aspects of the phenomenon’. This software further benefited the study by enabling text to be queried. For instance, text was probed across populations for key terms such as ‘modernisation policies’ and ‘curriculum reform’ allowing participants views to be compared and contrasted. However, it merits mentioning that while NVivo aided in the organization of data and rigorous engagement with the transcripts, its utility was limited. The researcher printed out each transcript and revisited the audio-files during the iterative process of identifying themes. The subsequent phases of analysis are described in detail the following subsections.

4.13.2 Stage one

The first phase comprised visiting and revisiting the data while coding the 71 transcripts. Some codes arose from the literature and others emerged from consideration of and immersion in the data. In other words, inductive and deductive approaches to coding were deployed in order to rigorously examine the data for salient themes. Researchers’ decisions regarding which topics to cover and how best to query participants about those topics are a fruitful source of a priori codes (Dey, 1993: 98). A priori codes were deductively generated in two ways: 1) from the semi-structured interview questions and; 2) from the organizational rubric, which documented teachers’ pedagogic strategies. The semi-structured interview questions, which guided the conversations, represent ‘domains of inquiry’ and served as *structural codes* (Guest & McLellan, 2003). For example, each

participant was queried on: 1) their perceptions of tensions, 2) their response to these tensions, 3) to what extent the response is effective, and 4) the perceived role of education in mediating the tension, if any, between traditional ways of life and modernisation (see also Appendix IV). As Guest and McLellan (2003: 190) point out, structural codes ‘provide a context within which to analyse and interpret responses’. In other words, structural codes allowed the researcher to access and frame the coded data by its context. Analysis at this stage also followed Fereday and Muir-Cochrane’s (2006: 88) procedure for thematic analysis, and ‘was guided, but not confined, by the preliminary codes’.

Following the application of structural codes, an inductive strategy was used as a method to ensure rigor in the analysis. This step was crucial to the analytic procedure as many of the participants spoke in a non-linear fashion and, therefore, relevant information arose within and outside of the interview schedule. Further, the interviews were guided but not confined by a semi-structured schedule and unexpected information often emerged. For instance, under the code ‘teachers’ pedagogic strategies,’ the following sub-codes were identified based on repetition across the 51 teachers’ transcripts: ‘student centred teaching,’ ‘rote-style teaching,’ ‘corporal punishment/traditional discipline’. Inductive codes were identified based primarily on repetition and the majority of these are in the words of the participants. As Braun and Clarke (2006: 83) maintain, inductive coding is considered a ‘process of coding without trying to fit it into a pre-existing coding frame, or the researcher’s analytic preconceptions’. That is, the researcher kept an open mind and attempted to withhold any predetermined ideas while revisiting the transcripts. During

this analytic phase, some segments of text were assigned more than one code. For example, several teachers' descriptions of how he or she presented concepts of traditional medicine alongside and on equal footing with lessons in the text on concepts related to Western medicine or health also described asking students to discuss their own personal beliefs. Such text segments would be coded as both 'drawing on traditional knowledge,' and 'inviting discussion'.

Conversations with participants often elicited salient historical narratives. While the focus of this study is on the current tensions in the discourse on the modernisation of the education system, conversations with the most highly experienced, senior level participants often turned toward the past, tracing the current tensions to their historical roots. The researcher realized it would not be possible to fully understand the current tensions without creating a historical context for the modernisation process and therefore, pertinent vignettes were coded and included in the analysis. For example, some participants' reflected on lifestyle and infrastructural changes they had experienced as students during the early development of the modern education system. Other participants described ancient folktales and stories invoked to explain current local beliefs or ways of life. For instance, several teachers described stories regarding deities residing in parts of the country which they drew on to support lessons on environmental conservation. As Allison's (2008: 38) research on Bhutan highlights, 'much of the knowledge in this oral culture is embedded in stories'. These narratives were not overlooked during the analysis. Described by Kvale (1995: 201) as 'spontaneous stories,' which emerge during the interview process, narratives can benefit the inquiry by 'providing new convincing

insights and opening new vistas for understanding the phenomena investigated'. The process of visiting and revisiting the transcripts and scrutinizing the data was ongoing throughout the analysis, as illustrated by Figure 2 below.

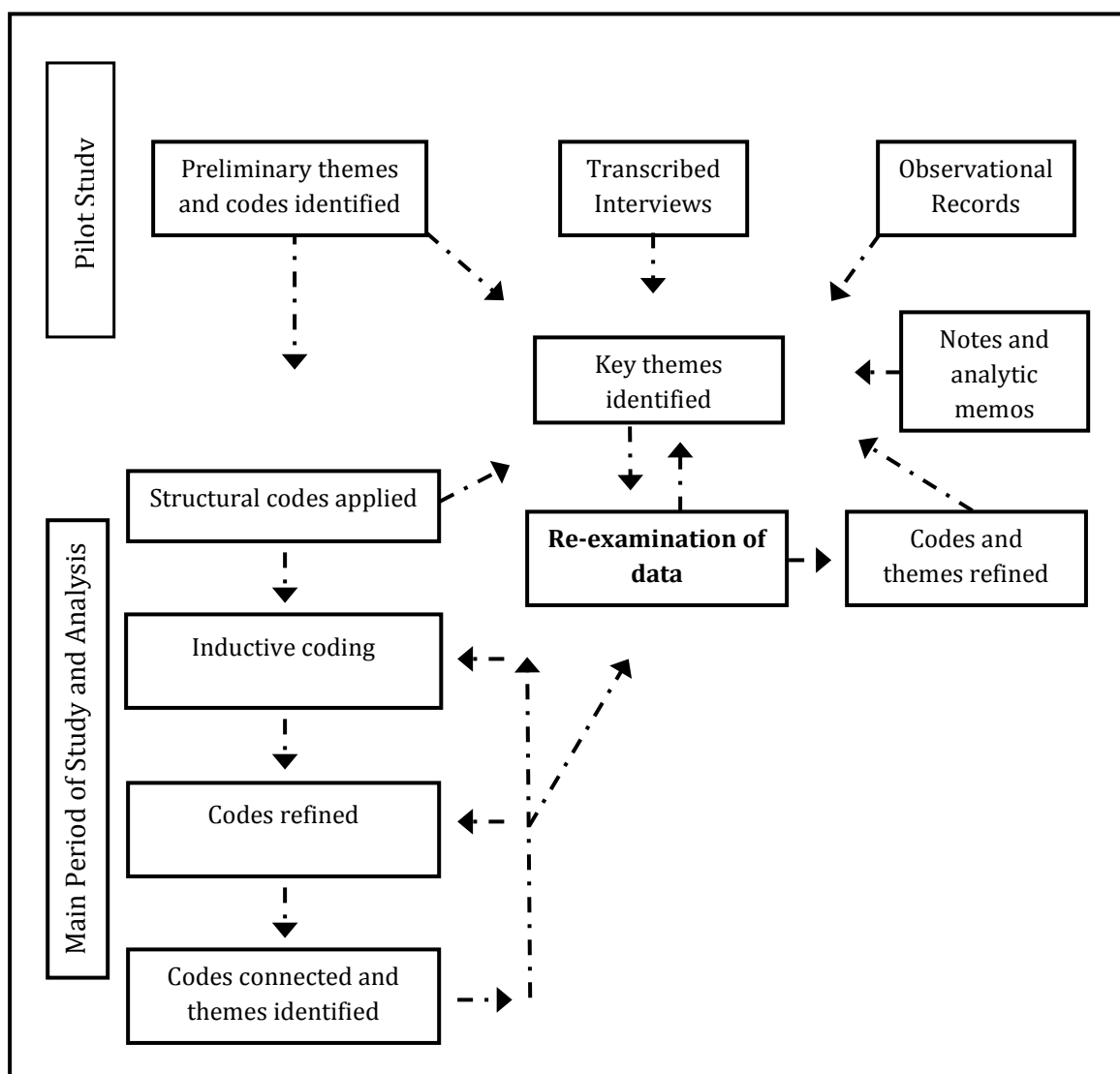


Figure 2: Process of data analysis

While this representation of the analysis process appears linear, it cannot be emphasized strongly enough that making meaning from the data involved numerous rounds of visiting and revisiting the transcripts before a methodical approach to analysis was developed.

Once the analytic loop (Srivastava & Hopwood, 2009) took shape, adhering to this process ensured that codes and subsequent themes were checked continuously, lending to increased reliability. Consistencies were discerned to form a provisional set of 13 themes and 33 subthemes from the data (see Appendix V).

4.13.3 Stage two

During this phase, the data was revisited and the code set was refined. That is, redundant codes were eliminated and some new codes were generated. Data was analysed within and across each level of the hierarchy for ‘similar phrases, patterns, themes, relationships, sequences’ (Miles & Huberman, 1994, cited in Robson 2002: 459). Consistencies were discerned to form a set of generalizations from the data that resonated with the theoretical literature (Chapter Three), which were gradually elaborated upon. Borrowing from Fereday and Muir-Cochrane’s (2006: 82) approach, themes were ‘supported by excerpts from the raw data to ensure that data interpretation remain[ed] directly linked to the words of the participants’. For example, the code ‘curriculum’ contained the sub-code ‘mediation of tension’ which was linked to the following text excerpt from the transcript of an ‘education leader’:

we try to balance the traditional and the modern. In the modern, we try to draw upon the latest research into teaching and learning. For example, we deal with the constructivist notion of how students learn to construct their own worldviews, and how they create their own knowledge. While we emphasize these notions, we also emphasize the need to recognize their own mind monitor their own mind, what is going on in their own minds. It’s a beautiful balance...modernist ideas and Buddhist ways of looking at the human mind.

While NVivo was employed at this stage of analysis in order to continually query the text and view the codes and associated excerpt, the researcher also referred to printed transcript documents and viewed them alongside the written observational record, field notes and other documents which resonated with the data. As previously stated, the organizational rubric in Table 4 was employed to guide the collection and analysis of observation data and to reduce data overload as much as possible. The observations provided an illustration of teachers' pedagogic strategies (e.g. *accommodating, inviting discussion, subordinating, dismissing or avoiding*) and knowledge of the context in which teachers work. It was, therefore, useful to view the text excerpt in context and alongside the transcript data in order to analyse congruities and incongruities between the data across the various sources. As Phillips and Hardy (2002) point out, text and context are both central toward rigorous analysis of discourse. Additionally, analysis of the observational record facilitated triangulation of the data. Observational data supported the analysis by allowing additional 'categories and concepts for . . . analyzing the observational data [to] emerge' (Punch, 2005: 180). As the research process matured, so did the method of analysis, resulting in one that was progressively more focused and targeted.

* * * * *

Having demonstrated in this chapter the approach taken to collect and analyse the data in order to approach the study's three research questions, the next three chapters presents the findings of the study. While the next chapter, Chapter Five, examines the tensions in

the realm of policy and politics, Chapter Six analyses the tensions that emerged for education leaders and teachers in the process of translating curriculum policy to the level of the school. Finally, Chapter Seven evidences teachers' pedagogic strategies for mediating the tensions inside the classroom.

Chapter Five: Competing ideas at the political and policy level

While change is inevitable, the challenge is to strike a balance between progressive development and preserving the tested value system of a traditional society (Ministry of Health and Education, 2003: 8).

5.1 Introduction to the chapter

Having set out the theoretical, historical, and methodological contexts of this study throughout Chapters One to Four, this thesis now turns to the analysis of the empirical data. In the process of interpreting the empirical data, two overarching questions were raised and kept in mind during the analysis: (1) In Bhutan's attempts to modernise the education system, what tensions, conflicts, and uncertainties have emerged? (2) Do they present themselves in different ways across multiple levels of the education system?

This chapter establishes the findings with respect to the tensions in the discourse on the modernisation of the education system from the viewpoints of key political and policy level decision makers. The findings presented here follow the theoretical literature (Chapter Three), however, are largely descriptive in order to provide details about the evident tensions from the largely historical view of key officials responsible for the development of national education. The overarching theme of this chapter is that the current tensions in the education sector stem from the adoption of a Western form of education into Bhutan. Despite education reforms aimed at infusing aspects of tradition into the national curriculum, tensions are ongoing and are not yet resolved. Based on the analysis of the data, this chapter identifies that (1) the foreign nature of the national

education system, and (2) its perceived association with social change, have both given rise to discord from the perspective of key officials engaged with policy and politics.

Prominent officials who hold the honorific titles of *Lyonpo* or *Dasho* and who have held influential roles in developing and shaping education policy were asked about (1) their perception of tensions between tradition and educational modernisation, (2) their view of how education policy is addressing these tensions, and (3) the role of education in mediating any tensions. The high-level actors are referred to in this study by pseudonyms and are introduced throughout the chapter (see also Section 4.6.2 and Appendix I). From the analysis of the themes derived from interviews with the nine elite officials, this chapter provides the findings to answer the first research question:

At the political and policy level, what tensions are evident in the discourse on the modernisation of the education system in Bhutan?

The high-level officials are distinguished from the other stakeholder groups by their lengthy professional engagement with national development and their own educational experiences, which coincided with the early period of modernisation. The analysis presented in this chapter, therefore, recognises the historic lens through which these officials view the current tensions in the education system. Furthermore, the majority of participants' life experiences prior to planned modernisation shaped their perceptual paradigms of tradition and what it means to be modern. Hence, it is necessary to examine the scope of the terms 'traditional' and 'modern' from the eyes of this cohort before

setting out the perceived tensions. This chapter describes participants' understandings of these terms before subsequently setting out six key tensions related to: 1) the introduction of Western education into Bhutan, 2) contrasts between Western scientific knowledge and Buddhism and other traditional forms of knowledge, 3) English medium instruction, 4) ICTs and the mass media, 5) the incongruence between students' career aspirations and the job market, and 6) the view that while tensions may exist, they are not yet an imperative of policy. These tensions are discussed in turn below.

5.2 Different understandings of tradition

The participants characterized the period of time leading up to the 1960s as 'locked in and isolated' from external influence. Life in Bhutan prior to the advent of modernisation is similarly described by Rose (1977: 211) who also points out that 'the social structure, value system and life style of the Bhutanese did not differ very much from that of their ancestors around 1500'. Several of the members of this cohort remarked on the lack of roads, cars, telephones, airports, or other facilities when describing their experiences growing up in 'pre-modern' Bhutan. They also described the absence of Western medicine and a reliance on gSo-ba Rig-pa, the traditional system of medicine, and other traditional healing practices. As Rutland (1999) and other scholars have observed, life prior to planned development was characterized by a lack of infrastructure, monetized economy, and a religious education system located only in monasteries. The participants in the political and policy level cohort often reflected on traditional aspects of the past with nostalgia and pride, lamenting some of the social changes brought about by the modernisation of the education system. Life in Bhutan prior to the implementation of the

First Five Year Plan was described with consistency among the majority of the interviewees and composed the backdrop against which the perceived tensions were set.

The monastic system of education was referred to as traditional as was its curriculum, which included the informal learning of core subjects such as philosophy, ritual, and meditation techniques. Traditional literacy was equated with fluency in Chöke for the purpose of reading liturgical scripts. However, Dzongkha was also considered a traditional language. The secular system of education was considered the modern system. When explaining why tensions emerged from the modernisation of the education system, many participants recalled ways of life in ‘pre-modern’ Bhutan and ways of knowing that centred on spiritual rationales. These ways of life and ways of knowing were reportedly vanishing due to educational and national modernisation. Reflective of the ‘traditional-modern’ dichotomy seen by scholarship on modernisation in the 1960s and 1970s (Shipman, 1971) they equated tradition with a particular point in history – before the modern infrastructure seen today was developed. For some of the high-level officials, traditional ways of life were confined to the period preceding the first Plan for Development in 1961. However, other interviewees maintained that ways of life were traditional only twenty years ago.

The term ‘tradition’ was also used with flexibility not only to signal a polarized relationship with ‘modernity’ but also in contradictory ways. Tradition was often used interchangeably with ‘indigenous,’ ‘native,’ ‘Buddhist,’ and ‘Bhutanese culture’. In some cases, tradition was used derogatively to denote ways of life and knowledge considered

outmoded, ‘stupid,’ or to indicate an external, non-Western origin. For instance, some participants deployed the term ‘traditional mindset’ to describe the mentality of teachers who did not inculcate traditional epistemologies during their lessons, thereby dismissing the policy imperative of GNH to carry forward the country’s rich traditional knowledges and ways of viewing the world. In another example, the curriculum borrowed from India was considered by one high-level government official to be ‘too traditional’ to be effective in the Bhutanese context. In both of these renderings tradition was cast in a negative light.

Modernisation and what it means to be modern were consistently tied to Western notions of development (e.g. urbanization, a democratic government, and economic development) and popular culture from the West. Accordingly, the advent of the modern education system was usually discussed in concert with social changes attributed to development along Western lines. While educational and national modernisation was considered by the participants to be a ‘good thing’ for Bhutan; concomitantly, the members of this group described aspects of modernisation as antagonistic to traditional ways of knowing and ways of life. Despite the general view that traditional and modern mores hold a linear and polarized relationship, interviewees also felt the two coexist (Inglehart & Welzel, 2005; Knauf, 2002) and can be brought into confluence, in line with the national development goal of GNH. For the majority of the participants in this cohort, a balanced relationship equated to a coexistence of traditional epistemologies with ‘the best in modern knowledge and technological developments from abroad’ (Ministry of Education, 2008: 12).

5.3 Tension related to the introduction of Western education into Bhutan

The majority of the high level officials held the view that the current tensions in the education system stem from the social changes brought about by the introduction of the modern system of education in the 1960s. This is the starting point from which the current anxieties surrounding social change and cultural loss can be traced. Furthermore, the social changes brought about by the implementation of modern education remain a source of unresolved tension and concern for policy makers.

As ‘educational pioneers’ (Roder, 2012) whose own educational experiences coincided with the early period of change, many of the high-level officials viewed the current tensions through a historic lens. The majority of them recounted growing up in ‘pre-modern’ Bhutan and their experiences as some of the first students enrolled in the public school system. Illustrative of the experiences of most members of this cohort, Yeshe Namgyel, a former official with the Ministry of Education and current high-level official with the Royal Civil Service Commission, described how he was ‘conscripted’ into formal education in the 1960s. As Yeshe Namgyel reflected, there was a strong scepticism of modern education in this period. That is, parents did not see the utility in it and preferred to keep their children on the family farm. He explained that when the first primary school was established in Trashigang, none of the families wanted to send their children to receive an education. The government, therefore, selected students to be sent from different localities. In his *gewog*, Yeshe Namgyel explained that a mule track was designated as dividing the region equally and, therefore, one child was selected from above the mule track and another from below to attend school. Yeshe Namgyel was

chosen to be one of the 32 children to attend the school in Trashigang. He continued to explain that the student recruited from below the mule track has held equally prominent positions in the government. While valuing the education system and the fact that their career paths were shaped positively by their educational experiences, many high-level officials maintained a critical view of the Western model of education, and believed that the system is incongruent or ‘alien’ to the Bhutanese context (see also Phuntsho, 2000).

As shown in Chapter Two, a Western educational model and textbooks were imported from directly from the West or by way of neighbouring India for the purpose of establishing quickly a modern system of education and contributing to the goals outlined in the First Plan for Development. Teachers were recruited from India. As a result, despite efforts to localise the curriculum – a process that is still ongoing – criticism remains in the discourses of both contemporary media² and the interviewees. Many officials still considered secular education as fundamentally foreign to Bhutan. In general terms, the interview participants attributed a significant tension to a shift in values away from the ‘old’ or traditional and toward the ‘new’ or ‘modern’. The Western system of education and its attendant imported curriculum were perceived by the majority of interviewees to have prompted a shift in knowledges, worldviews, and values away from the traditional past. As is well documented in the literature, processes of modernisation often bring about socio-cultural changes in values, attitudes, and beliefs (Carnoy & Samoff, 1990; Fägerlind & Saha, 1989; Inglehart & Welzel, 2005; Shipman, 1971). In the case of Bhutan, however, while modernisation was a goal of policy, some participants

² An example of this criticism is Tobgye’s labeling of the system as a ‘colonial relic’. (Tobgye, 2012)

considered its attendant social changes as a negative – even harmful – by-product, particularly when young people favour Western popular culture and values over those considered traditionally Bhutanese. These changes were identified as causing tension.

Kuenga Palden, director of a research institute focused on GNH and the history and culture of Bhutan and former key official in modernisation and educational development initiatives, lamented that ‘whenever there is rapid change, there is cultural lack’. In other words, he considered the loss of aspects of Bhutanese traditional culture to be an inherent part of the rapid development of the education system and the changes it brought about in nation as a whole. For Kuenga Palden, this seemed to be an unavoidable ‘tradeoff’ in the quest for ‘modernity’. Similarly, as Phuntsho (2000) and other scholars also found, the rapid expansion of modern education caused dramatic social, cultural, political and economic shifts in Bhutanese society. From Kuenga Palden’s perspective, society has changed quickly and this has contributed to a dramatic gap in worldviews between generations. Likewise, Sangay Dendup, a director in the culture sector and former decision maker in the Ministry of Education, emphasized that the expansion of the national system of education led to changes in ways of life that occurred so rapidly that there is now a generational schism between political and policy level members and the youth of Bhutan. Illustrating this point, Sangay Dendup explained that only twenty years ago students often walked for ‘many days’ to Darjeeling to attend secondary school due to both an absence of roads and the paucity of secondary schools. On this journey, students wore two layers of *ghos*, one of which was used as bedding at night when sleeping outdoors. Sangay Dendup explained that he often spent nights with families

residing along the path. At the time, hotels did not exist on the route to Darjeeling nor did restaurants. He often cooked his own food over an open fire. In the years since, Sangay Dendup added that such stark social changes have occurred that students today would not understand the lifestyle of just twenty years ago. He maintained that ways of life are ‘changing very quickly’. Experiences such as this have shaped participants ideas about tradition and the traditional lifestyle. Given such significant social and cultural change arising from the new system of education, social tensions were seen as ‘inevitable,’ ‘unavoidable,’ and ‘inescapable’.

The new system of education with its foreign curriculum was, as Jigme Wangchuck, a university director and former education policy maker, purported, ‘quite an implantation’ into the Bhutanese context. His experience with modern education began when he witnessed the advent of the national system of education and, after completion of secondary school and a university education abroad, Jigme Wangchuck held a number of key positions in the education sector. His roles included posts as a teacher, and high-level positions in Curriculum and Planning, the Ministry of Education, and Directorships at three of the universities in the country. Jigme Wangchuck stated that traditional Bhutanese knowledges and culture were supplanted by the curricular content of the modern education system. Kuenga Palden also supported this view and added that the modern education system has always been embedded with this tension. Similarly, it is well noted in the literature that the uncritical adoption of educational models can give rise to discord if not aligned with local setting (Guthrie, 1986; Phillips & Ochs, 2004; Spreen, 2004; Steiner-Khamsi & Quist, 2000).

Accordingly, the members of this cohort consider the conservation and promotion of traditional ways of knowing and national values to be a significant imperative of education policy and a means to mitigate the perceived tensions between tradition and the modernisation of education. As set forth by the most recent education policy in the Tenth Five Year Plan (Gross National Happiness Commission, 2008: 108), values education should be inculcated in schools as a way to mitigate the ‘erosion of conventional social values due to rapid modernisation’. Visible here is the idea that aspects of tradition should be conserved and carried forward, namely through formal education, as a way to deflect the perceived negative aspects of development. However, despite efforts to localise the curriculum, there was agreement in the narratives of this cohort that a balance between traditional and modern epistemologies has not yet been achieved and this tension remains significant. As Jigme Wangchuck maintained, the ‘wisdom of the past’ remains absent from the curriculum.

Achieving a balance between traditional and modern epistemologies seemed to be hindered by a lack of consensus on what aspects of tradition should be carried forward. As Sangay Dendup, the director in the culture sector introduced earlier, maintained, traditional epistemologies should only be conserved and carried forward only if they remain relevant. Further, Sangay Dendup expressed that the balancing and conservation of culture through the education system should occur ‘gently’ so that the youth will not ‘revolt’. For this reason, he cautioned that inculcating traditional knowledges and ways of understanding the world through the education sector could be ‘counterproductive’ to the

aims of policy. Here, the idea that Bhutanese tradition and educational and national modernisation should be balanced, demonstrates a dichotomous and polarized relationship. In perception, the tensions between opposing traditional and modern forces are not easily resolved. Similar to the majority of this cohort, Sangay Dendup maintained that the perceived negative effects of educational and national modernisation can be countered by maintaining ‘certain characteristics and features’ of Bhutanese traditional culture. However, among high-level decision makers, there does not seem to be agreement as to which aspects of tradition merit conservation and which do not.

While this section analysed the tensions associated with the implementation of the modern education system, the subsequent sections build on this platform and explore the other key tensions that emerged during the interviews.

5.4 Tension between Western scientific knowledge and Buddhism and other traditional epistemologies

A key finding from the analysis of data was that tensions coalesce around Western forms of scientific knowledge and views of the world, which are relatively new to Bhutan, and traditional forms of knowledge and worldviews, some of which are connected with Buddhism. Such contrasts are not unique to Bhutan and are well documented in other country contexts. A rich body of literature indicates that accepted ways of knowing in some cultures may be incompatible with the nature of science disciplines as defined in the Western science tradition (Gallard & Gallagher, 1994; Lee, 2002; Mahner & Bunge, 1996; Ogawa, 1986; Shizha, 2007; Shumba, 1999a, 1999b; Yakubu, 1994). However, despite the predominant view of the participants in this study that discontinuities and

tensions exist, the majority maintained that extant tensions should be resolved ‘naturally’ in the minds of Bhutanese citizens. For these participants, there was also a strong concurrence that the designed curriculum is limited in its ability to mediate the aforementioned tension. Therefore, the onus was on teachers to mediate any tensions that students are unable to reconcile on their own. Conversely, other interviewees found no discord between these two epistemologies. One explanation might be that the tenets of Buddhism can be considered compatible with scientific systems of thought (Jayatilleke et al., 2008; Liu & Lederman, 2007; Pickering, 1995). This section, therefore, sets out these diverse perspectives.

Several prominent education authorities posited that tension is rooted in the conflict between Bhutanese Buddhist beliefs and the content of public, secular education. To that effect, Phuntsho’s (2000) pioneering study examined tensions stemming from the shift in social attention and enrolment in the Buddhist, monastic system to the secular system of education. Bearing Phuntsho’s (2000) findings in mind, this conflict can also be understood as being underpinned by the divergent functions of these two systems: the monastic system provides spiritual training enabling students to become monks and provide spiritual guidance to their communities and the modern system aims to create citizens capable of entering into modern society and contributing to the socioeconomic development of the country. Kuenga Palden described the tension between Buddhism and the content of the curriculum as such:

This tension exists everywhere, I think. It is even in the West just now, with Christianity on one side, and the rest of the school subjects; Islam on one side, and the rest of the subjects. So, that is continued here.

From the perspective of Kuenga Palden, the discontinuities between the Buddhist religion and science seem to be positioned in a linear and dichotomous relationship. Here, Buddhism is seen as incompatible with Western forms of science and the remainder of the school subjects in the modern curriculum. In other words, these two sources of knowledge and ways of viewing the world do not seem to be accommodated by the education system. This type of 'black and white' thinking emerged often throughout the interviews and did not allow for any overlap between seemingly opposing ideologies. Kuenga Palden indicated that this conflict remains unresolved owing to the insufficiently developed corpus of research on Bhutanese traditional knowledges. Kuenga Palden explained:

The research based on what is the ways of traditional is not so good right now. It is very limited...very limited ethnographic, anthropological knowledge base. You can check the curriculum. It is not so rich right now. The categories are ok, but if you look at the textbooks, they are a bit thin and slim when it comes to local things. That needs improvement. That is the challenge of Bhutan, to produce enough social scientists. There are not enough social scientists yet. There are not enough good ones yet.

Kuenga Palden further explained that, because of the deficient knowledge base, young people in Bhutan do not know enough about Buddhism 'to retain a coherent Buddhist perspective'. Therefore, because the school system is not strongly inculcating Buddhism, the traditional worldview informed by Buddhism is challenged by the content of secular education. For Kuenga Palden, the two are neither accommodated by the curriculum nor balanced.

This tension was also attributed to the perception that Bhutanese citizens frequently move between the modern school setting and traditional home communities where they encounter contrasting epistemologies – traditional and modern scientific ways of knowing. Kuenga Palden elaborated as follows:

It is difficult to be coherent. It is difficult to have a coherent personality. You have to shift your perspective so frequently, depending on where you are and who you are talking to. And that is the effect of the conflict. That is the real tension. The tension is felt in the ways of being of kids and people. They cannot fully cope with it.

Similarly, several other key political and policy level officials acknowledged tensions between Western science and traditional, religious thought. For example Ugyen Dorji – a key decision maker with the Ministry of Education, founder of a centre for education research, teacher trainer, and former teacher – maintained that ‘ways of knowing differ’ and ‘ways of trying to make sense of the world differ’. However, contrasting the view of Kuenga Palden, these officials maintained that even when Buddhist and other traditional knowledges and ways of viewing the world conflict with Western scientific thought, these tensions are either mediated or resolved. For instance, Yeshe Namgyel acknowledged that similar tensions have resulted from the modernisation of the education system and the country as a whole. However, he held that the strong Buddhist beliefs of the population alleviate any tensions and make the Bhutanese ‘quite flexible and adjustable’ in their thinking. Yeshe Namgyel also attributed this ‘flexibility’ in thinking to Bhutan’s history. He pointed out that the country was never colonized, and there has never been a caste system as there is in India. He suggested that these factors have

fostered a strong sense of national unity and connection to traditional culture, which has enabled the population ‘bear with’ the tensions resulting from rapid social change.

Ugyen Dorji, a ministry official in the education sector who was introduced earlier, further claimed that any tensions that exist should not be an issue because the ‘fundamental laws’ of science are indisputable and ‘continue to reign’. Additionally, he explained that these tensions have their roots in contrasts between ‘the age of faith’ and ‘the age of reason’. He suggested that prior to modernisation in the 1960s, the Bhutanese relied on Buddhism and other traditional epistemologies in order to make sense of the world. However, in contemporary Bhutan, the ‘core’ and ‘essence’ of knowing the world is now rooted firmly in science rather than faith. Ugyen Dorji explained:

I think on the face of it, there might appear to be tension between the age of faith and the age of reason – but, when you go deeper into reality the apparent tension is resolved and indeed should be resolved because the conventional way of looking at science for example was, I would believe, more of a function of faith in an ordered universe – a predictable universe – a universe that made sense to the adventurer, to the inquirer but today there has been an explosion of knowledge. To that extent, the frontiers of knowledge themselves have expanded. They have been pushed to extreme limits. So, I believe that the sense of confidence – the sense of certainty that people had earlier on – in a more reliable predictable universe have been challenged by the diffusion of knowledge the explosion of knowledge. Yesterday’s certainties seem to be no longer today’s certainties, and today’s certainties may no longer be tomorrow’s certainties. So, it is a very fluid and open space that we are in at the moment. But, I believe also that at the deeper levels [...] knowledge has both an inner dimension that continues feeding what I believe is the outer dimension and the outer dimension keeps changing and keeps the objective dimension subject to change and innovation. But deep inside, for example, the laws of physics will remain. The laws that say that two molecules of hydrogen and oxygen will always make water. This will not change. So, I think in spite of the apparent tension, deep inside, the fundamental laws will keep governing the world...running the universe.

Continuing in this line of reasoning, Ugyen Dorji maintained that these tensions are duly mediated. First, they are mediated at the national level through the GNH policy. Much of the ideas and rhetoric surrounding GNH are bound in a vision of a nation that emphasises traditional strengths and contemporary ideas (Ministry of Education, 2012; Ura, 2004). Second, they are reconciled at the individual level. Sharing this view, Yeshe Namgyel maintained that the ‘practical’ worldview of Bhutan’s population allows for modern concepts to be accepted and accommodated alongside traditional, Buddhist ways of knowing (see also Jayatilleke, Spencer & Shu, 2008; Liu & Lederman, 2007; Pickering, 1995). Ugyen Dorji held that some of the country’s most intelligent scientists, working in state-of-the-art laboratories, rotate prayer wheels while conducting lab work. His narrative emphasized the accommodation of both strong spiritual and traditional beliefs alongside contrasting scientific innovation. Furthermore, he maintained that this situation is reflective of the ‘ultimate goal of the nation’. Illustrative of this idea, Ugyen Dorji proffered that:

If you can imagine a monk, a monk reading the Holy Scriptures while, at the same time, his food is being cooked by laser beams. If you can imagine that, there’s the kind of situation we would like to arrive at, maintaining the spiritual content of the society while at the same time engaging the benefits of science [and] the benefits of technology. That’s why you can see our monks on mobile phones all over the place.

The idea that any tension between Buddhist, traditional and Western scientific epistemologies can be mediated and brought into confluence is also prominent in policy level discourse. As Lyonchoen Jigme Thinley, the Prime Minister at the time of writing holds, GNH policy aims to ‘maintain the balance between materialism and spiritualism,

while getting the immense benefits of science’ (2004: 205). At the same time, however, Ugyen Dorji recognized that attaining such a ‘balance’ would be tenuous given Bhutan’s current climate of change and transition:

I feel today, the centre cannot hold, it will fall apart. There is so much happening around. Earlier on the scientist was the all knower. Today, there are so many sources of knowledge. So, the exclusive space that the scientist occupied in the past is also under challenge.

As a consequence of the unresolved tensions between western scientific and traditional epistemologies, a division is considered to have emerged between sections of society. From the view of several members of this cohort, there is a generation gap between those who grew up with traditional worldviews and ways of life and the younger generation who grew up in a relatively modern Bhutan where modern knowledges and views of the world underpin everyday life. As Kuenga Palden reported, people in Bhutan must live in ‘two or three worlds at the same time’. Kuenga Palden maintained, ‘parents are farmers, parents are religious’. They hold worldviews which were considered traditional and ‘much more in tune’ with Bhutan’s age-old wisdom, namely, Buddhism and ‘local ecological knowledge’. As scholars on modernisation, such as Inglehart and Welzel (2006) note, in the case of agricultural societies where life is heavily dependent upon nature, transitions toward industrial and postindustrial economies tend to engender changes in worldviews. One explanation for shifts in worldviews might be that in subsistence agricultural economies, spiritual, religious, and other traditional rationales are relied upon to explain the unpredictable forces of nature (Inglehart & Welzel, 2005). When societies modernise, Western science and technological progress may become new

sources of authority in daily life. In the case of Bhutan, however, this shift seems to have caused a generational schism that is exacerbated when parents and extended family remain in their villages, engaged in traditional agricultural livelihood, while the youth are sent to the nearest secondary school, generally in or near an urban area. As was revealed during the interviews, while students usually attend primary school in their villages and live at home with their families, it is not uncommon to travel long distances to attend the nearest secondary school. Most secondary schools are located in areas with denser populations and students often live on campus in dormitory style housing.

Furthermore, as will be seen in Chapter Six, the interviews with teachers evidenced that schools in Thimphu often enrol students from outside the city, with many hailing from families living in geographically isolated and remote areas where they are engaged in traditional ways of life. Undertaking a modern education, in the relatively urban setting of Thimphu was considered by Kuenga Palden to foster modern worldviews and fluency in knowledges that are different from the traditional. Kuenga Palden indicated that the gap in values and beliefs amongst the Bhutanese required an understanding of different ways of knowing or ‘fluency’ in different ‘literacies’ (Kalantzis & Cope, 2000), e.g. modern and traditional forms of knowledge. As Rogoff (2003), Gutiérrez et al. (1999), Greenberg and Moll (1990) point out, these knowledges and ways of knowing can be understood as cultural resources or funds of knowledge potentially offering coexisting utility to education.

5.5 English medium instruction: supporting modernisation and hindering the continuity of tradition

Several interviewees posited that with fluency in the English language increasingly gaining currency in Bhutanese society, the value of language has changed. For some, this represents a significant and irreducible tension in the education sector. For others, the prevalence of and preference for English is cast in a positive light.

As seen in Chapter Two, English was chosen as the medium of instruction for the modern system of education because the government considered it to be the *lingua franca* and, therefore, served the government's modernisation agenda by positioning Bhutan to interact on a global level with other countries. While the official medium of instruction has changed several times since the 1960s,³ English is now well established in Bhutan as the medium of instruction in most state schools and the language of the government.

Yeshe Namgyel maintained that the use of English as the medium of instruction was seen by government decision makers as a means to further modernisation. As he explained, English was perceived by most Bhutanese as being 'a better window to the outside world' than either of the traditional languages associated with monastic education, namely Chökey and Dzongkha. That is, English was considered a key to international diplomacy and commerce. According to this key policy actor, in addition to contributing to the modernisation of the country, in the mid-1980s the government sought to

³ During the 1960s, curriculum materials were translated into *Dzongkha* and Nepali to be used as the medium of instruction in certain regions of the country.

linguistically distinguish Bhutan from neighbouring India by charging teachers with speaking in Standard English rather than creole/pidgin English. Yeshe Namgyel further stated ‘that we Bhutanese wanted to speak English like the English, not like the Indians’. That is, Bhutanese citizens preferred the way that English was spoken in Western countries.⁴

Yeshe Namgyel explained that the first attempts to localize the curriculum commenced in the mid-1980s. A ‘large number’ of British, Canadian, and New Zealander VSOs and Irish APSOs were recruited to implement these efforts. Some classroom materials were developed in the Bhutanese context, and the first Bhutanese history textbooks were authored by these expatriate in English. Yeshe Namgyel reflected that an Irish volunteer was recruited to author English textbooks that incorporated aspects of ‘the Bhutanese background’. He also mentioned a British volunteer who helped write a textbook on Bhutan’s history. Yeshe Namgyel indicated that these volunteers were recruited based on the perception that, as nationals of developed countries, they were better qualified to guide efforts to improve education. Furthermore, they were considered more capable of rewriting Bhutanese history and other subjects than the Bhutanese nationals with a sound knowledge of the English language involved with curriculum development. As he continued to reflect on the early efforts to localise the curriculum, he also described concomitant efforts to further modernise the schools. Yeshe Namgyel explained that foreign volunteers were posted in remote schools in order to ‘spearhead modernisation’

⁴ Regarding the preference for English spoken by a Westerner, I recorded two instances in my field notes where Ministry officials asked me if I would proofread policy documents owing to my fluency in English. While these individuals had studied for degrees abroad and were considered among the most educated members of Thimphu society, there was a sense that the English spoken by an individual from a western country was ‘better’.

efforts on school campuses. He did not elaborate on the details of the efforts but indicated that the presence of western education specialists served the purpose of bringing modern and ostensibly western educational materials and methods to Bhutanese schools. From his standpoint, the role of foreign volunteers, their contributions to developing English textbooks, and aiding in an overall escalation of modernisation efforts were considered positively.

In contrast, several government officials viewed the use of English as the medium of instruction as a source of irresolvable tension. For these individuals, the prevalence of English as the medium instruction has led to a loss of traditional forms of knowledge. Taking into account Sonam Lhamo, a high-level official of Policy and Planning in the Ministry of Education, and Kuenga Palden's explanations that 'language is identity and culture,' one example of Bhutan's loss of traditional knowledges is reflected by the decline of traditional Bhutanese languages – Dzongkha and Chöke – in favour of English. One possible explanation why Dzongkha and Chöke were equated with Bhutanese identity and culture might be because both languages are associated with traditional monastic education and its curricular focus on traditional and Buddhist knowledges. Direct access to Buddhist liturgical texts and literature is limited for Bhutanese who are not fluent, particularly in Chöke, the language in which many of these texts are written (van Dreim, 1994; Gyatsho, 2004). Furthermore, as Phuntsho (2012) points out, the Buddhist corpus is enormous and not yet entirely translated into English. Even Buddhist works that have been translated into English do not capture identically the

intended meanings of the original texts, particularly in the case of Buddhist poetic liturgical compositions (Phuntsho, 2012).

As shown in Chapter Two, Dzongkha was once the only national language of Bhutan and was the language of monastic schooling. Dzongkha was seen as contributing richly to an overall sense of national unity and a stronger social value of Buddhist and other traditional values. However, in the advent of English-centric instruction, Kuenga Palden noted that:

There was always tension within itself...because Dzongkha subjects, which was a carrier for Buddhist things was given one lesson, you know, only one lesson a day. Dzongkha was an amalgamation of all sorts of things...language, art, history, religion.

Moreover, many Buddhist texts are written in Dzongkha or Chöke, which effectively renders them inaccessible to the youth who are fluent only in English. However, there is now a clear call in policy text to position Dzongkha prominently and legitimate its use alongside English. To this end, in policy, Dzongkha is recognized as ‘a medium through which the country’s culture, tradition, law, spirituality, and politics are carried forward as they evolve’ (Ministry of Education, 2012: 18). The hope is that instruction in English will prepare modern citizens while fluency in Dzongkha will provide grounding in traditional Bhutanese knowledge and values. Accordingly, participants associated Dzongkha with ideas of traditional Bhutan (see also Dyenka, 1997). However, as Kuenga Palden pointed out, in practice, secondary students spend only 45 minutes per day

learning and practicing Dzongkha while the remainder of the school day is conducted in English.

At the same time, however, even among the participants who cited significant tensions between English medium education and a loss of tradition, there was recognition that Dzongkha is losing utility in the context of modern Bhutan. Sonam Lhamo recognized that Bhutan's local languages are not compatible with teaching much of the content of the modern curriculum, particularly science subjects. Sonam Lhamo supported this view and explained that generally, the Dzongkha 'language is not well developed' – i.e. the vocabulary required to teach concepts in the modern curriculum do not exist in Dzongkha or in any other local or traditional languages. For Sonam Lhamo there seems to be a tension between cultural loss and the recognition that Bhutanese languages do not to hold utility in contemporary Bhutanese society. Similarly, Wangyal (2001: 124) also found that the dominant use of English in addition to 'English language media, through television, newsmagazines, children's books, and comics also reduce the frequency of Dzongkha usage'. Scholars on indigenous languages have also found the institution of English medium instruction coupled with English medium mass media to be antagonistic to the sustained use of local languages, e.g. Mkilifi (1972) on the use of Swahili in the Tanzanian context.

English language is now purportedly held in higher regard by Bhutanese citizens and is seen as a language of more prestige than Bhutanese languages. As scholars such as Dorjee (2006), Dyenka (1997), and Roder (2012) also found, English is positively

correlated with ideas of modern life in three main ways: 1) as offering access to Western markets and culture; 2) as a requirement for entry into high-status types of work (e.g. positions in the civil service); and 3) as holding potential academic utility enabling students to pursue valuable tertiary degrees abroad. English was also cited in the literature and by participants as holding even greater value as the language of information technology. Similarly, fluency in English holds greater economic value and higher international status than indigenous languages in other country contexts, for example, South Africa (Heugh, 1999) and Bangladesh (Imam, 2005).

Accordingly, with the advent of English at the expense of Dzongkha, Kuenga Palden noted that:

Culturally...very challenging period in this country. Command of the local language in writing is very much at risk. They know a little bit, but they don't know enough to enjoy reading Dzongkha literature, so that makes a tendency for them to enjoy English literature instead of Dzongkha literature.

This narrative reveals the preference for English medium instruction has caused a decline in the social value of Buddhist and traditional knowledges. For Kuenga Palden, therefore, an imperative of the education system should be to renew a command of and interest in the local national language, thereby mitigating this tension between cultural loss and educational modernisation.

5.6 Tension associated with ICTs and the mass media

The section discusses the perceived tensions related to the introduction of information and communication technologies (ICTs) into Bhutan in 1999, namely in the form of

computers, Internet, television, and mobile phones. ‘Older’ versions of ICTs, such as radio and landline phones, are also part of this grouping; however, the participants referred mainly to the aforementioned newer technologies. There was a strong concurrence among the interviewees that ICTs are associated with a notion of modernisation driven by technology and scientific innovation. From this standpoint, ICTs are seen as deleterious to traditional knowledges and ways of life. In particular, the influx of foreign mass media through the Internet and television was considered one of the root causes of negative socio-cultural changes, i.e. shifts in values, attitudes, and beliefs toward a preference for modern or western forms. Conserving traditional knowledges and values in education, within a framework of modern education including ICTs, comprises two contrasting – even conflicting – challenges for the education sector. Nevertheless, while the majority of participants identified tensions regarding the prevalence of ICTs, the interviews also showed the benefits of technologies and media resources for educational purposes. For one key policy actor, ICTs were seen as integral to modern Bhutan and their educational utility was cast in a positive light.

There was agreement in the narratives that ICTs have influenced the way the Bhutanese communicate, i.e. traditional ways of communicating are giving way to modern forms. This debate is also carried out in policy text. For example, the Education Sector Strategy: Vision 2020 (2003: 8) document reflects the anxiety surrounding social change and cultural loss, articulating that rapid social change and modernisation are responsible for diminishing ‘traditional family ties’. It states that as a result of the weakened role of tradition, Bhutan’s youth are increasingly ‘vulnerable to peer influences and the influx of

external media'. Similarly, many perceive ICTs as potentially negative and deleterious to traditional knowledges, worldviews, and ways of life. As Sangay Dendup pointed out, prior to the 1960s, Bhutan's society was 'basically an oral society' – written records were not kept and information was passed on orally, mainly in the form of stories and songs (see also Faris 2004; Penjore, 2005; Phuntsho, 2000; Wangyal, 2006). Stories and songs were used both for educational purposes and as a tool to inculcate traditional knowledges, values, and beliefs. Sangay Dendup purported that some of the traditional stories and songs have been documented; however, 'even in the written word, there is very little information'. He suggested that the intended meanings of these traditional forms of communication couldn't be accurately captured in text because the contextual and experiential aspects are left out. Sangay Dendup strongly held this view and explained:

Because of the demand for the standard forms of communication...writing and reading in the modern form of education...you lose out on listening to stories. When I was a child we used to listen to stories from our grandparents in the evenings. Bhutanese now have less and less need to do that now. We are watching television and eating our meals. Life has become very fast. So, the traditional mode of communication, is losing out, when we are adopting different modes of communication. Also, life has become faster – improvement of communication. You could have a meal late in front of you and someone calls and you could be on the phone until the rest of the family has finished tea. Somehow the improvement in communication and transportation can make life really fast.

According to Sangay Dendup, the ways of life in Bhutan are changing as a result of communication being steered by both technology and formal education. These socio cultural changes resonate well with the shifts associated with modernisation (see Fiore, 2011). He espoused this theme with an additional example of how traditional ways are giving way to modern life:

I remember till mid 1990's, we had to, if someone wanted to call, we had to go through an exchange by the communication organization. That was especially, in Thimphu, maybe a little better. I used to work in Paro and if we wanted to call someone in Thimphu, we had to go through someone else. So, in that way, not catching someone was not unusual. But now, you could be in the forest, at the top of a mountain, and you can still be accessed. Traditional ways are giving way to modern life, with education. Also, this is really taking away other opportunities, when you had limited access and limited facilities. So, we need to do this balancing act quite seriously.

The narratives of other high level officials in this group, including Tashi Tobgay, supported this theme. Tashi Tobgay was a particularly experienced education stakeholder as he was considered as an educational pioneer. He was currently an official involved in politics who had held polyvalent roles in curriculum development and political and policy level decision-making and an author on Bhutanese culture, education, and history. At the time of writing, Tashi Tobgay had come out of retirement to take up an appointment in the National Council. Tashi Tobgay purported that ICTs negatively affect the current generation of children. He lamented the loss of the traditional practices of 'reflection' or meditation; children are instead drawn to television programs and the Internet. Following in the same line of reasoning, Tashi Tobgay spoke about mass media and technology as an 'outside influence', with the potential to supplant traditional knowledges among youth. He pointed out that children today 'miss out' on the opportunity to develop an appreciation of Bhutanese tradition as a result of the attraction to ICTs and the mass media as forms of entertainment. Furthermore, Tashi Tobgay maintained that when adults make references to traditional culture, some young people are unable to make sense of these references.

Ugyen Dorji explained that ICTs present both challenges and opportunities for the education sector. In terms of challenges, Ugyen Dorji questioned the relevance and appropriate use of external or foreign knowledges in the Bhutanese context. He maintained:

I think there are limits to knowledge and if we do not understand the limits of knowledge, in the same Dr. Faustus fashion, we might lose our...the soul. . .There is. . . a virtual brain. The virtual brain terrorizes the conventional ways of knowing.

According to Ugyen Dorji, education plays a key role in maintaining a balance between the benefits of ICTs and the perceived negative effects on traditional forms of knowledge and ways of understanding the world. Accordingly, scholars on globalization (e.g. Dale, 1999; Edwards & Usher, 2001) highlight the ‘homogenising’ effects of global mass media and ICTs on aspects of tradition. For example, the influence of popular culture through the mass media was observed while conducting fieldwork in the school settings. There was a distinct trend, particularly among male students, toward Korean hairstyles, which stood out in striking contrast amongst students dressed traditionally in *kiras* and *ghos*. This example was reflective of many other observations during fieldwork where elements of traditional culture existed side-by-side with modern or ‘new’ elements. This seemed to indicate the possibility that aspects of tradition might be conserved and carried forward concomitantly with government plans to continue opening the country up to increased ‘outside influence’. An ideal example of a modern country ‘saturated’ with traditional values and customs alongside visible social preferences for foreign popular

culture and mass media is perhaps most clearly observed in the case of Japan (Vlastos, 1998). Nevertheless, many members of this cohort were critical of the effects of the foreign media.

Continuing in this line of thought, Kuenga Palden purported that the influence of the media challenges one's ability to maintain 'coherent Buddhist perspective'. He explained that the 'different' messages conveyed through the Internet and televisions do not align with the values of Buddhism (see also McDonald, 2004, 2006). He maintained that 'no matter how much education does, if other things are oriented in a different spirit' tensions will result from the mismatch between traditional knowledges and worldviews and the contrasting messages of foreign mass media. As scholars such as Wangyal (2001) point out, aside from tourism, the mass media bears most strongly on traditional Bhutanese knowledge and values by exposing citizens to global news and information. However, not all members of this cohort felt this way. ICTs and media resources were seen by some as beneficial to national development and offering affordances for learning.

Moreover, contrasting views of traditional and modern mores appeared not only between participants, but also during the course of the same in-depth interview. For example, in the beginning of his interview, Ugyen Dorji purported that a cautious stance should be taken toward the Internet and other ICTs. However, as the interview progressed, he later took a different standpoint:

Bhutan is actually quite smart in the sense of balancing traditional knowledge with modern and advanced forms of knowing. The way we have been able to use technology for example, the Internet came to Bhutan only in 1999 and today there are a lot of people, especially young ones that are Internet savvy. We are able to adapt quite well from the old to the new... the traditional and the modern. Whether it is in terms of architecture...whether it is in terms of lifestyle...whether it is in terms of our curriculum.

This contrasting view demonstrates the complicated national relationship between the deeply entrenched reverence for traditional knowledges and worldviews and modernisation aspirations. Continuing with this line of reasoning, Ugyen Dorji subsequently addressed the direction in which education policy is expected to move in the future:

As far as our own educational policies are concerned we would like to be able to capture the benefits of received wisdom as well as the engaged the potentials of the possibilities of evolving knowledge...evolving technology and innovations.

The sense that efforts should be made to temper the perceived negative effects of ICTs and the media surfaced in the interviews with Ugyen Dorji and Sangay Dendup. The most recent iteration of education policy; however, casts the role of ICTs in a positive light. It charges the education sector with including information technology resources in order to 'augment the quality of education' (Ministry of Education, 2012: 14).

They described the imperative to balance the use of technology in order to mitigate the loss of 'traditional ways of life'. For example, Sangay Dendup reflected:

Of course, a lot of things are coming in now...the internet and television, a lot of foreign cultures. I think we might really have to say that some of these things should be allowed gently.

For Sangay Dendup, the negative effects of ICTs might be mitigated by convincing Bhutanese citizens of ‘the need to maintain certain characteristics and features’ of traditional ways of life and ways of knowing. For example, increasing the information available in schools on traditional Bhutanese epistemologies was seen as key toward alleviating this tension. As shown in section 5.1.3, explanations of specifically which aspects of tradition should be conserved were generally vague. Their explanations tended to be narratives of personal experiences of traditional culture and values. Tashi Tobgay described the advent of technology and media as a major challenge for the education sector. Further, he describes it as a challenge that those at the political and policy level ‘cannot cope with:’

This is a huge, huge challenge for the system, for the teachers. I feel sorry for the kids. What to do? Because the Internet and um, television...it used to be videos, now CDs. I think there’s a large influx of media available, resources available and we cannot cope with that. I hope things will be not worse.

Tashi Tobgay went on to state that the education sector might not be able to effectively ‘cope with’ the influence of media information affecting Bhutan through ICTs. He indicated that social changes are strongly driven by the media; and therefore, the education system is limited in its ability to steer Bhutanese values toward the traditional. Further, he felt that ‘adults in the society, parents in the society’ and those responsible for

the media should play a role in filtering the information allowed into the country. He stated the Bhutanese should ‘be very selective’ of the foreign media allowed into the country in order to balance the tensions.

5.7 Tensions associated with the incongruence between students’ career aspirations and the job market

Several key policy officials reported that a significant tension arose from the incongruity between students’ career aspirations and the job market. The interviewees reported that, with the introduction of formal schooling and its market-oriented curriculum, there was a shift in the social preference of the youth for urban lifestyles and modern employment such as an office job in the civil service instead of traditional employment such as yak herding and a nomadic way of life. School curriculum is often cited in literature on modernisation and by curriculum theorists as a mechanism with the potential to develop a workforce capable of furthering economic development (see Crossley 2008; Fägerlind & Saha, 1989; Ball, 1990; Ball & Bowe, 1994; Guthrie, 1986; Bruner, 1996). However, in the case of Bhutan, socioeconomic development is bound by the broader national objective of GNH (e.g. Braun, 2009; Ezechieli, 2004; Lokamitra, 2004; Ministry of Education, 2012; Ura, 2009). This paradigm is built on both a desire to modernise while at the same time conserving and promoting traditional knowledges, worldviews, and ways of life.

As this section demonstrates, such a dichotomous perspective held by the participants seemed to overlook the possibility that increased agricultural production might also contribute to the economic dimension of modernisation (Shipman, 1971). However, the

notion of the ‘educated farmer’ did not emerge in the discourse among this group of participants. What did emerge was an emphasis on the stark contrast between students’ career goals and the agro-pastoral subsistence and rural lifestyles in which most Bhutanese are engaged: much of the economy remains centred on agriculture with more than half of the population engaged in this vocation (National Statistical Bureau, 2011). Herein lays a major chasm, as the job market cannot accommodate the number of graduates seeking highly coveted positions with the civil service (Roder, 2012). Kuenga Palden’s observation of this tension was particularly apt. He maintained the modern system of education prepares students for a job market that does not yet exist.

Several participants purported that there is an expectation of secondary school students who believe that employment can be obtained in a white-collar position, ideally in the civil service, upon graduation. Further, these students are reluctant to take on non-office jobs and prefer to wait until an acceptable position opens up rather than engage in a job considered to hold low status such as farming, construction, and roadwork. This expectation was underscored by the reported lack of inclusion of vocational examples in textbooks, as well as in the formal and informal curriculum. As Tenzin Tashi – a former advisor to the King during the early development of the modern system of education who had served in a range of high-level education advisory positions – acknowledged, Bhutan remains a largely agricultural society; unfortunately though, the education system does not prepare students to return to their family farms. However, it should be noted that during the interview he admitted that he associated modern education with a loss of idyllic visions of Bhutanese traditional agro-pastoral lifestyles. Formal education is an

oft-cited by scholars such as Nash (1980), Fägerlind and Saha (1989) as an agent of social change, enabling youth to acquire ‘Western languages and other skills, as well as urban attitudes and aspirations’ (Rhoda, 1983: 37). In developing countries, the misalignment of curriculum and the aims of schooling with economic growth can create a centrifugal effect, resulting in considerable rural-urban migration among youth (Fägerlind & Saha, 1989).

This issue of the mismatch between the curriculum and the job market was given attention not only by the interviewees, but also in casual conversations and the local media. Discussions during fieldwork, either with Ministry staff while in a government office or at the school fieldwork sites, often turned to the problem of gangs of unemployed youth, which were particularly visible in urban Thimphu. However, while social and media discourse often focused on youth who no longer aspire to return the family farm or engage in pastoral work, such as yak herding (Phuntsho, 2000), it was notable that only three political and policy level participants brought this issue to the fore during the interviews. However, those who perceived changing attitudes toward employment to be a source of tension were clearly passionate about this issue. For example, Tenzin Tashi felt strongly about the dangers of modern education in this regard. He reflected fondly on agricultural ways of life before modern education took hold and suggested the traditional ways of life were more closely aligned with the aims of the Gross National Happiness policy. Ostensibly, this was because he believed there was a general contentment with ways of life prior to implementation of the First Five Year Plan in 1961. He also commented on the strong familial ties considered to be the result of

generations of family working together. Tenzin Tashi reported that tensions associated with the implantation of modern education in a largely ‘traditional, agricultural society’ are the most significant and challenging issues facing the education sector today. In his opinion, formal education was not necessary or even relevant in the context of the lives of farmers, owing to its aims being severely out of alignment not only with the job market but also with traditional ways of life, knowledges, and worldviews. While Tenzin Tashi acknowledged that his critical opinion was not popular amongst his colleagues – in fact, he indicated this was part of the reason he was not continuing his work as a consultant on education policy issues – other interviewees in this cohort also perceived this tension.

Kuenga Palden added that he felt that the blame does not lie solely with the education system. Urban areas are seen as offering greater economic incentives to young people – i.e. office jobs with higher salaries than one could expect as a farmer. As Sonam Lhamo explained:

It is easier for students to come to town rather than work on a farm. We have a lot of rural to urban migration. We are supposed to advocate education, but education brings up so many issues. It is a fact that it leads to disproportionate migration.

As Kuenga Palden proffered, once a student has been educated in the formal, modern system, returning to farm life is ‘a difficult process’. In other words, this perspective indicates that formal schooling has a ‘modernising’ effect (e.g. Armer & Youtz, 1971; Fägerlind & Saha, 1989; Inglehart & Welzel, 2005) on students’ and makes them disinclined to return to traditional ways of life on their families’ farms. Kuenga Palden

and Tenzin Tashi also shared this view and maintained the general orientation toward modern careers is reflective of the broader trend of traditional ways of life giving way to the modern. Therefore, the balancing of the two is perceived as an important tension to be addressed by policy.

5.8 Tensions may exist but they are not yet a policy imperative

Sonam Lhamo reported that the examination of tensions in the secular system of education sector is premature. It is worth noting that she was noticeably part of a much younger generation than the other elite officials in this group. While her view is itself not a tension per se, it is understood to be relevant to a comprehensive understanding of the discourse on the modernisation of the education system. Sonam Lhamo maintained that the education sector is still in its ‘infancy’ and needs to ‘mature’ before the education sector can address any fissures between traditional epistemologies and the content of the modern curriculum. For these participants, inadequacies in the infrastructure of education are their primary concern. As Sonam Lhamo reported, the ‘real tension’ is between the quality and quantity of educational provision. She went on to say that the total enrolment at public schools is continually increasing at a pace at which the Ministry of Education has not been able to meet. Sonam Lhamo emphasized that increasing the number of classrooms and mitigating serious teacher shortages are the immediate issues that must first be addressed before policy makers can turn their attention toward addressing any other tensions. Furthermore, Sonam Lhamo stated that ‘[a]s a ministry, we don’t have any policies, which look at this’. Sonam Lhamo explained:

We just started the education system, as it exists today, in the 1960s. We are still at infancy. People usually look at these things when they are more mature.

Therefore, from this purview, any tensions that may exist between traditional epistemologies and the content of the modern curriculum are not yet an imperative. Intriguingly, while the GNH policy serves to guide development at the national level, there is recognition that the education ministry itself has not yet developed specific policy directing its implementation. As Sonam Lhamo maintained, ‘our policies are more general run-of-the-mill policies. Right now we are still trying to ensure quality, access, efficiency, and teacher-student ratio’.

5.9 Summary and reflections

This chapter established that the key government decision makers held diverse perspectives regarding the tensions brought about by the modern education system. The tensions largely coalesced around the introduction of Western education into Bhutan, the contrasts between Western scientific knowledge and Buddhism and other traditional forms of knowledge, English medium instruction, ICTs and the mass media, and the incongruence between students’ career aspirations and the job market. There was one official who held the view that while tensions may exist, they are not yet an imperative of policy. Characterising the narratives were contradictory views about modern education and the modernisation agenda of which it was part. Modern education was simultaneously seen as a positively contributing to national modernisation and concomitantly, was considered antagonistic to traditional ways of knowing and ways of life. Further to this, the evident tensions were both irreducible and resolvable.

The majority of this cohort felt that the evident tensions can be mitigated by supporting the continuity of traditional epistemologies through the national curriculum. However, the political and policy level participants held a plurality of ideas about ‘how much’ modernisation to allow into the country and what aspects are considered acceptable in order to maintain a balanced relationship with tradition. Contrastingly, some participants held that the evident tensions are resolved by teachers or in the minds of individuals.

As will become apparent in the following chapter, Chapter Six, the perceptions of tensions among the education stakeholders who are responsible for translating education policy and directives to the curriculum differ from the views of the political and policy level participants. The next chapter will extend the notion of different knowledges and worldviews into understandings of how the curriculum should serve these. Should education be shaped and reshaped to sustain, even in part, traditional knowledges and views of the world? Or should education be reshaped to align Bhutan to a more modern view of the world? While Chapter Six will explore teachers’ and education leaders’ perceptions of tensions between traditional and modern epistemologies with respect to the national curriculum, Chapter Seven will investigate teachers’ pedagogic strategies to mediate the tensions during their everyday classroom practice.

Chapter Six: The translation of discourse and policy into the designed and living curriculum

6.1 Introduction to the chapter

Having established the tensions in the discourse on the modernisation of the education system at the political and policy level in the previous chapter, this chapter turns to the narratives of teachers and education leaders. Both of these participant groups are active interpreters of education policy directives as they shape the living and designed curriculum (see Section 3.3). This chapter provides the findings to address the second research question:

At the level of the curriculum, what tensions are observable in the translation of discourse and policy?

Underpinning this inquiry is the question of how policy and directives might be received and either appropriated or resisted. As Ball and Bowe (1992: 83) point out, ‘the ‘carry over’ of meanings from one policy arena and one educational site to another is subject to interpretational slippage and contestation’. One might speculate that endogenous influences such as stakeholders’ locations in the education system and individuals’ subjective realities may influence teachers’ and education leaders’ perceptions about the tensions between traditional and modern epistemologies.

Considered here are the perspectives of 51 teachers and 11 education leaders. The teachers are each referred to by a pseudonym, their curriculum subject, and school (see also Section 4.6.6 and Appendix III). The education leaders are referred to by a

pseudonym, their position, and institutional affiliation (see Section 4.6.3 and Appendix II). As in the previous chapter, the findings presented here will centre on the key themes that emerged in relation to the theoretical framing of the study. The analysis is mainly descriptive and provides detailed accounts that have received little academic attention in previous literature.

The sections that follow will present the main findings relevant to the research question by examining three overarching themes. First, the majority of the teacher participants identified tensions related to foreign aspects of the curriculum and education policy. Second, the education leaders recognized that there were tensions between traditional epistemologies and the modern curriculum. However, they maintained that the curriculum and teacher training programmes resolved the tensions. Finally, this chapter will analyse the perception that tensions are the result of teachers' resistance to the precepts of the curriculum.

6.2 Tensions related to foreign aspects of the curriculum and policy

This section reveals that for the majority of the teachers in this study, there were tensions between the curriculum and traditional epistemologies. The tensions were most often attributed to the designed curriculum but were also experienced by teachers when enacting the living curriculum. The tensions were described as dichotomous pairings associated with home and school, scientific and local, or traditional and modern and were reportedly embedded in educational methods and materials adopted from abroad.

As shown in Chapter Two, educational materials and methods with Western origins are

adapted through on-going reforms to address, in part, the tensions related to tradition and modernisation. Further to this, an overarching goal of the national curriculum is the integration of ‘the best in [Bhutan’s] cherished cultural and national values with the best in modern knowledge and technological developments from abroad (Education Sector Review Commission, 2008: 12). However, many of the teachers experienced tensions when different epistemologies interacted in their classrooms. Three overarching themes emerged from their narratives. First was that the exogenous nature of the national curriculum and foreign influences on education reforms engendered tensions. The second common theme demonstrated that the tensions discussed thus far were heightened by three main factors: 1) The rapid pace of educational change, 2) insufficient training for teachers and, 3) a lack of support from the school community. The third theme evidences the consequences of the tensions between traditional epistemologies and the modernisation of education – that modern knowledges and ways of viewing the world hold higher prestige. These themes will be examined in turn below.

6.2.1 Tensions between traditional and modern epistemologies were exacerbated by foreign inspired education reforms

Two interrelated themes emerged in relation to the tensions perceived between traditional and modern epistemologies. First, there was consensus among the majority of teacher participants that there are tensions between traditional and modern knowledges and views of the world. These tensions were seen as deeply embedded in the foreign nature of the curriculum of modern schooling and the contrasting traditional perspectives reportedly common in students’ home communities. While these tensions were often described as experienced mainly by young people, teachers also admitted being unfamiliar with some

of the exogenous content in the national curriculum. Second, many teachers maintained that these tensions were exacerbated by ongoing foreign inspired education reforms.

First, many teachers in this study commonly identified tensions related to discontinuities between the national curriculum and contrasting traditional epistemologies situated in students' home communities. Teachers who held this view maintained that their students did not always make connections or generate intersubjective understandings (De Haan, 2001) between the different epistemologies situated in their homes and schools (see also Rogoff, 2003; Rogoff & Paradise, 2009; Gutiérrez & Rogoff, 2003). For example, many of the science teachers stated that students grow up with traditional worldviews about health (e.g. that physical well-being is tied to positive relationships with deities). Some teachers maintained that their students could not understand or accept the contrasting reasons for illness in their health and biology classes. Summarizing the views of many other teachers, Jigme Wangmo, a science teacher at School A, stated, '[t]here is always a contradiction. In science, we teach something and in their culture there is something else. So, there is always a contradiction [...] it always happens'.

Teachers reported that this tension was experienced most frequently among students from rural areas. As mentioned earlier, students from geographically isolated villages travelled to urban or more densely populated areas to attend secondary school. Choki Wangchuck, a Biology teacher at School E, explained, '[t]he students who are coming to this school, they are coming from different parts of the country. They come from villages and all. There are students from the East, from the South [...] but during the vacation they go

back to the villages'. Many teachers pointed out that their students grew up in communities where life is guided by traditional epistemologies and attend school where knowledges are largely exogenous.

However, teachers also held that those who grew up in Thimphu struggled to make connections between traditional and modern epistemologies. Reportedly, even in the relatively urban areas, young people may grow up in households where elders grew up prior to modern schooling held traditional worldviews. Thus, there are urban young people who grew up surrounded by traditional epistemologies yet must become fluent in modern literacies of the school. Thus, for many teachers in this study, tensions arise at school but are exacerbated by students' experiences in a society where change is rapid and uneven. Exemplifying this stance, Manav Raturi, a physics teacher at School D, maintained that the tensions he and his students face are attributed to students spending more time at home than at school. That is, students have greater understandings of traditional knowledges and worldviews and thus have difficulty understanding a largely foreign curriculum. As Dulal Das, an expatriate Chemistry teacher at School D, who exemplified this stance aptly put it, '[t]here are conflicts between learned knowledge and what is seen around'.

This theme was consistently and strongly supported by English teachers, many of whom reported using a curriculum that included a large proportion of foreign texts. Sithar Dolma from School D, represented a view maintained by other English teachers. She asserted, '[i]f we look at the rural areas, they are much closer to our own culture than the

outside culture. So if new country is being put in, it would be difficult for them to understand the outside culture because they are not exposed to Western culture’.

Another English teacher added:

It is very difficult for them to understand a Western story where they have never been. In the West, these are the things that happen, but in Bhutan it happens this way. It might happen in the future because development activities are taking place... (Kinley Zam, School E)

While many teachers equated ‘modern’ with ‘Western,’ examples of tension in the English curriculum were not limited to contrasting Western ideas. English teachers highlighted that their curriculum includes texts from many other countries. They reported that their students face difficulty while attempting to reconcile a range of exogenous knowledges contained in the modern English curriculum that are not directly experienced in their day-to-day lives. Therefore, for English teachers, ‘modern’ was not only Western but also comprised other foreign epistemologies. For instance, Kunzang Choden, a School B English teacher, represented the views of many other English teachers in this study and described discontinuities between traditional Bhutanese and Ethiopian end-of-life practices. She explained:

Class 10 novel, purely talks about the other culture. The culture of Ethiopia. It talks about the culture of Ethiopia where euthanasia is being practiced. Mercy killing that’s being practiced. In our culture it is not there and then it’s a kind of imaginative story, so it’s very difficult for the students to move from the reality to the imaginative.

She added, ‘we definitely see the cultural contrast. [...] Other stories, based on other settings, it is quite difficult for them to understand’. While students encounter different ways of knowing at school and increasingly through the media, teachers stressed that not all students are familiar with exogenous ways of knowing. As Dyenka’s (1999: 20) study also found, ‘teachers consistently deal with texts that are located in foreign cultures and are unfamiliar’. For many teachers, this mismatch made it difficult to convey concepts that were not part of everyday life.

Sonam Yeshi, an economics teacher at School F, much like the other teachers in other curriculum subjects, perceived that the economics curriculum contained modern and/or Western examples which were misaligned with the Bhutanese setting. As a result, Sonam Yeshi had difficulty making connections between traditional and modern epistemologies and in some cases, she stressed that there is no connection between her subject and the Bhutanese context. She maintained, ‘our country is a very small country. We don’t have much industrial things and all these things going on. So our students, it’s very difficult for them to understand it. If they see things around, it will be easier for them to understand’. Sonam Yeshi and other economics teachers also stressed that their subject in particular diverges from the overall imperative of GNH, particularly the national emphasis on happiness over economic development.

Second, teachers were often highly critical of continued foreign influences on the education sector. The comment below by Mr. Nirad, a teacher and Indian national with

over 30 years of experience teaching in Bhutan, held a view that resonated with and summarised the perspectives of many other teacher participants. In his voice:

Basically there is cultural disparity. I remember the occasion when [a foreign academic]...he visited classes and lectured to students. I heard students grunting. What he was saying had nothing to do with Bhutanese belief and understanding. It's like a fish out of water. We are taking the Canadian ideas and trying to transplant it into Bhutan.

He held that the continued influence of foreign consultants on education reforms was the main reason why there were discontinuities between the curriculum and students' traditional knowledges and ways of understanding the world. During his tenure as a teacher of English at School C, he observed that the mismatch caused average students to 'have nightmares' when attempting to 'cope' with foreign texts. He highlighted that tensions were deeply embedded in his subject and stressed, '[w]hen we import the language, we import the values that do not belong to us'. Many other teacher participants shared Mr. Nirad's view and reported that their students faced difficulty making a 'text to life' connection.

Incompatible ideas were not only brought into Bhutan by consultants, but also by education leaders themselves. Representing and summarising the views of many other teachers, Yangchen Dorji, a vice principal at School C, and Kuenga Dolkar, an English teacher and school counsellor at School F, put forward critical views of education specialists that go abroad for higher education or professional training and implement techniques considered to be successful in other country contexts. Yangchen Dorji

maintained that foreign innovations brought in by Bhutanese education specialists are often enacted without modification. It is important to point out that Yangchen Dorji and other participants highlighted that educational materials and methods considered successful abroad were attractive to Bhutanese citizens because ‘foreign’ was often associated with being ‘better’ – a theme that will be examined below in Section 6.2.4.

Yangchen Dorji reflected:

Some of the comments that I have received from my colleagues, I found out they said they have a lot of controversial issues. They can see a lot of tension and they are not able to accept it. It’s just that they say that people go abroad, they study, and they try and impose and input the education, which might work outside and might not be relevant to our country. They try to input it just because it worked outside. They fail to see if it is really inline or at par [...] to our own society or not.

Kuenga Dolkar added:

‘[w]e need to do research first, to see if the curriculum is going to be effective in implementation. Is it going to suit the Bhutanese students or not? But usually, Bhutanese go out of the country to the West and get trained, and come back and implement. When it comes to implementation, those teachers that haven’t had any exposure, and they must implement. So our thoughts and views will contradict. These people come up with new ideas and ask us to implement it. Their ideas will conflict.

As VanBalkom and Sherman (2010) highlight, there is an increasing emphasis on the adoption of Western practices as education decision makers in Bhutan continue to examine different international practices in the quest to improve the education sector. However, the findings presented here suggested that borrowed educational forms should be closely aligned with the local school setting if they are to become accepted and take

hold – resonating with the work of scholars such as Guthrie (1986) who caution that education specialists in developing countries must be particularly critical when adapting educational models and strategies from other country contexts.

6.2.2 Tensions exacerbated by ongoing foreign inspired educational reforms

This study found that extant tensions were exacerbated by continual changes in the national curriculum. The teachers in this study commonly experienced anxiety and confusion about how to enact new reforms that involved imported materials and methods. Despite current education initiatives that focus on bringing together a confluence of traditional and modern ways of knowing, the continual shifts in the curriculum leave teachers confused. As Fullan (2009) argues, actors must hold a ‘shared meaning’ of educational change – particularly between the levels of policy and the curriculum – in order to enable all to make sense it. There were three interrelated factors related to educational change that exacerbated extant tensions: 1) the rapid pace of educational change, 2) insufficient training and, 3) a lack of support from the school community. These themes will be set forth in turn below.

First, teachers asserted that changes in policy, educational materials, and methods occurred at a pace so fast that they were unable to keep up. Two teachers exemplified this stance: Kuenga Dolkar, an English teacher and school counsellor at School F and Megrach Keru, an expatriate Math teacher at School D. Given the current climate of change and transition, Kuenga Dolkar aptly maintained ‘we are at a juncture – the transition between the old curriculum and the new curriculum’. Kuenga Dolkar added:

These days, when you are asked to do something different from the old ways of teacher, where you practice discovery centred learning and child centred learning, acting as a facilitator, these things are not working well. [...] at the moment we are not able to cope with this change because we are not used to this way of teaching.

Teachers were positioned at the centre of a number of changes to the national curriculum and pedagogy and uncertain about how to mediate between the ‘old’ and the ‘new.’ As a result, some teachers did not accept or fully understand how new content resonated with or should be enacted in their classrooms. From Megrach Keru’s perspective, teachers and students were challenged to adjust to the continuous implementation of new reforms. He stressed that, as a result, ‘[t]he children will suffer’.

Second, teachers described insufficient training on how to enact foreign inspired education reforms as exacerbating the tensions. Several teachers maintained that it was difficult for innovations to become entrenched, particularly when teachers receive little or no formal training on how to make use of new materials or methods. Thus, the achievement of a balance between traditional and modern epistemologies in the classroom was hindered by a lack of training for teachers.

Sonam Yeshi, an economics teacher at School F, explained that educational methods and materials brought in from abroad are often tested in Bhutan’s public schools. As previously discussed in 6.2.1, teachers often maintained that external innovations should be critically assessed and aligned with the culture before they are employed in the classroom (see also Spreen, 2004). Furthermore, the tensions that emerged from education reforms misaligned with traditional knowledges and ways of understanding the world

were exacerbated when teachers were not provided training on new materials and methods. They were instead left to interpret reforms on their own. Sonam Yeshi explained:

When they hear about something working in other countries, it is experimented here. I feel sometimes it doesn't work because we have so many cultural differences. What works in the West may not be very well accepted in our society. So, sometimes the teachers don't understand. Policy makers and planners, they may be planning to do something, but when it is implemented by us, there is some gap.

For Sonam Yeshi and her colleagues, it was difficult to interpret imported Western education reforms without sufficient in-service training on how these reforms should be enacted in the classroom. However, other teachers, such as Choki Wangchuck, a biology teacher at School E, were uncertain about how to enact the modern curriculum in line with GNH. For teachers like Choki Wangchuck, the lack of training on what tradition means and how it can be connected to their lesson left them unable to reconcile the tensions between traditional and modern epistemologies.

Third, teachers maintained a lack of support from the school community intensified the tensions between traditional and modern epistemologies. While this view was held mainly by teachers, one education leader, Mindu Dorji, a science curriculum officer and former science teacher, supported this stance and maintained that teachers may experience tension because 'sometimes support from the schools is not that good as well. [...] We cannot solely say the teachers are the black sheep'. In other words, teachers face opposition from figures of authority in the school setting and this constrains their teaching practice with regard to inculcating traditional epistemologies. Mindu Dorji posited that

school authorities pressure teachers to eschew the imperative of GNH to support the continuity of traditional knowledges and culture during their lessons and should instead focus on ‘older’ ways of teaching. That is, teachers were charged with resuming the practice of teaching exam content by rote memorisation. Kuenga Dolkar, representing and summarizing the views of other teachers, maintained that it is not only school authorities who place pressure on teachers, but also parents who associate teaching with ‘older’ approaches. He said: ‘[o]ur parents, in the past generation were taught like that and expect their children to learn it in that way’. He added that teachers are often pressured by parents and students to allow learners to ‘memorize and then ‘vomit’ what they have acquired. Kuenga Dolkar explained:

With the new ways of teaching, the students have to explore by themselves. They can’t use their critical thinking skills. When they take exams, there is nothing for them to pour out. They receive lower marks from the teachers who use the new ways of teaching. So, the students think the teachers who use the old way of teaching, teach better, because the students score better and receive higher marks.

Among the teachers who held this view, another oft-cited example was related to the nascent school counselling initiative, which was carried out with the support of foreign consultants. School counselling had recently been implemented at the time of fieldwork in 2010. Teachers at three of the schools research sites had been recruited to serve as counsellors. Resonating with the tensions set out in Section 6.2.1, the teacher counsellors and their colleagues observed tensions between ideas about counselling brought in from abroad and deeply embedded traditional disciplinary practices (e.g. the use of corporal punishment) that the counselling program was intended to replace. However, the school

counsellors stressed the difficulty they faced when implementing a program that was not accepted or understood by the school community. Parents were often identified as exerting the greatest pressure on teachers to resume the traditional practice of corporal punishment owing to the common use of traditional discipline at home. As Sonam Pelzom, an English teacher and school counsellor at School F, highlighted, ‘the biggest conflict [with traditional knowledges and culture] is the use of corporal punishment. Some parents come to the school and ask the teachers to hit their child’.

6.2.3 The consequences of perceived tensions: the higher prestige of modern epistemologies

What emerged from many of the interviews with teachers was the perspective that modern epistemologies hold higher prestige in contemporary Bhutan – a view which resonates with the work of Dyenka (1999) and Roder (2012). There were two main perceptions related to this theme. First, many teachers were held that the modern orientation of the curriculum was antagonistic to the continuity of traditional epistemologies. Second, some teachers observed a declining interest among their students in tradition and a higher regard for modern knowledges and popular cultures. For the teachers described in this section, the preference for modern curriculum materials and methods disturbed the possibility of balance between traditional and modern epistemologies.

First, was the observation of some teachers who saw the preference for and higher prestige of modern knowledges influencing the national curriculum. This was evidenced clearly by Dzonkgha teachers who previously used traditional Buddhist texts to teach the national language. They asserted that curriculum developers removed traditional texts in

efforts to make the curriculum relevant to the modern Bhutanese setting. The Dzongkha teachers provided particularly strong examples of traditional content that had been left out in favour of modern and ostensibly more useful content. Dzongkha teachers stressed that the content of their courses had changed over the past few years. Traditional Buddhist texts were replaced with market-oriented materials – rendering the Dzongkha curriculum in alignment with national modernisation goals. In other words, the curriculum was focused on the use of Dzongkha in the job market. Tenzin Dorji, a 28-year veteran Dzongkha teacher at School B, stressed that Dzongkha ‘was a subject that used to really focus on culture and tradition in Bhutan’. However, Tenzin Dorji stated that his Dzongkha language classes are centred on market oriented skills or, as he put it, ‘serving the livelihood and writing [job] applications’. Tenzin Dorji stressed that teachers now bear the responsibility for ensuring that the ‘wisdom of the past’ is imparted to students.

Many teachers pointed out that the use of Western texts and examples in textbooks from other country contexts encouraged students to express preference for Western over Bhutanese traditional knowledges and culture. Kuenga Dolkar, an English teacher and school counsellor at School F, exemplified this view. He explained:

In a way, it [the curriculum] is not really viable for conveying culture. Much of it is borrowed from the West. For example, students prefer to be called John instead of Dawa. Such materials, which glorify Western culture, it makes Western culture more prominent.

For Kuenga Dolkar and other teacher participants, the prevalence of Western examples and instructional materials is counter to the imperative to conserve and promote

Bhutanese traditional knowledges and culture as a tool to mitigate the negative effects of modernisation.

Second, teachers pointed out that as a result of modern knowledges being held in higher regard, young people have less interest in tradition. Observing declining interest amongst her students in Bhutanese history and civics classes, Dechen Tsomo at School E, pointed out that the modern curriculum is contributing to the higher prestige associated with international ideas. She perceived that her curriculum subjects are held in low regard by students. An attitude she attributed to a Western-based curriculum imbued with foreign ideas and reinforced by the norms and popular culture introduced through mass media, namely TV and the Internet. She maintained that her students had greater interest in the history and culture of other countries than they did about Bhutan. She worried that her subjects would lose relevance in the future. In her voice:

will History remain as a respectable subject in the classrooms in the future? When we cross class 10, we study a particular stream, like arts, science, and commerce. In arts, History can be one subject, but not compulsory subject. One can always leave behind History and take up mathematics instead. Because of that [...] History is losing its status in schools.

Reflecting the work of Appadurai (1996), teachers attributed their students preference for popular culture over local culture to the increased global ‘flows’ of information that are moving into Bhutan rapidly with the advent of new technologies. Sharing this perspective, Bindesh added:

[n]ow, due to modernisation, this country, very fast is changing toward modernisation. By that, I mean modern cultures. There is a danger in Bhutan, because children liking that path and deviating from their own culture and tradition. The influence of the media, TV's, and foreign culture...they tend to be more attached to foreign culture.

As this section has shown, the tensions set out in this chapter were associated with tradition, modernisation, and exogenous influences and have resulted in the higher prestige and preference for modern over traditional epistemologies. Significantly, education leaders – all of whom are responsible for ensuring that the curriculum aligns with GNH – did not share this view. This section illustrated an overarching theme that emerged repeatedly from the narratives of teachers – that classroom situations vary considerably from what is accounted for by those in the outer levels of the education sector.

6.3 Tensions between different epistemologies should be mediated by the curriculum and teacher training programs

The majority of the education leaders and some of the teacher participants maintained that there are tensions between traditional and modern epistemologies. However, their narratives largely focused on three main ways the tensions should be reconciled: 1) through inclusion of traditional and modern knowledges, 2) by enabling critical inquiry and, 3) national teacher education programs reinforce the balance already achieved by curriculum developers. These perspectives are examined in turn in the sub-sections below.

6.3.1 The curriculum is imbued with traditional and modern epistemologies

The majority of the education leaders held views in line with the state policy of Gross National Happiness which shows powerful aspirations toward conserving traditional knowledge and values while advancing modernisation and global engagement. As was shown in Chapter Two, curriculum policy describes a marriage of traditional and modern thought (Ministry of Education, 2012) – a precept which was upheld from the view of education leaders. Different situated forms of knowledge (Lave & Wenger, 1991), described here as traditional and modern, were included in educational resources in order to enable students to gain fluency or a degree of literacy in different epistemologies (Kalantzis & Cope, 2002; Johnson & Kress, 2003; Johnson et al., 2003). What emerged here was the theme that the national curriculum enabled young people to become literate in the different epistemologies extant in contemporary Bhutan – a view that contrasted with many of the teachers (see Section 6.2.1).

Mindu Dorji, a science curriculum officer at the Department for Curriculum Research and Planning and former teacher, stated that instead of conflict he sees a confluence of traditional and modern epistemologies, particularly in the science subjects. He held that, ‘we have been trying to encourage lots of interaction with local. We also believe that there are lots of knowledge in the community and in the school. That is what we want to harness’. From the perspectives of education leaders, the curriculum is inclusive in the sense that it is designed to incorporate different ways of knowing into educational materials and further emphasized through teachers’ delivery of the lessons. Such an approach resonates with scholars who argue that Western models of education adopted in

non-Western contexts should be made relevant to the local context (Anderson-Levitt, 2005; Le Grange, 2007).

Continuing in this line of thought, Pema Loday, a key decision maker in the Department of Curriculum Research and Planning, asserted that the curriculum supports the continuity of Bhutanese traditional epistemologies in two ways: first, it is relevant to the Bhutanese context and; second, it offers affordances for ‘cultural discussion’. He stressed that the revised curriculum is much better than older versions, which were ‘rigid’ and did not accommodate different knowledges and worldviews. For Pema Loday, the aspects of tradition taught in schools were defined by GNH. He saw GNH as a means of enriching teachers’ classroom practice. Additionally, he stressed that discussion of both traditional and modern ideas would ameliorate any tensions felt by students. For example, Pema Loday indicated that traditional beliefs offer support to the curriculum. For example, he highlighted that the commonly held notion in villages that nature has ‘ownership’ supports academic topics related to environmental conservation. He went on to say that old trees are viewed as ‘owners’ of their surroundings areas and as a result, are not cut down. Traditional knowledges and ways of viewing the world, from his perspective, support and reinforce lessons in the syllabus. From his perspective, teachers should employ traditional understandings to create scaffolding between different epistemologies and mediate any tensions in the classroom. Similarly, Mindu Dorji maintained that the modern curriculum can be ‘directly relate[d] to what [students] see in their day-to-day life’. Mindu Dorji held that the traditional Buddhist worldview of teachers and students does not conflict with concepts in the modern curriculum.

Jayatilleke et al. (2008), Liu and Lederman (2007), and Pickering (1995) also stress that the tenets of Buddhism are generally compatible with scientific thought. As Mindu Dorji put it ‘the Lord Buddha doesn’t talk much of the belief, but very practical type, which coincides and converges with science’. Mindu Dorji ultimately eschewed any possibility that a traditional worldview would hinder students’ ability to understand the modern curriculum. He explained, ‘[w]e believe there are certain things we can answer by science and certain things we cannot answer by science. For the students, that is too higher level for them to think of’.

Significantly, however, some teachers saw this interstice as imbued with tensions, which did indeed emerge during lessons (see Section 6.2.1). However, education leaders such as Mindu Dorji held that the modern curriculum accommodated traditional knowledges and culture. Reflecting on the common religious practice of walking clock-wise around the perimeter of monasteries, temples, and chortens while chanting and praying, Mindu Dorji maintained this religious practice supports lessons on physical activity in biology textbooks. He said:

So, many say ‘OK, why should you circumambulate?’ [...] circumambulate, you can concentrate when you are walking. You can think of your deity and walk. But at the same time, so at the end, you get satisfied that you were able to think, concentrate, and meditate with that deity. At the same time you are doing physical exercise. At the end of exercise you feel fresh. When you go to office you feel fresh.

He also cited traditional ideas that comport with modern, scientific lessons from the texts.

He stated:

we are talking about the solar eclipse and lunar eclipse so we have the activity where the school brings the religious person from the locality and makes him talk about solar and lunar eclipse from religious perspective. Students ask questions and finally the teachers' sums up and asks questions. It's just inviting discussion and make the students to form their own understanding, but they have to respect the scientific ideas because at the end they are learning science. But, some allowances can be made for that. Similarly here, the reformed curriculum, we have opportunities where local community engaged, to talk about the forest and even about the impact of religion on the conservation of ecosystem. How ecosystem contributes.

Mindu Dorji spoke positively about the current revisions being made to the science subjects, particularly at the middle secondary level. He held that the current curriculum reforms align with the imperatives of policy, namely the Gross National Happiness policy. Another curriculum official, Jamyang Sherab, a former university leader and values education teacher currently in charge of assessment, supported this stance. However, he stressed that the curriculum was already sufficiently fortified with traditional culture and examples as a result of education reforms in the 1980s aimed at 'localizing' or 'Bhutanizing' the curriculum. When asked about his perceptions of the tensions between traditional knowledges and culture and the modernization of education, he maintained that any disjuncture is and has been negligible. In his voice:

Well, most of our curriculum until grade 10 is very much aligned with our cultural needs, so I do not see any tension or conflict. It is very relevant to our context. Except, mathematics and science. They are universal subjects. Other subjects are more or less aligned with our cultural needs. Until grade 10 it is no problem.

From Jamyang Sherab's standpoint, the 'universal' nature of some subjects – namely,

math and science – means that these subjects do not elicit tension for students who are more familiar with traditional epistemologies. This stance resonates with Shiva's (2006: 162) research which shows that modern science is sometimes conceptualized as an 'objective' and 'fact-based' system of knowledge which may displace other ways of knowing due to the misperception of 'universality and value-free neutrality' (c.f. Liu & Lederman, 2007). Even when students come from rural areas where daily life is ostensibly framed by traditional epistemologies (Penjore, 2005), subjects based on modern knowledges were considered compatible with traditional worldviews.

6.3.2 Critical thought mediated tensions between different epistemologies

Several education leaders held that the emphasis of the national curriculum on critical thinking enabled students to reconcile the tensions between different ways of knowing. The emphasis on critical thinking is evidenced, for example, by the constructivist philosophy described in the National Curriculum Framework (Ministry of Education, 2009: 11), which recognizes that '[l]earning takes place through interactions with the environment, nature and people'. That is, teaching and learning engages knowledges situated in the context while enabling exploration, debate, questioning, reflection, and supporting students to draw their own conclusions. This resembled a discovery- (Bruner, 1961) or inquiry-based approach to teaching and learning (Kirshner et al., 2006). The education leaders who held this view stressed that teachers must act as facilitators rather than as authoritative transmitters of knowledges if students are to decide for themselves if they will accept or reject a particular epistemology – a perspective which aligned with curriculum documents (e.g. Ministry of Education, 2009).

The education leaders stressed that the curriculum was reflective of the critical mind-set required for participation in the newly democratic government. For Jamyang Sherab, a former values education teacher and current stakeholder in charge of assessment, young people must be taught to think in a modern ways and learn to question authority. Jamyang Sherab held that traditionally, Bhutanese citizens were accustomed to accepting information transmitted from authority figures. Jamyang Sherab held a view that represented the standpoint held by two other education leaders. He explained the new role of the national system of education in fostering critical engagement with traditional epistemologies:

In one way the education will help them to look at our culture critically so whatever is there is not blindly believed or done. Education helps in practical thinking. Culture is good but there are certain aspects, which need to be changed with the time. Education helps people to critically analyse our culture and do what is needed for the time and think about how it can be changed if it does not suit our need. Education plays a very vital role.

That is, the curriculum should foster critical thinking and enable students to make their own decision regarding which aspects of tradition to carry forward and which should be left behind. Accordingly, Pema Loday pointed out that the ‘good’ and ‘bad’ aspects of different knowledges are presented in the textbooks and teachers are charged with further emphasizing these. In this way, teachers participate in a *generative* process (Bates et al., 2009) of teaching where learners critically engage with different knowledges rather than memorizing and reciting information without question.

Related to this point, Karma Dendup, an official in charge of teacher training programs, held that school materials should not prescribe a particular worldview by drawing too heavily on traditional or modern epistemologies. In other words, the living and designed curriculum should enable understanding and critical engagement with Bhutan's traditional 'texts' – e.g. the values and codes of *driglam namzha*, Buddhist beliefs, and local understandings of man and nature – while enabling students to understand global 'texts' – e.g. computer literacy, knowledge about modern medicine. In other words, teachers should take a 'multiliterate' approach (Johnson & Kress, 2003; Johnson et al., 2003; Kalantzis & Cope, 2002). Karma Dendup stressed that '[w]hile you value what is local; you have to recognize the benefits of what is global, what is international, because you are part of that'. However, what and how much traditional epistemologies to include in lessons was not defined by policy and must be determined by teachers.

Three education leaders elaborated on the rationale behind emphasizing critical engagement with different forms of knowledge. As Pema Loday, a curriculum decision maker who was introduced earlier, explained, Bhutan has a long history of 'believing in faith blindly' – a characteristic associated with tradition that participants traced to Bhutan's former theocratic and monarchical rule (see also Section 2.2). Selden Gopal, an officer in charge of the values education curriculum, who held a number of key roles in the planning and development of school curriculum, added that, historically, young people were 'indoctrinated' with traditional beliefs and ways of life. In contemporary Bhutan, however, Selden Gopal maintained that age-old beliefs should be questioned. He held that querying the relevance of old beliefs comes naturally for young people who did

not grow up in ways of life where traditional epistemologies were deeply entrenched. Sharing this perspective, Jamyang Sherab, an officer in charge of assessment who was introduced earlier, discussed the importance of instilling in young people critical thinking skills. Reflective of the perspectives presented in this section, the National Education Framework (2009: 30) proposes values education that is inclusive of ‘a pride in being Bhutanese in a world community and sharing its unique cultural heritage’ while developing in students a ‘love for learning, curiosity, logical and critical thinking’. Guidelines on infusing values into lessons are broadly stated in available documents and highlight the critical role of teachers. For example, a values education discussion paper (Ministry of Health and Education, 2007: 1) elaborates that values education does not rely on ‘a particular set of teaching materials, but the attitude and the example that the teachers and parents set’ and calls for an ‘absolute commitment of teachers’ not only to teach but also to embody traditional Bhutanese values.

Having set out the view that the curriculum supports teachers to facilitate the understanding and navigation of different ways of knowing and ultimately allow students to decide for themselves their stance on particular worldviews – the next section examines a related perspective. Some teachers and education leaders held that the tensions between traditional and modern epistemologies are reconciled because the curriculum was inclusive of different ways of knowing – a view that was in stark contrast with the perspectives of teachers who maintained that there is little or no training provided to teachers on how to implement a culturally relevant pedagogy (see Section 6.2.3).

6.3.4 National teacher training programs supported traditional and modern epistemologies

National teacher training programs were seen as buttressing the balance perceived in the curriculum by providing teachers a set of pedagogic skills to enable students to understand and navigate different ways of knowing. An official at a College of Education maintained that, in terms of pedagogy, modern and traditional epistemologies are ‘complementary’. This relationship was reinforced by the national teacher education programs. Karma Dendup stressed that trained educators should be able to access traditional forms of knowledge and connect these with the modern ideas in class texts. In other words, normative pedagogy in Bhutan is based on a ‘multiliterate’ approach (e.g. Kalantzis & Cope, 2002). In Karma Dendup’s voice:

We try to balance the two approaches. While we emphasize modern pedagogy, we also emphasize the need to infuse cultural, traditional, and spiritual values in their practices. For example . . . it starts from the morning when the students come to the campus, there is something called the morning assembly. . . . [T]hey gather in a big hall [—] there are a few prayers that students say [and] a mindfulness exercise that students go through. It gives students them an excellent opportunity to reflect on what is in their mind that day and what they would like to invest their energies in that day. . . . In the modern, we try to draw upon the latest research into teaching and learning. For example, we deal with the constructivist notion of how students learn to construct their own world-views, and how they create their own knowledge. While we emphasize these notions, we also emphasize the need to recognize their own mind monitor their own mind, what is going on in their own minds. It’s a beautiful balance; modernist ideas and Buddhist ways of looking at the human mind.

Following in this line of thought, Karma Dendup provided examples from the teacher training program at his institute of how traditional ideas supplement the curriculum. For example, teachers are trained to infuse *zorig chusum* – i.e. Bhutan’s thirteen traditional

arts – and traditional monastic dance across the curriculum subjects. For instance, he stated that teachers could draw on ‘traditional dance forms and blend the dance forms with modern ideas’ in the texts.

Karma Dendup pointed out that teachers trained at his institute were provided skills to support the overarching goal of the education sector: to inculcate traditional and modern epistemologies in line with the GNH policy. For Karma Dendup, tradition was largely associated with Buddhist beliefs and practices. Karma Dendup held that the ‘Buddhist notion of values’ should be practiced ‘at every moment’ by members of the school community in order to fully impart this aspect of Bhutanese tradition to students. Furthermore, he stressed that values should not be considered as ‘something separate’ from teaching practice. In his voice:

And this is very much in so many ways with the Buddhist notion of values having to be practiced every moment, in the daily life. And the need to be mindful that you are practicing it at every moment. It should not be practiced in some situations and not in certain other situations. The Buddhist ideal is to be mindful...be conscious...be mindful that you are practicing in every moment of your life. And then it becomes habituated. It becomes habit, engrained, embedded, and then it becomes hard not to do it

The intended functioning of the curriculum in terms of achieving a balance of traditional and modern ideas, from Karma Dendup’s perspective, is dependent not only on individual teachers deliberately infusing Buddhist values into their classroom practice but also on support from ‘the entire school culture’. That is, ‘every aspect’ of schooling should be infused with the pillars of GNH, thereby constructing schools as a ‘microcosm of happiness’. However, Karma Dendup acknowledged that even though teacher training

programs support a culturally relevant and ‘multiliterate’ (Johnson & Kress, 2003; Kalantzis & Cope, 2002) pedagogy – aligning with the policy imperative to carry forward traditional forms of knowledge – teachers’ classroom practice may be constrained by school leaders who do not accept or understand the value of tradition – a theme which will be examined further in section 6.4.

This section demonstrated that extant tensions between traditional and modern epistemologies were considered to be reconciled by the curriculum and teachers classroom practice. However, some participants held contrasting perspectives. The next section examines the perspectives of a minority of teachers and education leaders who considered the curriculum to be in line with the modern mind-set of contemporary Bhutanese citizens.

6.4 Teachers’ resistance to the precepts of curriculum and policy was the source of tensions between traditional and modern epistemologies

As has been demonstrated thus far, education leaders and some teachers held that the national curriculum is imbued with a suitable balance between traditional and modern epistemologies. As was also indicated, the delivery of the curriculum should be inclusive of traditional epistemologies, particularly when these are not present in written educational materials. Additionally, as was already discussed, teachers should enable students to reconcile any tensions between traditional and modern epistemologies. From this standpoint, extant tensions were attributed to one main reason – the curriculum and policy directives were misinterpreted or resisted by teachers. As a result of the perceived breakdown in the delivery of the curriculum, some stakeholders maintained there could

be disjuncture between students' worldviews and the content of the curriculum. This idea will be examined further below.

Karma Dendup and several other education leaders maintained that some teachers failed to adhere to the curriculum policy directive (Ministry of Education, 2012) that lessons should be augmented with traditional epistemologies. As a result, students experienced tension related to differences between traditional and modern ways of knowing. Importantly, this assertion is premised on the assumption that there is a generally understood conceptualization of tradition and that all teachers understand how to include traditional epistemologies in their lessons. This stance overlooks the diversity of cultural and national backgrounds of educators and the possibility that some may not be familiar with Bhutanese traditional epistemologies and culture. However, Karma Dendup explained that teacher trainees are encouraged to employ a pedagogy which resonates with the 'multiliterate' pedagogy described by Kalantzis and Cope (2002), Johnson and Kress (2003), and Johnson, Garrett and Crossley (2003). Karma Dendup added that teachers in Bhutan should assume a child-centred approach and act as a 'facilitator'. Thereby, enabling points of commonality and conflict between traditional and modern ways of knowing to be identified and discussed in class. In other words, the approach to pedagogy promoted in Bhutan's teacher training programs should enable teachers to accommodate different worldviews. It merits mention, however, that only teachers that were recently trained at one of Bhutan's colleges of education would have received the training described by Karma Dendup.

Mindu Dorji, a curriculum officer introduced earlier, also identified teachers' classroom practice as a point of breakdown in the mediation of tensions. However, Mindu Dorji asserted that it is teachers who take a 'traditional approach' that are unable to bridge the divide between traditional and modern ways of knowing. Like Karma Dendup, he pointed out that teachers are encouraged to imbue their lessons with traditional knowledges and examples from the local context. However, from Mindu Dorji's standpoint, teachers do not always enact the directives they are given, particularly when they hold a 'traditional mentality' – a stance which resonates with scholarship on curriculum theory such as Kelly (2009) and Fullan (2007). He explained:

We had in our mind that we should invite people from the local area and make them take up and to share; a change in mode of teaching. But, I think as of now, my hunch is it is not happening. Again, it depends on level of training of teachers. [...] if teachers are quite innovative, they will do anything. But if teachers are very traditional, still, with the traditional views and ideas they actually don't like to go beyond the classroom. [...] At the time of delivery, we have a problem. Not many have much of change taking place.

Karma Dendup stressed that the pedagogy endorsed by the education system is distinct from what he described as the 'traditional approach'. In other words, the use of rote memorization associated with teaching in monastic schools and the pedagogy employed by the Indian teaching cadre. A traditional pedagogy was considered to be inadequate for addressing discontinuities between traditional and modern epistemologies and exacerbated tensions because this instructional method relies on memorization and reproduction of information (see also Jamtsho, 2001; Ministry of Education, 2009) rather than enabling critical engagement with continuities and discontinuities that arose between traditional and modern ways of knowing. Interestingly, Karma Dendup and Mindu Dorji characterised traditional teachers as those who held a rigid mind-set and were unable to

veer from the syllabus. Here, tradition was used to denote an outmoded pedagogy. In Karma Dendup's voice:

Teachers who have had traditional education would find it difficult to reconcile. But, teachers who have been trained in a program like ours would not find it difficult.

Karma Dendup went on to state that Dzongkha teachers would have the greatest difficulty imparting lessons in a culturally relevant way. He cited the general lack of formal training among teachers of the national language as the main reason why they might experience tensions between traditional and modern epistemologies. While quantitative data to support this claim could not be identified, as will be discussed in Chapter Seven, the two Dzongkha teachers who participated in this study both reported that they did not attend formal primary or secondary schooling but enrolled in and received a qualification to teach Dzongkha at the Institute of Language and Cultural Studies. Karma Dendup also pointed out that some Dzongkha teachers were trained in monastic institutions rather than in the national system of modern education. In his voice:

we have teachers who have had monastic training. They were trained in the monastic college back in the 50's and 60's and have continued to teach the national language Dzongkha and haven't had the chance to take a formal teacher training program. They might find it a little difficult. But, they would only be teaching Dzongkha.

Here, ideas about tradition were cast in a negative light and applied to a rigid style of pedagogy which relied on memorization rather than critical thinking and did not deviate from the official curriculum. As Stiles' (2009) study also found, a negative view among education stakeholders in Bhutan has proliferated 'without any understanding of meaning

in the way [focused memorization] was used in the past form of traditional learning’. Stiles (2009) proposes that that this negative view of traditional pedagogy is misplaced and does not always denote traditional monastic Bhutanese pedagogy. Rather, this stance stems from the association of the Western model of schooling and curriculum imported from India which relied on an Indian teaching cadre that employed rote teaching and learning. Moreover, Stiles (2009: 97) found that among the Bhutanese participants in her study ‘most of the criticism was directed at their experiences with Indian style Western schooling’. Indeed, what emerged here were two distinct ideas about tradition. For some, tradition comprised Bhutan’s ‘wisdom of the past’ and traditional knowledges and ways of viewing the world should be carried forward. For others, aspects of tradition were cast as backwards, outmoded, and undesirable aspects of bygone times – all of which were considered obstacles to the implementation of the curriculum. Inconsistent conceptualizations about what tradition means and encompasses – seen also in Chapter Five – suggest the balance sought by stakeholders across the educational sphere is not easily attainable as a result of the counterweights to modernity not always holding a linear position along the other side of the scale.

Two teacher participants agreed. For example, Tshoeyang Tshodhen, an English teacher at School F, asserted that teachers are responsible for ensuring traditional epistemologies were inculcated and any tensions were reconciled. Tshoeyang Tshodhen explained that, at School F, a foreign education consultant visited the classes of many of the teachers and, based on observations, determined that teachers at her school were not enacting the curriculum in line with policy. Thus, at her school, teachers were directed to ensure that

traditional epistemologies were imparted in every lesson. She explained that addressing this directive ‘depends on the facilitator, how the teacher is going about. It depends on individual teachers’. Sangay Lhamo, a teacher at School C, also pointed out that while she does not experience any tensions between traditional and modern knowledges and – as a result – is able to mediate any tensions that emerge during class, she noted that some of her colleagues are unable to do so. Sangay Lhamo stressed that some of her colleagues already hold ‘some sort of reservation’ regarding the inculcation of traditional knowledges and ways of viewing the world. She indicated that teachers must understand the importance of Bhutan’s traditional knowledges and culture. From her perspective, teachers should creatively include traditional epistemologies in lesson planning and delivery. A static lesson plan and rigid adherence to the written curriculum would inhibit the accommodation of different knowledges and worldviews when they emerge in class.

6.5 Summary and reflections

In reflecting on the tensions examined in this chapter, it was clear that the majority of the teachers and education leaders tried to reconcile the tensions between traditional and modern epistemologies. However, the findings presented here demonstrated that the perceptions of tensions by those at the periphery in the educational sphere (education leaders) often differed significantly from that of those at the sphere’s core (teachers). Participants’ narratives varied about *why* tension emerged and persisted and the *means* by which they should be mediated.

As this chapter revealed, the majority of the education leaders held that the curriculum is balanced in terms of traditional and modern knowledges and ways of understanding the

world. Some cautioned that too much traditional content would pose a danger that young people would be ‘indoctrinated’ into Bhutanese culture. Therefore, for many of the education leaders, critical engagement with traditional and modern epistemologies enabled tensions to be resolved at the individual level. Many teachers also saw a balance of traditional and modern epistemologies. However, contrasting with the views of the majority of the education leaders, teachers stressed that their deliberate transmission of traditional epistemologies mediated the tensions rather than attributing the balance to the curriculum or teacher training. Owing to the perception of education leaders that the curriculum presents a balance of Bhutan’s wisdom of the past while preparing students for life in contemporary Bhutan, some education leaders claimed that any tensions are due to teachers’ resistance to the imperatives of policy and curriculum.

Many teachers pointed out that education policies and practices adopted from abroad are a source of tension and mismatch with traditional epistemologies. Teachers held that a curriculum too heavily steeped in Western and/or modern ideas would be compatible with the Bhutanese context – therefore, tensions were seen as irreducible despite efforts to localize the curriculum. What emerged in this chapter were deep fissures between the voices of teachers and those in the outer layers of the educational sphere.

Having evidenced the tensions perceived by education leaders and teachers at the level of the curriculum, the next chapter will examine the pedagogic strategies that teachers employed to mediate the tensions between tradition and the modernisation of education

Chapter Seven: Teachers' pedagogic strategies for mediating the evident tensions

7.1 Introduction to the chapter

Having established in the previous two chapters the plurality of tensions related to tradition and the modernisation of education at the political and policy level and at the level of the curriculum, this chapter further recognizes that educators navigate and address tensions in the classroom. As the previous chapter demonstrated, these tensions often pose unique challenges and problems as compared to those in the outer layers of the educational sphere. Indeed, to fully understand the complexities of translating policy and discourse into practice requires widening the scope of analysis to include the voices of teachers about what actually happens in the classroom when different epistemologies come into contact. Understanding and observing their practices can offer vital clues about how policy and directives are interpreted and enacted in the classroom context. However, understanding how teachers in Bhutan address the evident tensions within the present climate of change and transition is largely absent from the literature, for example, currently, there are no available empirical studies on pedagogical strategies employed by teachers to mediate tensions between traditional and modern epistemologies.

As such, one of the primary foci of this study has been to contribute to filling this literature gap. To this end, in-depth interviews were conducted with fifty-one class 10 teachers at six different middle secondary schools and a sample of seven teachers were

observed.⁵ The interviews and observations demonstrated how teachers navigate the discontinuities and continuities between the modern curriculum and traditional epistemologies. By focusing on the teacher as a ‘mediator,’ this chapter addresses the third key dimension of this study, framed by the following research question:

How do teachers mediate the tensions?

In addressing how teachers mediate the tensions, it is necessary to examine their pedagogic strategies, i.e. *accommodating*, *inviting discussion*, *subordinating*, and *dismissing*. These strategies emerged from analysis of the interviews with teachers and observations of the classroom practice of a sub-set of the teacher participants. This chapter is subdivided into two main sections: first, focusing on the strategies that recognize the co-existing utility of traditional and modern ways of knowing, i.e. *accommodating* and *inviting discussion*, and second, the strategies that do not, i.e. *subordinating* and *avoiding* or *dismissing*. Also discovered was that at times, teachers employ these four main strategies in contradictory ways when they encountered tensions between different epistemologies. It should be stressed that as in the previous two chapters, the findings presented here follow the theoretical framing of the study which

⁵ It should be stressed that most of the teachers received limited formal training related to recent education reforms – e.g. educating for GNH, the green schools initiative – and relied on brief workshops, directives from school leadership, but mainly they rely on their own interpretations of top down directives. Additionally, a minority of respondents were not trained teachers but were government scholars serving the public service requirements of their scholarships. As shown in Appendix III, the teachers hail from all but one of Bhutan’s *dzongkhags* – i.e. most grew up in isolated agricultural areas where their ways of life were deeply embedded with traditional epistemologies while a minority of the group hailed from Thimphu and were attuned to a comparatively modern lifestyle. All of the teachers described their own educational experiences with a top-down approach where teachers transmitted knowledge to the student and students reproduced knowledge through rote memorization.

drew on interdisciplinary literature mainly in the fields of education and modernisation, indigenous knowledge theories, and sociocultural studies. Yet, the findings presented in this chapter are largely descriptive and make only descriptive claims in order to provide details about teachers' classroom practice that are absent from the literature. In the chapter that follows, the findings from across the three findings chapters will be critically discussed against the extant contextual (Chapter Two) and theoretical literature (Chapter Three) and offer theoretical claims that will attempt to further understandings of the role of education in mediating the tensions between tradition and the modernisation of education.

First, following the views of scholars such as Rogoff (2003), who argue that learning should build upon previously acquired knowledge, many teachers in this study reported employed culturally-relevant pedagogic strategies to meet the demands of policy and render modern concepts more easily understood (see also Gutiérrez et al., 1999; Greenberg & Moll, 1998; Lave & Wenger, 1991; Le Grange, 2012; Omolewa, 2007; Sarangapani, 2003). These teachers recognized that the epistemologies and skills extant in learners' homes and communities may offer affordances for learning.

7.2 Pedagogic strategies that enable the co-existing utility of traditional and modern epistemologies

This section will examine a prominent theme that emerged from the interviews and classroom observations – that teachers enable 'spiritual,' 'traditional,' or 'cultural' epistemologies to be brought into their lessons for the purpose of mediating the tensions related to tradition and modernisation. They did so through two main approaches

identified by this study – *accommodating* and *inviting discussion*. In the first sub-section, the pedagogic strategy of *accommodating* traditional and modern epistemologies, *which involves positioning each of them side-by-side and on equal footing*, is examined. The teachers who employed this approach actively drew upon their own conceptualizations of traditional and modern knowledges and worldviews. Some deliberately sought to *accommodate* different epistemologies while other teachers revealed that this was an implicit part of their teaching practice. The second sub-section examines the narratives of teachers who, for the purpose of mediating tensions, *invited discussion* of different ways of knowing. This approach enabled students to discuss the various points of commonality and conflict between worldviews. Teachers who employed this strategy refrained from asserting their own view and allowed their students to ‘discuss’ and ‘explore’ on their own.

Both of these strategies were seen as supported by policy, namely the recent shift in the role of the teacher from an authoritative transmitter of knowledge to a facilitator of students’ learning, i.e. acting as a facilitator enabled teachers to *accommodate* and *invite discussion* of different epistemologies. Teachers pointed out that this is in contrast to the long-held practice of memorizing course material, which was often referred to as ‘vomiting out,’ ‘coming out,’ ‘mugging up,’ and ‘marking by heart’.

The strategies of *accommodating* and *inviting discussion* will be discussed in turn in the sub-sections below.

7.2.1 Accommodating

Teachers' motivation for the use of the strategy of *accommodating* different forms of knowledge was attributed to two main and sometimes overlapping reasons: i) for the purpose of enabling their students make better sense of the curriculum and; ii) to support the continuity of traditional epistemologies which were considered to be rapidly deteriorating as a result of the curriculum and national modernisation. In doing so, teachers *accommodated* traditional and modern epistemologies. That is, traditional knowledges and worldviews were known, subsumed, and paired on equal footing with modern ideas. Drawing on interview and observation data, this section provides evidence from teachers' who sought to *accommodate* different epistemologies. It is subdivided according to four main approaches: 1) bridging the divide between students' understandings and the content of the curriculum, 2) addressing the incongruence between students' aspirations for white-collar work and the largely traditional job market, 3) innately inculcating traditional epistemologies, and 4) embodying aspects of traditional culture and acting as a role model for students.

Bridging the divide between students' understandings and the content of the curriculum

As was demonstrated in the previous chapter, many teachers, such as Kezang Wangdi, a School E chemistry and biology teacher, held that the texts present concepts that do not always resonate with students' worldviews nor do educational materials include 'topics regarding the culture'. Tashi Oms, a geography teacher at School D, explained that – particularly for students who are the children of farmers – there is a 'contrast between the curriculum and the students' understandings'. What deserves attention here was a theme that emerged repeatedly among teachers – that the curriculum does not always align with

the knowledges and worldviews of students' homes and communities – a view that is in contrast, as mentioned earlier, with many of the participants located in the outer layers of the educational sphere. This tension was the impetus for including traditional epistemologies – considered by teachers here as useful funds of knowledge (Greenberg & Moll, 1990) – as a tool to bridge the perceived lack of connection between students' traditional understandings and the curriculum. That is, 'scaffolding' (Ares, 2006) was constructed between different ways of knowing by making clear links between knowledges and worldviews familiar to some students and the modern curriculum. Teachers attempted to enable their students to understand and navigate contrasting epistemologies. Tashi Oms held that her normative classroom practice centred on a balanced examination of traditional and modern ideas so that her students could make connections among them. Without thorough explanation, she maintained that her students would not understand the curriculum. As was indicated in Chapter Three, linking modern concepts to learners' worldviews and everyday experiences enables students to make better sense of the curriculum (e.g. Lave & Wenger, 1991; Rogoff, 2003; Omolewa, 2007).

Some teachers explained that the facilitative approach supported by policy allows them to inculcate traditional knowledges, even when absent from the curriculum, as a tool to mediate tensions between traditional and modern epistemologies. For example, Jigme Wangmo, a recently trained science teacher at School F, pointed out that 'nowadays, teachers realize [...] unless the concept is clear, it is not necessary to fix onto what is in the textbook only'. Observations of Jigme Wangmo's classroom practice showed that

during a lesson on electromagnetism and the electric bell, she framed the lesson by first examining the traditional and modern concepts of time. After generating examples of modern concepts of time and ways of keeping track of time, she related the discussion to ways of life in Bhutan's villages where monks use gongs and hammers to mark time rather than clocks and bells.

Chencho Wangmo, an English teacher and school counsellor at School C, described a similar pedagogic approach:

I try to improvise and see how they can relate to the environment they are living. [...] I try to supplement ideas. I try to modify also [...] to tell them how it can be related to our own contemporary ideas. The success lies basically because of my improvisation. Also, trying to bring out the skill in them, how they can really relate. How they can connect. There are always connections.

In contrast to the views of some education leaders and political and policy level stakeholders, Chencho Wangmo represented the views of many other teachers and maintained it is her own *accommodation* rather than the curriculum that enables students to understand and navigate among traditional and modern epistemologies.

Linking the curriculum to 'the culture at the students' level' and making a 'text to life connection,' was described frequently by science teachers, such as Kinley Euden at School E. She often employed such an approach because he regularly encounters stark contrasts between traditional health and medical practices and 'modern,' western science during her lessons. During a lesson on the solar and lunar eclipse, Karma Tandin at

School B, explained how he addresses the differences between traditional and modern epistemologies:

In our view, we say here it is like the solar and lunar eclipse happens...at that time, the sun or moon it has been attacked by the demon and all. In the east they have their own thing [...] they say if it happens at night [...] they go for night hunting. Sometimes here we [...] relate to our thing and relate to what they have written in the text. It contradicts but still we have to tell our younger generation that this is our belief and this is the perspective of the Westerners.

In this way, Karma Tandin attempts to reconcile tension by pointing out the discontinuities between commonly held traditional beliefs and the content of the modern curriculum. Tashi Tshomo, another science teacher at School B, described a point of conflict between the beliefs toward the use of modern and traditional medicine and her pedagogic approach for addressing this tension. In order to bridge these views and *accommodate* both, she described a story she uses in class about a boy in a remote village who falls ill and is treated by both a *tsip* (i.e. a traditional astrologer or diviner) and a doctor from the Basic Health Unit. While the mother of the boy believed he was cured from illness by the *tsip*, the father believed it was the use of modern medicine that treated the boy. In the villages, the *tsip* is often more highly regarded than a doctor, however, in some cases a person will be treated by both. The science teacher explained that when she tells the story to her students and asks them which treatment healed the child, her class of 39 students reported it was the *tsip*. She explained, ‘Here also, in Thimphu, they go to the *tsip*. [The students] are saying ‘Madam, we are modern, but we must hang onto our traditions’. So, they are saying and doing both’. Teachers reported often pairing

traditional health knowledge side-by-side during lessons on Western medicine and health practices. These teachers described the common practice of seeking medical advice at a modern hospital while, at the same time, performing a *rimdo* (ritual) in order to remedy the traditional cause of their malady. Tashi Tshomo, as well as many other teachers, reported drawing on traditional epistemologies in order to render the curriculum connected to the lives of students. Additionally, other teachers purported that traditional views of the world are critical in order for students to make sense of life. That is, traditional worldviews ‘fill the gap’ in a modern worldview. Take, for example:

we should also believe in the religion, culture and all. You should not solely think that science is everything. Sometimes there might be some space left for this culture and religion to fill up where science could not have. (Kezang Wangdi, Science, School E)

Ugyen Lhendup, Tashi Tshomo, Karma Tandin and several other science teachers also took a positive stance on the *accommodation* of traditional and modern perspectives. Ugyen Lhendup explained that when contrasting worldviews emerged during his classes, he tries to ‘strike a balance between both’. He emphasized the need to ensure his students are not confused, particularly as his course materials had not been ‘localized’. Therefore, he makes a point to clarify the ‘traditional and cultural’ beliefs and the contrasting aspect of the modern curriculum. Observations of Ugyen Lhendup’s biology class revealed that he starts each class by engaging his students in five minutes of Buddhist meditation. During an observed class, students broke up into groups and discussed contrasting views on reproductive health. Later, the groups delivered presentations on the differences between traditional and scientific views on reproduction,

abortion, and STDs. Religious and family factors were brought to the fore and discussed alongside the course content. For example, Ugyen Lhendup asked his class how society views abortion from a religious, cultural perspective. In response, the class discussed the Buddhist notion of karma and maintained that an unborn baby should not pay for his/her parents' sins. Ugyen Lhendup put forward the subject of contraception and its compatibility and incompatibility with Buddhist beliefs. The topics from the text were linked to discussion of why Bhutan should keep national culture and tradition intact. Ugyen Lhendup ended the lesson by reiterating the religious and cultural beliefs and presenting them side-by-side with modern topics in the textbooks. It merits mentioning that Ugyen Lhendup's also sought to infuse traditional epistemologies into the classroom environment. His class was brightly decorated with posters on Bhutanese history, the pillars of GNH, and the Buddhist Eight Fold path. However, what is significant here is that pedagogic approaches like Ugyen Lhendup's hinge on the belief that different epistemologies hold equal currency and, furthermore, that teachers treat the continuities and discontinuities between them as an important part of the planning and delivery of their lessons. In Ugyen's case, he also took into account the influence of the overall classroom environment. However, such an approach ostensibly requires considerable skill on behalf of teachers. As was described in Chapter Two, teacher training on how to infuse traditional epistemologies into their lessons, in line with GNH, are at a nascent phase and many teachers in this study relied on brief workshops, directives from school leadership, but mainly on their own ideas about tradition and how it can be *accommodated* and inculcated during their lessons.

The examples of teachers' pedagogies described thus far were characterised by a focus on constructing a bridge between epistemologies situated in dichotomous relationships, e.g. home and school, traditional and modern, and scientific and religious. At the same time, however, some teachers described *accommodating* different forms of knowledge in order to ensure that tradition was carried forward. These teachers pointed to the decreasing presence of traditional knowledges and ways of understanding the world in the curriculum as the rationale behind ensuring these epistemologies were included in lesson planning and employed in their classroom practice. Furthermore, a sense of anxiety about social change and cultural loss seemed to drive their teaching practice. For example, Jigme Euden proffered that, '[i]t is necessary to include because now that our country is reaching that state where cultural dilution might take place'.

The Dzongkha teachers involved in this study were particularly concerned about the effects of modernisation and new global ideas on their curriculum subject. Tenzin Dorji, a Dzongkha teacher at School B with 30 years of experience, explained that prior to the reform of the Dzongkha curriculum, traditional epistemologies were inherent in the Buddhist texts used in his lessons. However, the vocational orientation of the new class 10 texts requires that students learn Dzongkha for the purpose of preparing CVs and cover letters in Bhutan's traditional script. However, he stated that he 'goes around the text' in order to include traditional knowledges and values. Tenzin Dorji lamented the absence of Buddhist texts which inculcated traditional values such as 'integrity' and 'humility'. He held that 'now there is not much in the curriculum that talks about Buddhist values. *Le judre* has decreased'.

Addressing the incongruence between students' aspirations for white-collar work and the largely traditional job market

For educators like Tenzin Dorji, formal schooling was embedded with potential tension due to the encouragement of the movement of students into a modern job market. As Bates and Nakashima (2009: 6) note, 'education curricula, designed for a mainstream and largely urban populace, may be of limited utility for remote rural communities where wage-earning jobs are few and far between'. The work of Bates and Nakashima (2009) resonates with the narratives of teachers who reported that a large number of their students are members of families engaged traditional livelihoods, such as farming or yak herding. As Kinga (2005: 35) writes, 'the challenge of youth unemployment also subtly reveals the fundamental change Bhutan has been undergoing from a traditional society to a modernizing economy'. Owing to the lack of available jobs in Thimphu, coupled with the growing number of unemployed youth, students may return to the agricultural lifestyles of their home villages. Others may remain in the city, unemployed, and as reported often in the Kuensel and Bhutan Times, youth are increasingly joining gangs. Conversely, the 'too modern' curriculum generates incongruence between students' career aspirations and the job market. Some teachers described creative pedagogic strategies for addressing this tension.

Chen Chen, a geography teacher with 28 years as an educator, reported that he developed an agricultural project at School D for the purpose of teaching students about farming techniques and fostering an interest in traditional agricultural livelihood. As Chen Chen explained '[a]griculture is the culture of Bhutanese'. As part of this experiential learning project, students volunteered their time to cultivate vegetable crops and tend to livestock.

The resulting agricultural products were sold to teaching staff and school administrators, thereby providing students practical vocational experience. Similarly, as Anderson-Levitt (2003) shows, there are educational benefits to appropriating global ideas, for instance workforce preparation, to align with local realities. It merits mentioning that comparable projects did not exist at any of the other schools involved in the research. Chen Chen, who spearheaded this project, adhered strongly to the idea that youths' career aspirations should be reoriented to include the 'educated farmer' thereby marrying traditional and modern aspirations. However, while Chen Chen was an active supporter of inculcating tradition, he also held contradictory views, which will be explained further in section 7.3.1.

Naturally and implicitly inculcating traditional epistemologies

While some teachers in this group made deliberate efforts to inculcate traditional epistemologies, as was indicated in the previous chapter, other teachers revealed that the transmission of Bhutanese culture is an innate part of their pedagogy regardless of its inclusion in textbooks and other teaching materials. Interestingly, even expatriate teachers, such as Vinod, a Biology teacher at School B, maintained that teachers at his school convey traditional epistemologies as a normative part of their classroom practice. Another teacher at School B held that 'indirectly we always focus on values. What are the important values they have to instil in their daily life?' Related to this point, teachers saw the decline of traditional epistemologies from the curriculum as being attributed to the higher prestige and sense of legitimacy associated with the modern curriculum. Demonstrating that the implicit and natural practice of inculcating traditional knowledges and ways of knowing was long-held, some teachers maintained that they drew on aspects

of tradition for the purpose of enriching students' learning prior to the directives associated with GNH. A teacher at School C explained that '[t]he government is trying so hard with the GNH, but it's already there. [...] Subtly, we are able to convey it to the children'.

Karma Kinle, the principal at School D who also served as a teacher, shared this view. For example, Karma Kinle, explained the pedagogic strategies he employed, as did the teachers at his school. Karma Kinle was a particularly strong proponent of the inculcation of traditional knowledges and culture in line with recent policy directives. In contrast to the other school leaders, Karma Kinle spoke with noticeable enthusiasm about his school's efforts to conserve and sustain the continuity of traditional epistemologies and use these as resources to mediate the tension experienced by students. Furthermore, Karma Kinle maintained that the possibility of tension between traditional and modern epistemologies is slight because GNH is deeply embedded both socially and through teachers' classroom practice. He stated:

everyone in Bhutan, even in schools and the government, everyone in the country, would emphasize more on the culture. The GNH, one of the pillars is to preserve the culture and traditions. So we always tell [the students] 'yes the technology is important, but we should never forget the culture'. For example, in the assemblies...I announce...we talk about democracy. We talk about freedom of speech. I tell them, this is the modern way of living, but we should also not forget our own culture.

Karma Kinle explained that invoking traditional ideas that support modern lessons generated a stronger connection in the minds of students than strictly following the syllabus. As Kalantzis and Cope (2002) maintain, a 'multiliterate' pedagogic approach

draws on alternative representational resources and may be employed to generate connections between the curriculum and the local context. Such pedagogy requires normative practice to be flexible and a willingness to facilitate learning that incorporates different knowledges and understandings of the world (Le Fanu, 2013). What deserves attention here is the considerable skill required on behalf of teachers. Teachers must also have intimate knowledge of tradition, which is indeed complex (see Section 2.1), and must recognize points of continuity and discontinuity between the curriculum and traditional epistemologies. Additionally, such an approach would require that teachers build time into their lesson plans to engage in cultural discussion. Significantly, Karma Kinle maintained that the teachers at his school naturally and implicitly engaged in such pedagogic practices long before the imperative to align education with the GNH policy. Many of the teacher respondents supported this claim.

Elaborating further, Karma Kinle stated that ‘we always, in anything we teach, we always talk about the culture’. He further explained that ‘the values and culture are built in the people themselves’. In his voice:

What I see, if you look deeply, there is a culture there. We can teach a lot of culture through these subjects. I sometimes teach history, but I teach values through History. I sometimes teach Art through values. So, the culture is already there, you don’t have to tell the teachers to teach it.

For example, he described how science teachers at his school leverage traditional knowledges and worldviews to support lessons in the modern curriculum. He illustrated this with the following example:

Water, we call it holy water. We always take water, every morning and offer it to the gods. We have seven cups. If you pollute the water from the source, this water will go down [stream] and then this dirty water...another settlement will be using it for the gods, as holy water. So, we try to make people aware. The culture comes here. So, people will believe, it will touch their heart.

Here, a view similar to Agrawal's (1999, 2000) is observed. That is, there is no 'divide' between traditional and modern knowledges and ways of viewing the world. Rather, both are viewed as valuable resources to support students' learning.

The findings of this study showed that for many teachers who accommodated traditional and modern epistemologies, this approach was a central part of their pedagogic 'repertoires of practice' (Gutiérrez & Rogoff, 2003) – thus, evidencing that traditional ideas remain deeply embedded in ways of life. For example, Tashi Tshomo, introduced earlier, stressed that it is an innate part of her pedagogy to draw upon spiritual rationales which she considered part of Bhutan's traditional ways of understanding and interacting with the natural environment. She maintained that, 'in a way, it has always been there with us. It helps with the protection of the environment because we have that belief that gods and goddesses reside in the forest'. Reflecting this theme, at School C, Ugyen Lhendup, a seasoned biology teacher and vice principal with over two decades of experience as an educator, also introduced earlier, explained that he implicitly draws on traditional worldviews about the functioning of the environment in his class. In his voice:

if there is a big tree, there is the belief that a deity will be there. If there is a big rock or a pond or a small lake, people have a strong belief that there is a deity guarding that and we should not disturb it. [...] Because of such beliefs, the tree is living there, the source of the water is protected, respect for nature. Because of such beliefs, the big rock is taken care of. These beliefs are there. I just try to relate all this [to the lessons]. Our beliefs, cultures, are meshed with the environmental factors.

Embodying aspects of traditional culture and acting as a role model for students

Some teachers asserted that traditional epistemologies should be embodied and demonstrated through their actions, behaviour, and by their style of dress for the purpose of ensuring that tradition is carried forward – not only in the classroom but also in their everyday life. In Thimphu's close-knit society, many teachers pointed out that they sometimes interact with their students outside of the school setting. To this end, they were cognizant of the effect their own behaviour could have on their students and, therefore, strictly adhered to the code of conduct set out in driglam namzha. Tshewang Rabgay, a math teacher at School F, explained that he inculcates these values in each lesson despite the disconnection with his texts. He tries his best to be a role model through the way he speaks, acts, dresses, and the level of respect he shows to others. Similarly, Chimi Phuntsho, a history teacher at School A, held that:

what I am in fact is a culture only. What I expect, what I portray, how I carry myself is the culture. [...] So, what you do, how you do in front of them, is in fact a big influence over them. More than parents, more than what time they spend with their children, they spend with us. In a way, how a teacher presents herself, the way you guide them, sometimes in a situation you have to make a lot of decisions. Why you take that particular decision really matters. That is, in a way, we are like, kind of handing down our culture as an example and as a role model.

Teachers like Chimi Phuntsho placed particular emphasis on the *accommodation* and inculcation of traditional values during – and outside of – their lessons. This was considered particularly important given the vast social changes associated with modernisation. For these teachers, the principles of driglam namzha were equated with Bhutanese tradition and the country's 'distinct national identity' (Whitecross, 2002). As shown in Chapter Two, traditional values are guided by respect for the king, government and the nation, as well as a sense of loyalty and the notion of karma (Crins, 2008: 81). Some teachers asserted that *accommodating* traditional values was critical in order to foster 'good,' 'productive' citizens and enable their students to feel pride about Bhutan's cultural heritage. Consider the narrative of Tashi Oms at School D:

We do want to make our young students be proud of our culture, promote our culture, create our own unique identity. So, and culture in the sense we don't focus just on the physical part of it or how the people, the dressing part, but culturally, spiritually, how can we learn to live our life.

Having discussed the common pedagogic practice of *accommodating* different ways of knowing, to reiterate, where different knowledges were presented side-by-side and on equal footing, the next section will turn to the theme of *inviting discussion* as an approach to mediate the tensions related to tradition and modernisation.

7.2.2 Inviting discussion

While the previous section described the pedagogic practice of deliberately drawing on traditional and modern epistemologies and presenting these on equal footing – an approach which hinged on teachers putting forward their own views about tradition –

some teachers asserted that when tensions arise, they *invite discussion* amongst their students while withholding their own perspectives. Teachers *invited discussion* for the purpose of enabling their students to ‘come up’ with their own opinions and critically discuss traditional and modern ideas rather than treating different ways of knowing as information to be learned and memorized. From this standpoint, students are enabled to navigate among contrasting worldviews and different ‘situated’ knowledges (Lave & Wenger, 1991).

Interestingly, even teachers who held strongly traditional Bhutanese worldviews, such as Dechen Tsomo, a civics and history teacher at School E, reported, ‘I don’t really say, this is my belief. If I say that, they won’t be able to make their own choice. I just leave them. It depends on how they take these ideas’. Similarly, Tashi Oms, an English and geography teacher at School D, stressed that she holds a traditional Bhutanese worldview but does not reveal her own views during her classes because ‘[i]t’s a person’s individual perspective how they look at it’. Similar to the other teachers described later in this section, her decision to *invite discussion* was underpinned by her conviction that students should discover interconnections and conflicts between contrasting knowledges on their own. These teachers stressed that putting forward their views would sway their students’ thinking. As was shown in Chapter Two, teachers in the modern system of education had been unquestioned figures of authority since the 1960s (Dyenka, 1999) until the recent change in their roles to facilitators of learning (Ministry of Education, 2009). Thus, these teachers, while traditional in their own beliefs, supported new education reforms aimed at supporting a balance of different knowledges.

However, teachers stressed that in order to *invite discussion*, they must contend with tendency of many of their students to keep their own opinions to themselves. That is, embedded in the etiquette of driglam namzha is a deeply embedded respect for authority that carries over into the classroom (Wangchuck et al., 1999). This inhibited some students from engaging in class discussions. Bindesh, an expatriate civics and history teacher at School B, who claimed to wholeheartedly support traditional Bhutanese culture, attributed the passive attitudes and behaviour to his students being carriers of a 'monarchical gene'. Bindesh's explained that 'monarchy is existing at the grass roots level, to be honest. Because monarchy existed here the last 100 years, it is very difficult to pull that out. That is why in their culture, the behaviour, the respect, everything, the full 100% opinion is not there'. He described the tendency of his students to look down and avert their eyes from authority. Bindesh and other teachers, therefore, asserted that they make rigorous efforts to open up class discussions. Critical thinking was considered by teachers here to be duly important given the transition to democracy in 2008. The ability to discuss conflicting ideas was considered important both in order to understand and navigate among traditional and modern epistemologies as well as to engage in modern democratic life. Bindesh stressed that it is particularly important that teachers do not 'spoon-feed' to students their own beliefs. That is, teachers should not assume an authoritative role and put forth their own beliefs as facts that should be memorised. Bindesh, therefore, *invited discussion* for the purpose of enabling his students to form their own beliefs.

Two English teachers at School F exemplified a view maintained by several others – that the curriculum itself incites *discussion* amongst students. These teachers, therefore, do not deliberately *invite discussion*. Rather, they enable students to question contrasting ways of knowing. That is, because the curriculum, from the perspectives of some teachers, present Western knowledges that contrasts with traditional ways of knowing, students often question ideas and examples in their textbooks. Teachers need only to allow their students to sustain *discussion* when points of tension emerge. That is, for some teachers, the tensions between traditional epistemologies and the modern Western texts used in class are duly mediated: first, through a curriculum which stimulates *discussion* and; second, by teachers' support of *discussion*. Teachers who employed this strategy enabled their students to make connections between traditional and modern epistemologies. This approach was considered to mediate the evident tensions. This was exemplified by Deki Choden, a history and English teacher at School F, who drew attention to the range of foreign texts used in her class, which for some teachers are a source of tensions, and maintained that these texts often stimulate dialogue amongst her students. Regarding the texts used in her class, she stated:

reading such novels makes them think twice and makes them love their culture. It makes them realize the importance of preserving their own culture and tradition. When it's taught in the assembly, they don't listen and they don't really feel the importance of preserving the tradition and culture, but through lessons, when they get to see it, when they get to read it themselves, they get a stronger understanding. Many of the values we are able to explore through the lessons

Similarly, Tshoeyang Tshodhen, an English teacher and Thimphu native at School F, introduced earlier, purported that the new child-centred orientation of the curriculum enables teachers to turn their attention toward students' worldviews and allow critical debates. Tshoeyang Tshodhen held that while she *invites discussion* amongst her class, the curriculum itself encourages students to bring their own ideas to the fore. She proffered that:

Some views and some themes do contrast with our culture [...] in all the chapters that are there and all the topics, there are cultural contrasts, but children...they are given an opportunity to refute or either to accept or either to make some kind of judgment. [...] they contrast, they explore, they can see which one is better. The things that is there in our culture or the things that are presented in other countries culture

Tshoeyang Tshodhen also provided the following example:

The novels that are selected, you might have heard of 'The Giver'. Class 9, we have a novel by a Bhutanese author. Class 10 we have a novel by a foreign author. Both of them talks about values, feelings, passions. That is why I feel that the new curriculum does suit our traditional beliefs and values that are there. The poems that are there are chosen with themes that are related with our own country, our own values. Whoever has framed the curriculum has done a good justice. The children can relate to the situation and the theme that is there. They can understand, they can enjoy, they can bring it back to our own culture. I think the curriculum developers have done a good job by selecting the right and appropriate topics for the class 10's.

From Deki Choden's and Tshoeyang Tshodhen's standpoints, the foreign texts used in their courses combined with the practice of critical thinking enables students to discern points of commonality and conflict among traditional and modern epistemologies.

Furthermore, their students were not only able to mediate extant tensions but they also held that students developed a deeper appreciation of their own culture as a result. What emerged here were pedagogies that resonated closely with the narratives of some of the political and policy makers and education leaders who saw the modern curriculum as inclusive of the latest modern material brought in from abroad and – when delivered by a skilled teacher – both traditional and modern epistemologies co-exist and support students learning.

Having examined the pedagogic strategies that enabled traditional and modern epistemologies to co-exist, the following two main sections will turn to contrasting pedagogic strategies that constrained particular knowledges and worldviews.

7.3 Pedagogic strategies that constrain particular epistemologies

The following two sub-sections will describe a prominent theme that emerged from the interviews with and observations of some of the teacher participants – that traditional epistemologies should be constrained in the classroom. These pedagogies are organized here into two main approaches: 1) traditional knowledges and worldviews – or particular aspects – were *subordinated* and, 2) particular epistemologies were *avoided* or *dismissed*. Generally, and as was described theoretically in Chapter Three, the devaluation of traditional epistemologies emerged when teachers held the view that knowledges and worldviews developed outside of formal schooling were *subordinate* to what was taught in schools (see also Bates et al., 2009). Following in this line of reasoning, international, exogenous ideas were considered by some teachers to hold greater currency than

traditional epistemologies (see also Kidman et al., 2013). These perspectives will be discussed in further detail below.

7.3.1 Subordinating

Many teachers reported that Bhutanese traditional knowledges and ways of understanding the world – or particular aspects of these – should be ‘diluted,’ ‘left behind,’ or excluded from the modern curriculum. Similarly, Shizha (2007: 302) has noted that when schooling in non-Western countries is ‘situated in Western cultural definitions,’ traditional epistemologies become marginalized and, consequently, are perceived as ‘irrational and illogical’. As Alison (2009) also found, in Thimphu and Paro’s relatively modern lifestyles, traditional mentalities are considered unsuitable and at odds with modern surroundings. Teachers of this view maintained that when tensions emerged in class between traditional and modern knowledges and worldviews, they legitimated modern epistemologies while fostering condescending attitudes toward those considered traditional. For these teachers, traditional epistemologies were presented as *subordinate*. The findings showed that teachers from across a range of curriculum subjects employed this approach in two main ways: 1) some teachers always presented traditional epistemologies as *subordinate*, and 2) others did so selectively. These approaches will be described in turn below.

First, there were many teachers in this study who invariably *subordinated* traditional knowledges and views of the world when they emerged in class. This approach was rendered in high relief in science subjects, this theme was illustrated by Jigme Wangmo, a biology teacher from a village in Trashiyangtse, recently posted at School A. Jigme

Wangmo stressed that in science, '[t]here is always a contradiction. In science, we teach something and in their culture there is something else'. For example, Jigme Wangmo referred to the common local medical practice of sucking out 'poisoned' blood as a means of curing illness, which students bring up during lessons related to modern ideas about medicine. She explained, 'a traditional method is to take a horn of cow or goat. The tip will be cut and the bottom will be cut round and smooth. Over the cut they will place that and they will suck it out. [...] They say that, now we have taken out poison so you will be alright'. When similar traditional ideas arise in class, Jigme Wangmo stated that '[a]s a teacher, I explain that scientifically, biologically [...] there is [...] no sense in it'.

This view resonated with several other respondents. At School F, Chencho Kuenden, the vice principal and biology teacher, asserted that she held respect for traditional epistemologies – particularly, traditional ideas related to Buddhism. However, she maintained that 'on one hand we have the belief; on the other hand, we have the universal truth'. For example, Chencho Kuenden pointed out that Buddhist beliefs about karma and rebirth contrast with information in school texts on abortion. She recognized that her students come from families that have strong traditional beliefs. However, ultimately – and despite her reverence for traditional culture and the traditional worldviews of her students – Chencho Kuenden reported that she 'goes by the textbook'. For Chencho Kuenden, traditional epistemologies do not merit inclusion in the curriculum due to their subordinate position when compared with modern ways of knowing. What emerged here was an 'oxymodern' relationship (Knauff, 2002) where aspects of tradition were considered in ways that clearly contradict. Some teachers acknowledged and suggested a

respect of tradition – some even maintained that they held traditional worldviews – and concomitantly considered the modern curriculum as comprised of epistemologies that are ‘correct’ or more ‘legitimate’. Exemplifying the idea that external information holds greater currency in contemporary Bhutan, a physics teacher pointed out that when students’ traditional ideas present discontinuities with the texts, he refers his students to the internet to determine which point of view is ‘correct’.

Namkha Lhamo, a history and geography teacher in her 8th year of service at School C, maintained that most of her students hold modern worldviews and accordingly, minimal tensions emerge during her classes. However, when traditional views do emerge, Namkha Lhamo reportedly casts them in a negative light. She continued to explain that she is not religious and therefore does not support the ‘traditional myths’ in the history texts. She stated that history books in particular contain ‘so many stories, short stories. There is no evidence. Where there is no evidence...that, I cannot accept’. For example, she stated:

Guru Rinpoche, tantric master, when he left Bhutan, I believe he has hidden a treasure under the water and inside the rock and cave. If you are lucky enough, you will see those rock as a temple, a beautiful temple. Then you will see a way, a clear way, and you can open it and find plenty of treasure. He has hidden in many parts of Bhutan. That, I cannot accept.

The stance taken by the respondents in this section positions traditional and modern epistemologies in an oppositional and incompatible relationship. From this perspective, traditional epistemologies cannot be *accommodated* in the classroom and are treated as *subordinate*.

Second, there were other teachers who presented only particular aspects of traditional epistemologies as *subordinate*. Classroom observations of Vinod, an expatriate Biology teacher at School B, revealed a contradictory stance toward tradition that manifested in aspects of tradition being presented as *subordinate*. Vinod thoroughly decorated his classroom with posters displaying Bhutanese traditional values. During observation of a class on reproductive health, he discussed Bhutan's 'traditional knowledge and culture' and the social changes which have contributed to an increase in HIV/AIDS. However, following a discussion of both traditional and modern perspectives, he drew attention to the aspects of the culture which he feels should not be carried forward in modern Bhutan. As a Hindu, he described how his own personal beliefs regarding monogamy and marriage contrast with the traditional practice of polygamy and polyandry. He made clear the *subordinate* status of this practice. Vinod presented his own view as the 'correct' or 'universally valued' view of marriage and *subordinated* the traditional practice. In his voice:

they have their own culture and tradition. Here, sometimes I can say that polyandry and polygamy is there. A male can marry with many females, isn't it? A female can marry with many males. Polygamy and polyandry. It comes and [...] I always tell them, I am totally against it. [...] I always tell them, this might be your culture, but in other culture they have to find a girlfriend or boyfriend.

Teachers commonly referred to traditional ideas about health and biology as aspects that should be left out of the curriculum. In Section 7.1 Ugyen Lhendup described and was observed creatively drawing on traditional epistemologies to bridge the discontinuities experienced by his students. During an interview session, he asserted, 'we need to keep

our traditions. We need to preserve our culture’. Ugyen Lhendup supported the notion that traditional and modern ideas should be *accommodated* in each lesson. However, similar to participants in this study across the levels of the education sector, he stressed that some aspects of tradition are not suitable for inclusion in his lessons. Ugyen held that ‘[t]here are certain things in our beliefs that may not be so good. We should gradually let them dilute’. Representing and illustrating this perspective, two teachers at School F cited the traditional belief that ‘[m]enstruation is looked down on as defilement’ (Kuenga Dolkar) and as a result women are seen as ‘not as clean as the male gender’ (Sonam Pelzom). Sonam Pelzom reported that women are not allowed to enter Buddhist monasteries during menstruation. Furthermore, Kuenga Dolkar pointed out this belief is deeply embedded. He stated, ‘if you sleep with your wife or girlfriend during menstruation, you will be defiled. It’s cultural. The next day, if you have a venture, you will not be successful’. This belief carried over into the school setting. Kuenga Dolkar stressed, ‘[i]n class, you shouldn’t sit next to a girl who is menstruating’.

Regarding the relevance of this tradition in contemporary Bhutan, Kuenga Dolkar proffered, ‘I strongly believe that if your culture is something which is not healthy, then leave it, simply dump it and make a new culture which is healthy and allows you to thrive’. Both Kuenga Dolkar and Sonam Pelzom asserted that they presented this traditional view as *subordinate* and sought to counter it by emphasising the information in health texts. Consistent with the views of many other teachers in this study, aspects of tradition were often considered unsuitable in contemporary Bhutan. However, the particular aspects of tradition that should be ‘left behind’ were based on teachers own

beliefs and attitudes toward traditional epistemologies. The readers' attention is drawn to the finding that different teachers held different ideas about the aspects of tradition that are no longer relevant and therefore considered *subordinate* to knowledges in the curriculum of modern schooling.

Similarly, Chen Chen, a geography teacher and head of an agricultural project introduced earlier in section 7.2.1, demonstrated pedagogies that both *accommodated* and *subordinated* aspects of 'tradition'. Chen Chen attempted to sustain traditional practices by providing students with an experiential learning project in traditional agricultural methods. Early in the interview he enthusiastically described the success of this project and his interest in 'inspiring' his students to become 'educated farmers'. Further, he recognized the critical importance of local farmers owing to 50% of the food consumed in Bhutan being imported from other countries. However, he later pointed out that should his students not succeed in attaining a white-collar job, farming skills would provide a vocation they could fall back on, but only if they are 'unsuccessful' in attaining other employment. From this standpoint, farming is positioned and presented to students as *subordinate*, less desirable, and a last resort – an attitude that is deeply embedded even among teachers who advocate for a culturally relevant curriculum.

While farming skills hold currency in contemporary Bhutan such expertise is nevertheless considered *subordinate* to the abilities required for modern professional positions in the civil service or private sector. As Knauff (2002) also found, in traditional societies where modern ideas proliferate, modernity becomes 'acerbic' when tradition

becomes associated with a ‘second-classness’. Here, accepted ideas about ‘modern,’ desirable careers are caught in a contradictory, ‘oxymodern’ (Knauft, 2002), relationship with the reality of a largely agricultural job market. This dynamic is visible in teachers’ contradictory pedagogic responses to the tensions between traditional and modern epistemologies.

Despite the general consensus among teachers who *subordinate* that traditional epistemologies or certain aspects of tradition were inferior, it merits mentioning that a minority of the science teachers presented the modern ideas in the curriculum as *subordinate* to traditional Bhutanese medicine. These teachers held sceptical views of Western science and medicine and asserted their opinion during the delivery of their lessons. Additionally, some teachers maintained that when tensions between worldviews emerged in class, they explained that the traditional view is the ‘right’ one. Exemplifying the practice of subordinating modern ways of knowing, Kezang Wangdi drew attention to lessons on health where she explained to the class that illness is the result of ghosts attacking the body. Western medicine is not effective in such instances and she presented the traditional *rimdo* as the legitimate healing practice. Kezang Wangdi reported that similar tensions arise frequently in her classes. Further, she felt that science in general does not offer knowledges or ways of understanding the world that are applicable to the Bhutanese cultural context. In her voice:

How come that lama is dying with an upright back and staying for years? There are examples, such as our 69th Je Khempho. When he passed away, it says internal decay will take place after 36 hours, but in his case, many doctors and many experts have come and looked at him and studied him and his internal organs were fine. His body lasted more than years and years. That really conflicts with science. Science doesn't believe in all these things but then it is there. There are many examples in Bhutan where Buddhist masters have died peacefully, singing with radiations from his body [and] rainbows forming.

For Kezang and a minority of teachers interviewed in this study, traditional ways of knowing or aspects of tradition were considered valued and more culturally relevant than the modern curriculum.

As this section demonstrated, aspects of traditional epistemologies or tradition as a whole becomes marginalized and presented as *subordinate* to the content of the modern curriculum. The next section will examine the pedagogic practice of *dismissing* or *avoiding* particular epistemologies.

7.3.2 Avoiding or dismissing

Some teachers described mediating tensions by uniformly or selectively *dismissing* or *avoiding* traditional epistemologies when they conflicted with the curriculum. That is, traditional knowledges and worldviews, or particular aspects of these, were not allowed into the classroom. Many of the teachers in this group shared the view that traditional epistemologies were *subordinate*. However, this approach was not always underpinned by a view of traditional knowledges and worldviews as 'less relevant,' 'backward,' 'stupid,' or 'useless'. Teachers reported *avoiding* or *dismissing* traditional epistemologies

for three main reasons: 1) an absence of time for veering from the designed curriculum, 2) the modern content of the curriculum was seen as more relevant, legitimate, and was considered more prestigious, and 3) others expressed confusion about their role in mediating the tension between traditional and modern epistemologies and therefore, *dismissed* traditional views that emerged in classes. Characterising the teachers practices described in this section was that tradition was not presented as *subordinate* – even if they considered it to be so – rather teachers *avoided* or *dismissed* it. As with the other pedagogic approaches identified by this study, *avoiding or dismissing* was used alone or in combination with the approaches outlined above.

First, many teachers stressed that they had no time to veer from the syllabus and, as a result, *avoided* discussing traditional ideas when they emerged in class. Two teachers, Raju Kerubandan and Chimi Phuntsho, exemplified this perspective. Raju Kerubandan, a math teacher and Indian national at School D, recognized the policy imperative to infuse traditional knowledges and values into each lesson. However, he reported:

We will not be having extra time. We take the syllabus and if you work according to the plan, it will be sufficient. So, we cannot divert our time to GNH...very rare. That's the problem. For me, it's like that. I don't know. I cannot even waste a single minute. That one minute I can spend in another way, like helping students.

As a result, he stuck strictly with the syllabus and *avoided* and *dismissed* traditional ways of knowing if expressed by students during his classes.

Chimi Phuntsho, a teacher at School A, also exemplified this perspective among the teacher participants. Chimi Phuntsho held that,

It's very, very taxing because we have so many children in the class. [...] it is very taxing and all. From the long list of syllabus they give us [...]. We can't help but rush and some of the children don't understand. There is no time for us to go back and help them. We have to turn a blind eye and go on and on. Sometimes it is very disheartening. Actually, when you come close to the end of the year and reflect, you don't feel happy about how you have been going on the last few months. You have to really rush because the syllabus is very lengthy. [...] I may be being negative, but it is the reality.

In other words, Chimi Phuntsho did not have time because of the lengthy syllabus to incorporate traditional knowledges and worldviews into her lesson plan or attempt to bridge traditional and modern epistemologies.

Other teachers held that pressure to prepare students for exams constrained their classroom practice and that left them with little time to veer from the curriculum. They stressed that they had no other option than to *avoid* or *dismiss* traditional epistemologies from their classroom practice. A science teacher at school D echoed this view and summarized the narratives of several other teachers. She held that she often avoided incorporating traditional understandings into her lessons and focused instead on exam preparation owing to concerns about students' academic performance. Many teachers reported that exam preparation was prioritized by school leadership and some parents. Teacher narratives revealed that many were pressured to resume the use of rote-style pedagogy in order to boost exam scores and eschewed a student centred approach that fostered critical engagement with different epistemologies. This teacher *dismissed*

traditional ideas despite her own reported interest in providing her students grounding in the traditional knowledges and culture unique to Bhutan, particularly because her own upbringing was framed by tradition. As Roder (2012) also found, the achievement of high test scores is becoming increasingly important owing to the perception that admittance to a university represents a pathway to a highly salaried career in the urban centre of Thimpu. In extension of Roder's study, and in the absence of previous studies on the voices of teachers in Bhutan, this finding illuminates a key aspect of the teachers' experiences and provides one explanation as to why teachers, who reportedly valued tradition, adhered strictly with the syllabus and focused their classroom practice on the modern content of the curriculum.

Similarly, a biology teacher also at School D, Galden Chopel, who was serving his first year as a teacher at the time of fieldwork, justified his pedagogic approach to *dismiss* traditional epistemologies by pointing out that GNH is not on the exam. Observations of Galden Chopel's class revealed a top-down approach to the enactment of the curriculum and a reliance on closed questions which denied students opportunities to express their own worldviews. The observation session also showed that affordances for inculcating Bhutanese traditional epistemologies were inhibited by practical issues such as oversubscribed classes and the pressures of ensuring that each student is prepared for exams. In other words, Galden Chopel's aversion to including traditional epistemologies into his lessons was attributed to exam pressures. Additionally, the students in his courses had varying levels of academic preparation. He pointed out that he often has to

backtrack and ‘teach the content of the lower classes’ in order to ensure that all of his students are able to understand the curriculum of the class 10 texts. In his voice:

Most of the time when we teach any science content to a student we hardly incorporate any culture because we don’t get the time because we have to focus on the understanding of the student, the content. So, that’s how the curriculum is, the science curriculum. That’s my experience.

Elaborating further, Galden Chophel explained:

Frankly, I don’t let the students tell stories in class. That is the reason why. I think they have, they will have because most of the students are brought up, they live in the locality, they don’t live in the town so they will have more views and more stories. [...] They can relate it also, but I haven’t given them the space to do that.

Interestingly, Galden Chophel acknowledged the traditional knowledges and worldviews of students and the potential tensions they might encounter. He also recognized the imperative of GNH to include traditional epistemologies into each lesson. As shown in Chapter 2, teachers are charged with recording each instance in class where they incorporate concepts related to the pillars of GNH, thereby increasing ‘students’ understanding of and regard for culture’ (Policy and Planning Division, 2012: 3-4). Some teachers consider this an imposition on their classroom practice and an additional and unnecessary task to add to their burgeoning load of teaching duties. However, as Le Grange (2012: 582) cautions, teachers’ avoidance of traditional epistemologies ‘risks destroying the framework through which the learner is likely to interpret concepts’. While Galden Chophel had initially agreed to several class observations, he emphasized

that further observations would yield no additional insights. He reportedly followed the practice of rote style teaching in all of his classes. In addition to experiencing a lack of time either owing to pressures to prepare students for exams or because of the lengthy syllabus, there were also teachers who *dismissed* or *avoided* traditional epistemologies owing to the view that these were no longer relevant.

Second, teachers from across a range of curriculum subjects reported that they did not see any reason to connect traditional epistemologies to their curriculum subjects. Further, they did not recognize traditional knowledges and ways of understanding the world as offering affordances for learning. For example, Chimi Phuntsho, a history teacher at School A, articulated disbelief in many of the stories in the texts used in her classes. She disagreed with these stories being presented as facts in textbooks. Similarly, many teachers of science subjects described how they do not hold the traditional beliefs of health, the environment, or views of the cosmos. Teachers reported there are certain aspects of the culture, which they feel may be no longer relevant or are of questionable value in modern life. As a strategy during such lessons, these teachers described how they omit aspects of traditional epistemologies. Such pedagogy results in an atomistic approach to different epistemologies, one that positions traditional and modern in opposition.

Chimi Phuntsho explained that some traditional stories in history texts are inaccurate and conflict with her own beliefs. Therefore, she *dismissed* or *avoided* these stories in favour of legitimate course content. In her voice:

In History, we have so many things like that. A monastery was built because someone wanted to subdue a demon. [...] When you talk about Paro Taktsang, how the guru came on a flying tigress. Whether you actually believe it or not, it's a big question mark. Now, these days, when you really think deeper, I have big questions about it - flying tigress and all. These things have been passed down word of mouth. There is no written document. [...] I focus on what is the fact and then others, I leave it out. [...] the thing is, these things are not true.

Other teachers *dismissed* traditional epistemologies for similar reasons. Sonam Thinley, a computer teacher at School E, maintained, '[a]s a computer teacher, I don't compare with our culture and tradition. I stick only with my subject'. Significantly, Sonam Thinley believed that a curriculum that included Bhutanese 'culture and tradition' would cause students to 'lag behind'. He felt that older ways of knowing were 'backward' and detrimental to advancing the overall development of the country. He further asserted that his students are interested in gaining technology skills and hold little or no interest in Bhutanese 'culture and tradition'. He stated, 'my students they live in village and believe in technology'. It merits mentioning, however, that Sonam Thinley highlighted that he did not hold a teaching qualification. As a recipient of a government scholarship, he was required to hold a position in public service. However, unable to pass the Royal Civil Service Exam, he explained that he had no other choice but to go into the teaching profession. As Roder's (2012: 145) study demonstrated, the teaching profession is generally held in low regard and often referred to as a 'last resort' or 'last option'. Ostensibly, Sonam's disdain for the teaching profession and lack of formal training and knowledge about teaching and learning may have contributed to his conviction that traditional epistemologies do not hold utility in contemporary Bhutan.

Third, at the same time, there were teachers who reported that they *dismissed* or *avoided* traditional epistemologies due to a general confusion about how these might be inculcated during their lessons. Choki Wangchuck, a biology teacher at School E, who studied in the U.S.A. and held that her experience abroad had made her more attuned to the divergences between the ‘Western-type’ curriculum and traditional thought. However, she explained, ‘I go strictly with the syllabus. So, the culture is, how, I don’t know exactly how I use it’. In other words, Choki Wangchuck did not know how to bridge traditional and modern epistemologies. Also exemplifying this view was Bindesh, an expatriate civics and history teacher at School B, who expressed reverence for Bhutanese traditional culture, yet did not fully understand how to implement traditional knowledges and views of the world in all of his lessons. He explained, ‘[i]n my opinion, it is a distant dream. How can we impart GNH, to be honest? How can we bring 100 percent GNH? It is actually a distant dream’. This confusion indicates a lack of understanding of policy directives which charge teachers with infusing traditional epistemologies alongside modern course content in order to generate a modernity that is uniquely Bhutanese. As scholars on curriculum theory such as Kelly (2009: 15) argue, the implementation of educational changes take hold ‘only when the teachers concerned are committed to them and especially, when they understand as well as accept, their underlying principles’ (see also Apple 1992; Guthrie 1986; Mitter 1987; Lewin 1985). However, in classes where learning materials have not yet been contextualized and teachers do not have thorough grounding in culturally relevant pedagogies, inculcating traditional epistemologies becomes onerous when set against the demands of the curriculum.

A sense of confusion was also reported by expatriate teachers, such as Arun Narayan, an Indian national and math teacher who had taught for 30 years at School D, who held that he does not know enough about Bhutanese traditional knowledges and ways of understanding the world to effectively include these in his classes. Another foreign teacher at School D also noted that as ‘expats, we are not that much attached or we have not seen that, what a national person can see’. Hence, these teachers conveyed uncertainty about how to inculcate traditional epistemologies. Furthermore, Arun Narayan suggested his ability to draw on traditional knowledges and worldviews is further constrained by the nascent status of GNH directives and a lack of thorough training to support teachers in infusing traditional elements into their lessons. He stated: ‘I have to learn first. After learning fully, I can talk. Better next year I think. I am learning from the friends only’.

The views of teachers presented in this section demonstrated that traditional epistemologies were *avoided or dismissed* if they appeared in curriculum materials or were brought up by students. Their reasons for *avoiding* or *dismissing* were varied. However, what was common to all of these teachers was a general lack of awareness of how different epistemologies could be employed in the classroom to offer affordances for learning.

7.5 Summary and reflections

This chapter has presented a complex picture of how teachers in Bhutan mediate the tensions related to tradition and educational modernisation. The findings showed that in

Bhutan, the implementation of curriculum policy related to conserving ‘culture and tradition’ as a tool to mitigate the negative effects of educational and national modernisation is not a simple, one-way process. This chapter evidenced that many teachers attempted to connect the curriculum to students’ own social experiences and worldviews when tensions between traditional and modern epistemologies emerged in line with policy. However, at the same time, there were also teachers who employed pedagogic approaches that overlooked the co-existing utility of traditional and modern knowledges and worldviews. Also evidenced was the finding that teachers used a combination of pedagogies that were enabling (i.e. *accommodating* and *inviting discussion*) and constraining (i.e. *subordinating*, *dismissing*). Deemed of significance to this thesis, this chapter established that the curriculum is enacted, at times, in conflicting and contradictory ways. As the findings presented here reveal, the interpretation of the curriculum is strongly influenced by teachers’ attitudes, beliefs, and values.

Some teachers felt strongly that traditional epistemologies should be replaced with modern ideas. However, other teachers held that Bhutanese tradition is variously inculcated during lessons, therefore promoting the country’s cultural heritage and serving the national imperative of GNH. Interestingly, there were expatriate teachers who held stronger reverence for Bhutanese ‘tradition’ than some native teachers. However, even when teachers did claim traditional worldviews and espoused support for carrying forward traditional culture, they sometimes did so selectively. Aligning with perspectives of other stakeholders in this study, certain aspects of tradition were deemed ‘backwards’ and ‘useless’. This attitude carried over into their teaching practice when they chose to

subordinate or *dismiss* aspects of traditional epistemologies, even when brought to the fore by their students.

The findings presented here indicated that in order to address the challenges faced by teachers, scholars and policymakers might consider more broadly the social and cultural aspects that shape their ways of thinking and acting. Furthermore, given the policy directive to include traditional knowledges and culture, concern should be paid to expatriate teachers who might require training tailored to their backgrounds. While some of the expatriate teachers in this study did indeed inculcate traditional epistemologies, others were uncertain about how this should be done.

Against the backdrop of the findings presented on the tensions related to tradition and educational modernisation from perspectives from across three levels of Bhutan's educational sphere, the following chapter will analyse what these findings imply from a theoretical angle. This will be done by discussing the findings presented in Chapters Five, Six and Seven in relation to the theoretical literature that was reviewed earlier in the study.

Chapter Eight: Analysis of tensions in the discourse on the modernisation of education

8.1 Introduction to the chapter

The previous three chapters established a set of tensions associated with tradition and the modernisation of education in Bhutan at a pivotal point in the newly democratic and increasingly internationally engaged nation's history when education stakeholders are charged with balancing change and the continuity of tradition (Ministry of Education, 2009, 2012). The aim of this chapter is to explore the evident tensions – and the interplay between policy and practice – through an analysis of the convergences and divergences of the perspectives across the three participant groups in relationship with the key theoretical perspectives (Chapter Three). The strands of theory were drawn from literature on education and modernisation, indigenous knowledge theories, and sociocultural perspectives. To reiterate, the tensions that emerged were similar to those found by Semali and Stambach (1997: 6): 'contrasting epistemologies produced within sociocultural, agroecological, and competing political and economic settings'. Summarized in the table below are the tensions identified in the participants' narratives.

Table 5: Conceptual representation of tensions in Bhutan's path toward modernisation

Tensions	←-----→	
Educational	Monastic education and informal learning	Western educational paradigm
Moral	<i>Driglam namzha's</i> moral code of conduct, Buddhist values	Democratic, liberal values
Cultural	Traditional ways of life, knowledges, worldviews	Modern ways of life, knowledges, worldviews
Global	Relative cultural and geographic isolationism	International connectivity
Economic	Subsistence agro-pastoral vocations	Modern white-collar work
Political	Hereditary monarchy	Democracy

The dichotomous pairings that arose during analysis were not considered to be linear movements away from tradition. Rather, what Table 5 draws attention to is that traditional and modern mores simultaneously co-existed and engendered tensions. Policy makers and politicians, education leaders, and teachers viewed and managed the tensions variously. Their responses and strategies were shaped, in part, by their different locations in the educational sphere.

The theoretical literature (see Chapter Three) explored in this thesis facilitated an analytic synthesis across the experiences of all three of the cohorts. From this, key themes emerged that bring focus to the complexity of the evident tensions which were more numerous than has been suggested by previous studies on Bhutan (Alison, 2009; Childs

et al., 2012; Phuntsho, 2000; Ueda, 2001; Wangyal, 2006; Whitecross, 2002; Roder, 2012). Thus, in light of the literature (see Chapters Two and Three) and the empirical findings (see Chapters Four, Five and Six), the analysis presented here will explore the different aspects of the tensions that emerged in the discourse on the modernisation of education. It will do so by examining four overarching themes that have not been identified by previous studies on Bhutan. The divergences and convergences with the theoretical literature, including studies in other countries, will also be explored.

First, the analysis revealed that the tensions identified by the participants can be traced to processes of modernisation in the 1960s (see Chapter Two) and persist despite education reforms aimed at bringing together the traditional and modern elements represented in Table 5. The first subsection teases out why these historically rooted tensions play an active role in contemporary societal debate. In continuing to examine the tensions, the second subsection uncovers the participants' conceptualisations of traditional and modern epistemologies. The participants' own nuanced understandings of the different knowledges and worldviews that interact in state education serve to highlight another reason why there are tensions in the discourse. Third, the empirical findings identify a trend of oscillation between support for and rejection of traditional and modern mores shown in Table 5. In this respect, the findings challenge conventional research on traditional or indigenous knowledges which attends to contrasts and continuities between different epistemologies (e.g. Agrawal: 1999, 2000; Bates et al., 2009) but does not detect or address highly pronounced vacillations similar to those that emerged amongst the

narratives in the present study. Against the backdrop of the preceding analysis, the last subsection examines the different means employed to mediate the tensions.

8.2 Critical analysis of the key themes

8.2.1 Tensions engendered by educational and national modernisation

The analysis of the findings show that the political, global, economic, moral, cultural, and educational changes (see Table 5) brought about by national modernisation were inseparable from the discourse (see Chapters Five, Six and Seven). This was because the national system of education was influenced by cultural, political, economic and moral shifts and in turn these shifts were influenced by education. That is, the evident tensions stem from the implementation of a modern system of education but are also shaped by the participants' experiences in a rapidly changing society. In light of Appadurai's (1996: 44) concept of 'cultural flux' (Appadurai, 1996: 44), the participants navigated traditional and modern mores in a context where ways of life and ways of knowing were rapidly changing.

Armer and Youtz (1971: 605), in their study on Western education in Africa, also demonstrated that cultural changes associated with national modernisation impinge on the education sector and contribute to its 'modernising' influence on students (see Chapters Five and Six). Armer and Youtz (1971: 605) add:

even if value-orientation differences are found between more and less educated individuals, the differences may not be due to educational effects but, rather, [...] to the influence of alternative modernizing forces which may be correlated with education, for example, urban experience, mass media exposure...

According to the analysis of the narratives, the current economic transition ‘from being only agro based to one that is also service and industry based’ (Ministry of Education, 2009: 63), the transition away from the power of the monarchy toward a new sense of individual (rather than collective) decision making associated with democracy, and *driglam namzha* being displaced in the curriculum by market-oriented content (see Section 7.2.1) are examples of the loss of traditional culture (see Sections 5.2 and 6.2). For many of the participants in this study, these vicissitudes were considered sources of tension that education alone cannot resolve.

The changes associated with educational and national modernisation are not unique to Bhutan. There are studies on education and modernisation that examine the political, economic and cultural shifts associated with processes of modernisation (e.g. Fägerlind & Saha, 1989; Gusfield, 1967; Inkeles, 1971; Shipman, 1971) as does research on modernisation in the social science literature (e.g. Inglehart & Welzel, 2005; Abdollahian et al., 2012). These studies acknowledge both the loss and persistence of traditional culture in processes of modernisation (see Section 3.2). However, in Bhutan, the evident tensions are distinct owing to the country’s history of promoting its culture and traditions as well as its relatively geographically isolated setting, which enabled traditional knowledges, worldviews, and ways of life to exist with limited exogenous influences. Scholarship on Bhutan (see Chapter Two) has demonstrated that, prior to modernisation, the ways of life remained largely unchanged since the time of the Zhabdrung (Aris, 1979; Aris & Hutt, 1994; Crins, 2008; Rutland, 1999; Ueda, 2003; White, 1909). Bhutan’s robust and long-held traditional knowledge base contrasts starkly with the epistemologies

introduced by the national system of modern education (see Section 2.3). The findings of this study demonstrate that despite Bhutan's modernisation paradigm which sought to bring together traditional and modern mores since the implementation of planned modernisation in the 1960s, there are tensions in the narratives from across the three participant groups (see Sections 5.3 and 6.2).

There are studies on other societies that have experienced similar tensions associated with the economic aspect of educational and national modernisation. Bates et al.'s (2009: 6) volume examines how the introduction of 'market economies through colonisation and modernisation' in communities in Venezuela, Botswana, Thailand, and Peru demonstrated similar tensions to those identified by this research. For Bates et al. (2009) tensions between modernisation and the imperative to conserve and promote traditional epistemologies pose an irreducible dilemma because '[w]hile formal education promises to open pathways to the material benefits of the Western world, at the same time it tends to be destructive to indigenous knowledge and worldviews' (Bates & Nakashima, 2009: 6). This paradox was deeply felt by all of the participants and exemplified by the politicians and policy makers who advanced modernisation through their official positions and, at the same time, bemoaned the changes brought about by their work.

Teachers encountered the social changes initiated at the political and policy level in their classrooms. Many teachers held that their students' prefer modern knowledges, lifestyles, and worldviews. Modern preferences were described as being most apparent in students' ideas about desirable lifestyles and careers, i.e. white-collar jobs in the civil service with

salaries that could support a ‘comfortable’ life in Thimphu (see Section 6.2). However, the job market is still largely agricultural (see Section 2.3). Resonating with the assertion of Portes (1973: 260), national modernisation, of which modern education is a part, exposes people to ‘lifestyles that cannot be attained and training [...] in skills that cannot be implemented’. The economy, in a state of flux, has not yet fully transitioned away from being agriculturally based. However, in order to support economic growth in the future, the curriculum aims to create ‘an efficient labour pool with the appropriate skill set to meet the demands of industrial and service sectors (Ministry of Education, 2009: 63). At the moment, the curriculum’s attempts to serve the traditional and modern ideologies that pose competing demands are yet to be fully realized.

This situation resonates with literature on modernisation (see Section 3.2) and is visible in many other countries that have modernised or are modernising. For instance, Avalos’ (1993: 278) research on Papua New Guinea provides an example of an education system aiming to balance the needs of the ‘agricultural majority’ and the utility of a ‘modern, ‘Western’ type of education’ which is also deemed of importance toward developing in young people the skills and knowledges necessary to carry forward a modern agenda. In Bhutan, as in Papua New Guinea, this tension remains unresolved owing to uneven economic growth and the urban migration of youth in search of unavailable white-collar work. This view was most commonly held by political and policy level participants (see Section 5.7) and teachers (see Section 6.2) but was less prevalent among the education leaders who felt their work successfully addressed the evident tensions (see Section 6.3).

Many participants from across the three groups maintained that while they valued Bhutanese traditional culture and supported the pillar of GNH to carry forward the country's heritage, they, at the same time, considered the national system of modern education to be inhibiting the continuity of traditional epistemologies (see Sections 5.3 and 6.2). Madsen and Carney's (2011: 120) study on modernisation and Western schooling in Nepal found that '[t]he school itself must accommodate these desires and challenge these threats'. That is, the national system of education is a site where the evident tensions seen in Table 5 might be addressed. In Bhutan, attempts were made to bring different knowledges and worldviews together through the national curriculum (see Section 2.3.4). However, differing from Madsen and Carney's study in Nepal, Bhutan is attempting to reconcile the evident tensions at a time of rapid change and cultural flux when, ostensibly, society beyond the school setting is also attempting to manage the contrasting epistemologies seen in Table 5 (see Section 2.3.4).

However, while the evident tensions were not comprehensively resolved, this study found that the resolution of some of the traditional-modern conflicts is possible (see Section 7.2). With regards to traditional knowledges and ways of understanding the world, Ogunniyi (1988) in his study on the scientific and modern worldviews that interact in Western education in Africa resonates here (see also Section 3.3.2). Ogunniyi (1988) found that traditional world outlooks are not completely displaced by thorough exposure to modern ways of knowing. That is, traditional and modern epistemologies are not mutually exclusive and it is possible to hold both without internal tension. As Ogunniyi (1988: 6) points out 'each system serves some useful purpose but neither is adequate for

coping with all experiences’. We can apply this idea to the elements in Table 5 – each might hold utility and they do not necessarily exist in opposition. Indeed, they may agree with each other, e.g. Buddhism is seen to be compatible with modern science (see also section 3.3.1).

The findings also indicated that some tensions may be difficult to reconcile. Foreign inspired education initiatives were considered a source of ongoing and unresolved tension by many participants in this study (see Sections 6.2). Despite initiatives to localize the curriculum, the influx of education reforms from abroad hinder the achievement of a balance between traditional and modern epistemologies. Education reforms were imported by Bhutanese educationalists and foreign education specialists recruited by the Ministry of Education to support various initiatives in the education sector, from curriculum reforms to the implementation of a Western-style school counselling program in 2010. For example, in the case of the school counselling initiative, teachers maintained that counselling was not understood or accepted and, thus, it was difficult to engage students in counselling sessions and convince the school community of the utility of the programme (see Section 6.2.1). Across the three groups, there were tensions between foreign education innovations and how they are enacted in practice. Exogenous knowledges in the curriculum (e.g. Western and other foreign knowledges and examples in school texts) were considered sources of tension for teachers who faced difficulty making connections between these and the knowledges and worldviews of some students’ home communities (see Section 6.2).

Studies on the uncritical adoption or transfer of education policy and practices internationally (see Section 5.3) demonstrate that a mismatch between the local culture and the precepts of the curriculum are a common result (e.g. Crossley 2008; Guthrie 1986; Phillips, Ochs 2004; Spreen 2004, Steiner-Khamsi). Le Fanu's (2013: 145) study on the Western-based curriculum in Papua New Guinea also found that adopted educational policies and materials 'tended to involve the transmission of knowledge and skills unrelated to the everyday lives of the students'. As the findings of the present study also reveal, educational materials and methods (and the education system itself) brought in from abroad generate tension, particularly for teachers who consider Western education reforms to be misaligned with the imperative to carry forward traditional knowledges and culture. This finding also resonates with Carney et al. (2012: 367) who maintain that modern systems of education around the world are based on 'taken-for-granted ideas about what society is and how it works'. Analysing Ramirez and Boli (1987), Carney et al. (2012: 369) maintain, 'these myths reflect liberal Western understandings of the individual, progress, childhood socialization, and the role of the state'. Resonating with the findings (see Chapters Five, Six and Seven), the Western ideals embedded in educational materials and methods employed in schools in this study were considered at odds with those considered traditional (see Table 5). While the government has deliberately sought to avoid the perceived negative effects of modernisation (Royal Education Council, 2009; Gross National Happiness Commission, 2009), namely the loss of traditional Bhutanese culture, by infusing GNH into the national curriculum and cautiously selecting particular educational ideas from the West

rather than bringing in foreign reforms on a large scale (see Section 3.2), foreign inspired education reforms are still seen by many as deleterious to tradition.

The findings suggest that some of the tensions seen in Table 5 may intensify as connections across international borders expand and exogenous influences increase. At the moment, the global tensions are relatively new and have not had long to be played out or resolved (see Chapter Two). For example, the advent of ICTs into Bhutan in 2001 and its recent introduction into the school system during the Ninth Plan for Development (2002-2007) reflect the relatively recent attempts to expand the country's connections across its borders. While it is too early to draw conclusions about the global tensions based on the findings of this study, many of the participants maintained that outside influences are antagonistic to students' beliefs and confidence in the knowledges, ways of life and worldviews of their home and community culture. The modern exogenous world and its achievements are reportedly more attractive than the traditional to young people. The participants expected that this perceived trend might increase in the future. This is consistent with the vast scholarship on education and globalization (see Section 3.2) that examines the 'isomorphic' or 'homogenising' effect of global influences and its deleterious effects on traditional knowledges and culture.

In summary, the modernisation of education in Bhutan has undoubtedly contributed to the tensions represented in Table 5 which concomitantly co-existed and engendered tensions. In continuing to examine the evident tensions, the participants involved in this study are not considered to be victims of modernisation and its associated discontinuities

with traditional culture, but rather are seen as individuals ‘manoeuvring across spaces of incoherence and rupture’ (Madsen and Carney, 2010: 131). As such, understanding if and how the participants in this study manoeuvred or acted as mediators between different knowledges and worldviews requires further attention to their own understandings of them. Accordingly, the subsection below considers perceptions from across the three groups of the different epistemologies that interact in the national system of education.

8.2.2 Different epistemologies and different perceptions of tensions

The narratives of the participants evidenced that the balance between traditional and modern epistemologies called for by policy documents (Ministry of Education, 2012; Ura, 2004) is hindered by the lack of a ‘shared meaning’ of what tradition means and encompasses and consensus about how it should be inculcated in the classroom (Fullan, 2009). This study identified that there were: (a) diverse understandings of tradition and, (b) consistency among the narratives about modern knowledges and modern education. These themes will be analysed further below.

First, this study found that the ideas about tradition were shaped, in part, by the participants’ generations, i.e. (a) those who experienced life in ‘pre-modern’ Bhutan prior to or at the start of planned modernisation, and (b) those who grew up with a modern infrastructure already in place. These two groups will be examined in turn below.

Many of the interviewees who grew up prior to or at the start of the 1960s were those who were ‘educational pioneers’ (Roder, 2012) early in life. These participants were

currently engaged either in the education sector as (i) prominent policy makers or (ii) former policy makers now retired or holding political appointments in the National Council. They described their experiences growing up in villages without electricity or roads and where knowledges were transmitted orally and learning occurred experientially through engagement in agro-pastoral ways of life (see Section 4.1). Traditional knowledges included, but were not limited to; driglam namzha's moral codes of conduct, orally transmitted folktales, agricultural and environmental knowledge, the gSo-ba Rig-pa medicinal system, and fluency in local dialects (see Chapter Five).

The early life experiences of the older participants would have occurred in a traditional environment (Chapter Two). However, it serves to note that older individuals most commonly associated tradition with ways of life prevalent in the past but are still extant in Bhutan, mainly in remote regions such as Gasa and Samdrup Jongkhar but also in particular homes and communities throughout the country. Similar perspectives were also held by some senior curriculum planners and education leaders as well as experienced teachers. This suggests that conceptualisations of tradition were strongly shaped generationally but are also linked to the participants' current positions. This finding is not unexpected given the vast social changes that have occurred since the start of educational and national modernisation. Inglehart & Welzel (2005: 99) also found that in societies where 'younger generations are socialised under significantly different conditions from those that shapes earlier generations, the values of the entire society will gradually change through intergenerational replacement'. This situation, for Inglehart and Welzel (2005: 13), is correlated with socioeconomic development and the experience of

‘economic and physical security’ and is generally ‘found only in societies in which the younger generations have experienced substantially different formative conditions than those that shaped older generations’. Studies on traditional knowledges and worldviews (e.g. Lodhi & Milulecky, 2010; Thaman, 1998) also attest to the generational divide with regards to how traditional epistemologies are understood. In the present study, the older participants described early life experiences that were shaped by ways of life and ways of knowing much different from the younger participants who grew up with some modern infrastructure already in place (see Section 3.2).

Sangay Dendup and Kuenga Palden, two highly distinguished policy level participants, both observed that the generational schism is a significant source of tension and one of the reasons why the imperative of education policy to inculcate tradition is not always translated into practice. This seems to suggest that the traditional knowledges described by the actors at the policy level, are not only bodies of codified knowledge but they also comprise an experiential aspect that could only be understood by individuals who had grown up before or at the start of planned modernisation. While it is the intention of education policy for teaching to be inclusive of traditional knowledges or in Moll and Greenberg’s (1998) terms ‘funds of knowledge,’ Bhutan presents a distinctive context owing to its older generation having experienced a rapid and disjunctive shift in ways of knowing and ways of living. The older participants hold particular conceptualizations about tradition knowledges and worldviews which are firmly positioned at a particular point in time and associated with a certain way of life (see Section 4.2).

For the older generation, the modernisation of education was associated with a break from the past that started in the 1960s with the advent of national modernisation. This is a situation that resonates with modernisation theorists such as Fägerlind and Saha (1989) and Armer and Youtz (1971) who suggest the process of educational and national modernization engenders a degree of linear movement from pre-modern to modern ways of life. In other words, these scholars identify a direct correlation between modern schooling and individuals in a particular society holding modern values, attitudes, and beliefs (see Section 3.2). In this study, the senior level participants maintained that educational and national modernisation has engendered tension between changes associated with this process and cultural loss (see Table 5).

In extension of the literature on traditional and modern epistemologies (see Section 3.3.1), plural views of the world exist within the participants themselves. Educational and national modernisation was, in perception, both disjunctive and fluid. It is deemed of significance to this thesis, that there exists the perceived degradation of tradition, but at the same time, traditional knowledges, ways of life and views of the world are still extant among individuals, homes and communities. Concomitantly, but yet to be fully realized, the national system of education is undergoing reforms to bring traditional and modern elements into confluence.

The younger generation's narratives about traditional knowledges and worldviews

The younger generation and the expatriate teachers generally associated Bhutanese tradition with knowledges, ways of life, and worldviews tied to the early development of the country and were often connected with driglam namzha's distinctive codes of conduct

(see Section 2.2). It was also apparent that a sense of reverence for tradition permeated the narratives of many of the younger participants (see Section 7.2) in this study regardless of demographic characteristics including nationality (see Appendix III). Despite participants' reported respect for the 'wisdom of the past' their understandings of tradition were generally different from the older participants.

The younger group had not experienced life in Bhutan prior to the implementation of planned modernisation. The younger generation, who mainly comprised the teacher participants, grew up with some modern infrastructure already in place. Their education would have taken place in Bhutan and likely they would have attended secondary school outside their villages and in a more densely populated or urban area (see Section 2.3.4). Their educational and life experiences, thus, would have occurred in a relatively modern Bhutan as compared with the older participants. However, diverging from scholars such as Lodhi and Milulecky (2010) and Inglehart and Welzel (2005) who maintain that young people who grow up in modern society often hold different values and ways of viewing the world than older citizens who grew up in a traditional environment, the narratives revealed that while there was a general intergenerational cleavage, there were young participants who held traditional views of the world, particularly those who grew up in or live in households where traditional epistemologies are or were part of their life experiences. For example, teachers' narratives and classroom observations demonstrated that there were teachers and students who held strongly traditional views of the world (see also Section 7.2). For instance, some participants reportedly understood that a lunar eclipse meant that they should go 'night hunting,' i.e. this was a signal from nature that

they should practice traditional dating and seek a husband or wife. As has also been emphasised, health and well-being were understood by many participants as dependent upon positive interactions with local deities (see Section 7.2.1). However, traditional understandings did not preclude modern ways of viewing of the world. For example, with respect to the afore mentioned traditional ideas, participants might concomitantly embrace the relatively modern approach to dating and marriage and understand health and well-being from a scientific perspective. The narratives were far more complex and contradictory than suggested by the theoretical literature (see Section 3.3.1) or previous studies on Bhutan (see Section 2.3.3).

What was clear from the interviews and classroom observations was that the younger participants were less likely to reference the loss of traditional lifestyle and more often reported specific differences between modern lessons in the curriculum and traditional knowledges and worldviews (see Section 6.2.1). That is, many teachers pointed out instances in school textbooks where one explanation contradicted the other. Examples included knowledges (e.g. traditional medicinal practices, farming techniques and approaches) and views about how the world works (e.g. notion that nature has ‘ownership,’ non-linear concepts of time).

Significantly, teachers’ concepts of traditional knowledges did not always align with what is set out in policy text, i.e. the traditional knowledge described in GNH policy and documents on driglam namzha (Dampa & Tenzin, 1999). As was already discussed, Bhutan’s population is ethnically and linguistically diverse (see Section 2.6.1) and,

geographically secluded minority groups such as the Llhops have traditional knowledges and worldviews that differ from the dominant Northern Bhutanese Drukpa culture (Dorji, 2003; Sharma, 2005). A mosaic of knowledges and way of knowing were described and assessed by teachers to evade official descriptions of traditional forms (Ministry of Education, 2009). This finding highlights the complexity of infusing traditional knowledges into the curriculum owing to the absence of a uniform concept of tradition (see Section 2.1).

This is not to suggest that it is possible to define traditional knowledges. The World Bank's (1998: i) study on indigenous knowledges in Africa, Nepal and Columbia demonstrates that some knowledges are 'essentially tacit' and 'not easily codifiable'. We might expect that in Bhutan, there are some traditional knowledges and ways of viewing the world that may be challenging to include in the living and designed curriculum (see Section 3.3.1). Further to this, different situated knowledges are not static and continually change (Lave & Wenger, 1991; Rogoff, 2003; Shizha, 2007) and, thus, may be difficult to inculcate in classrooms.

It was clear that the varied views of young and old participants about traditional knowledges and ways of viewing the world complicate the achievement of balance called for by policy. Teachers' nuanced understandings of the different epistemologies that interact in classrooms and policy makers and politicians' historical views of the tensions which were underpinned by the loss of a particular lifestyle serve to highlight the incongruence between policy and practice. Accordingly, a confluence of traditional and

modern knowledges and worldviews in state education is not easily attainable as a result of the counterweights to modernity not always holding a linear position along the other side of the scale. Resonating with the findings of Dyenka (1999), this study also found it is the unrealised vision of education policy that underpins the tensions experienced by stakeholders. However, in extension of Dyenka's (1999) work, the findings of this study suggest that the state's ability to support the imperatives of education policy and the pillars of GNH is hindered by the complex voices of participants.

Consistent concepts of modern knowledges and modern education

There was consistency among the narratives about modern knowledges across all of the respondents. They described the curriculum as Western and considered the exogenous knowledges taught in schools to be modern. The national system of education's 'modernness' was characterized by its external origins, materials and methods brought in from abroad, and its purpose to advance the government's modernisation efforts. These conceptualizations aligned with scholars' views on education and modernisation (e.g. Ball, 1981; Fägerlind & Saha, 1989; Inglehart & Welzel, 2005; Shipman, 1971).

As a result of the tensions described thus far, the narratives of many of the participants in this study oscillated between supporting and rejecting the imperatives of education policy, as will be analysed in the subsequent subsection.

8.2.3 Oscillating perspectives among individuals

The narratives suggested that life in a rapidly changing society gave rise to stark contrasts between traditional and modern epistemologies. Consequently, citizens often live in both 'worlds'. Indicated by the findings was that many participants in each of the three groups

held both worldviews and had not yet reconciled these or aspects of these. Participants in each of the three groups described the experience of shifting between modern and traditional worldviews. Kuenga Palden's observation (see Section 4.2) that it is difficult to maintain a sense of coherence within Bhutan's schismatic environment serves to highlight the tensions running through participants' narratives. As shown in Table 5, the tensions were associated with contrasting worldviews and perspectives of aspects of modernisation.

As a result of participants' oscillation between traditional and modern epistemologies, the findings elucidated discourses that sometimes folded back on themselves (see Chapters Five, Six and Seven). For instance, an example common to each of the three participant groups was espoused support for 'acceptable' aspects of tradition and, at the same time, during other moments in the interviews or during a classroom observation session, some (or all) traditional epistemologies were described as 'stupid,' 'backwards,' or 'useless' (see Section 5.2). Another example was teachers who oscillated between supporting the latest educational innovations brought in from abroad and rejecting these in practice due to a perceived deleterious effect on aspects of national tradition (see Chapter Seven). From this emerged a sense of instability amongst the narratives.

As has been emphasised by the narratives of the participants in each of the three groups, it was not uncommon for individuals to hold competing perspectives, i.e. some maintained support for the modern education system while at the same time lamenting the social changes brought about by educational and national modernisation (see

Chapters Five, Six and Seven). This is because they believe – albeit not always unequivocally – in the validity of both epistemologies, despite the perceived tensions between the two. The participants who had not reconciled the tensions between the modern and traditional systems found themselves in a quandary, particularly in classroom situations (see Section 7.3). This confusion caused the participants to experience the tensions as irreducible sources of frustration.

Knaft (2002: 106) also suggests that as ‘modernity proliferates [it] becomes acerbic through the disjunction or contradictions between globalizing forces and localizing ones’. He terms this situation ‘oxymodern’ (see Section 3.2). In Bhutan, oxymodern tensions were evidenced in problematic relationships between the ‘old’ and the ‘new’ where, for example, aspirations for economic growth were often caught in contradictory relationships with the traditional anti-materialism that was part of a traditional Buddhist worldview and the GNH policy (see Section 6.2). Oxymodern tensions explain, in part, the trend of oscillation for participants positioned uncomfortably, at times, between tradition and educational and national modernisation. Participants often held views that were at once modern and anti-modern, traditional and anti-traditional (Knaft, 2002). However, while oxymodern experiences serve to explain the fluctuations among some of the narratives, it overlooks that for some participants, traditional and modern mores are not only experienced acerbically but are also non-tensional aspects of life in Bhutan (see Sections 6.3 and 7.2). Indeed, the findings of this study revealed that there were participants for whom this oscillation was not rooted in ambivalence but was an accepted part of achieving the balance (see Section 5.4) called for in GNH policy.

For many individuals, a balance was sought or perceived to have been attained. However, when these individuals saw that the balance was being tipped (or in danger of being tipped) too far in either direction, anxieties surfaced. This was demonstrated by participants who called for the national system of education to support a balance of traditional and modern epistemologies. However, too much of either was considered to be a source of tension, i.e. students would be ‘indoctrinated’ if ‘too much’ of Bhutan’s traditional epistemologies were included in the curriculum (see Section 6.3.2). For others, there was a strong value of modern education and greater prestige associated with being educated abroad, particularly at a highly ranked university in a Western country. Concomitantly, ‘too much’ modern or exogenous content in the curriculum was seen as fostering in students an undesirable preference for Western ideas (see Section 6.2.4). The sense of ambiguity extant among the narratives can also be linked, in part, to the anxiety and uncertainty surrounding change and transition (McLeish & Phillips, 1998). Participants’ views were tied to their experiences in a society that had undergone vast changes over the past 52 years including social, governmental, and economic changes (see Chapter Two). This situation resonates with scholarship on education and modernisation (see Section 3.2) and Carney et al.’s (2012) study on the vast social changes in Nepal associated with modern Western schooling and citizens’ experiences in a changing society where elements of culture were lost.

As a result of the instability and tensions, the participants in this study described their different approaches toward mediating the tensions they perceived between traditional

and modern worldviews and knowledges. The varied meditational approaches will be analysed below.

8.2.4 Varied mediational approaches

In continuing to analyse the tensions, it is important to now turn attention to if and how the fissures between different worldviews and knowledges were addressed. In light of Lave and Wenger's (1991) conceptualization that knowledge is situated among people and communities as well as Rogoff's (2003) view that people who engage as participants in different cultural and continuously changing communities of practice, this study found that participants from across the three groups encountered different situated epistemologies. As has been emphasized by the findings presented in the previous sections of this chapter and throughout this thesis, Bhutan's educational sphere represents a juncture where different flows of knowledges and ways of viewing the world converge and diverge, generating fracture lines that sometimes disturb the possibility of balance.

The findings demonstrated contrasting perspectives about how the tensions were or should be managed. Political and policy level participants and education leaders generally recognized tensions and maintained these were addressed through the living and designed curriculum; teachers, however, demonstrated a range of approaches to the different knowledges that were not always accounted for by the education stakeholders located outside the classroom. This finding serves to highlight the discontinuities between policy and practice. This section will first examine perspectives from the outer levels of the educational sphere about how the tensions are mediated. Subsequently, this section will

then analyse the perspectives from participants in the sphere's core about how teachers mediated the evident tensions.

Political and policy officials' and education leaders' attempts to mediate the tensions

First, at the political and policy level and at the educational leadership level, participants sought to mediate the tensions between traditional and modern ways of knowing in three main ways: (1) by establishing in education policy that a balance should be struck between traditional and modern ways of knowing (Department of Education, 2003; Ministry of Education, 2012; Ura, 2004) (see also Section 3.2), (2) by localizing the designed curriculum by adding Bhutanese examples and traditional epistemologies (see also Section 3.3.2) and, (3) by encouraging teachers to employ traditional funds of knowledge (Greenberg & Moll, 1998) as part of the living curriculum, particularly in subjects, which have not yet been revised (see Section 3.4). The political and policy officials and education leaders held the idea that the classroom should be an arena for critical inquiry where the interaction between traditional and modern knowledges and ways of knowing is enabled by teachers who act as facilitators of learning rather than as authoritative transmitters of knowledge.

As has been emphasised throughout this study, Bhutanese education policy aspires to ameliorate the perceived negative effects brought about by educational and national modernisation such as the loss of traditional epistemologies. This situation resonates with the surge of literature examining the benefits of 'local wisdom' for modern school curriculum by scholars (e.g. Booth, 1997, Gallard & Gallagher, 1994, Jungck & Kajorsin,

2005, Lauer, 2009, Le Grange 2007, McGovern, 1999, 2000, Sarangapani, 2003; Semali & Stambach, 1997; Shizha, 2007, Thaman, 1993) and practitioners (e.g. World Bank, 1998). For political and policy level officials, the imperative of GNH and infusion of traditional knowledges into the school setting ensured that a balance had been or would be obtained. They generally held the view that the ‘ultimate goal of the nation’ is to bring traditional and modern ways of knowing into confluence - with each benefiting from the other. Further to this, education leaders and political and policy level participants aimed to avoid what scholars on education and globalization (e.g. Baker & Le Tendre, 2005; Popkewitz, 2004) describe as a ‘flattening’ or homogenization of local culture brought about by a system of national mass education based on a Western paradigm. This is not to suggest that participants supported all aspects of traditional knowledge. Some participants at the political and policy level and educational leadership level (see Chapters Five and Six) held the view that aspects of tradition no longer hold utility or were deemed ‘backwards’ and should therefore be left behind (see also Kelleher, 1992 and Section 3.3).

Teachers’ attempts to mediate the tensions

Despite the attempts described above to reconcile the discontinuities represented in Table 5, teachers encountered tensions during their day-to-day classroom practice that were not addressed through policy, the curriculum and training for teachers. The findings in Chapter Seven suggested that this is because there is not established agreement about what the term tradition means and encompasses and ‘how much’ traditional content should be included in the curriculum and teachers classroom practice. Significantly, the

findings of this study revealed that the movement between the different worldviews, knowledges, and ways of life – modern and traditional – was felt most sharply by those inside the classroom where these frequently came into contact. The findings in Chapter Seven evidenced four main pedagogic strategies employed to mediate extant tensions: (1) *accommodating*, (2) *inviting discussion*, (3) *subordinating* and, (4) *dismissing, avoiding*.

Regarding the strategies of *accommodating* and *inviting discussion* (see Section 7.2), similar pedagogic approaches have been observed in many other countries. For example, De Haan's (2001) research on teaching in Mexican Mazahua communities where the points of tension enabled intersubjective understanding of different ways of knowing (see Section 7.2). Extending this line of research, this is the first study to explore this approach in classrooms in Bhutan. In addition, sociocultural studies (e.g. Rogoff, 2003; Lave & Wenger, 1991; Greenberg & Moll, 1998) and studies that explore the use of indigenous knowledges within the Western science curriculum (e.g. La Grange, 2007; Ogguniyi, 1988; Shumba 1999) also demonstrate how different epistemologies can be scaffolded to support learning. For Johnson and Kress (2003), Johnson, Garrett, Crossley (2003), and Kalantzis and Cope (2002) a pedagogy of multiliteracies may develop understandings of different situated forms of knowledge amongst students. Similarly, the findings of this study suggest that pedagogies that *accommodate* and *invite discussion* can contribute towards students' better understanding different forms of knowledge. Further to this, these pedagogies may help students 'dismantle the divide' (Agrawal, 1995) between traditional and modern knowledges and views of the world. There were teachers in this study who aimed to help students synthesize modern knowledges and views of the

world – which we know exist in school curriculum – with the traditional in a way where each epistemology benefited from the other. This approach did not antagonize students' understandings and confidence in the knowledges, ways of life and worldviews of their home and/or community culture; nor did it negate the modern world and its benefits.

The particular strategy of *accommodating* different worldviews by presenting traditional and modern ideas side-by-side and on equal footing adds weight to the work of Semali and Stambach (1997: 15) who note that '[b]y emphasizing points of intersection between traditional knowledges and official curriculum rather than seeing these forms of knowledge as antithetical, one might begin to rebuild an educational system in which knowledge is integrated with experience, and learning is an on-going activity'. Teachers *invited discussion* (see Section 7.2.2) for reasons similar to those who *accommodated* different knowledges, however, as mentioned in Chapter Seven, teachers withheld their own opinion. The findings suggested that some teachers *accommodated* and *invited discussion* of different epistemologies despite not having received formal training. While it is too early to draw conclusions about how prevalent this pedagogic approach might be in the future as Bhutan becomes more globally connected and the influx of exogenous knowledges increases, the study does show that mediation is possible and some tensions are resolvable. Classroom observations (see Section 7.2.1), particularly of Ugyen Lhendup's class which revealed a lively discussion of traditional and modern epistemologies related to health, suggested that students engaged with teachers' attempts to mediate, thus, indicating that there may be affordances for learning as suggested in the literature (e.g. Rogoff, 2003).

However, in contrast with the afore mentioned studies, teachers in Bhutan were not only attempting to bridge disjuncture between different knowledges, some also sought to foster in their students' appreciation of the country's cultural heritage and 'wisdom of the past'. As mentioned earlier, fostering such an appreciation was emphasized by the older participants who had experienced life in pre-modern Bhutan. For some educators, this was particularly difficult given the environment of rapid social change and increased global engagement described in above in Section 8.2.1.

While some participants *accommodated* different ways of knowing deliberately and strategically, others maintained that they naturally and implicitly mediated long before the imperative to align education with GNH. Supporting the scholarship of Gutiérrez and Rogoff (2003), some teachers incorporated traditional forms of knowledge into their 'repertoires of practice'. They assumed the role of mediators of different epistemologies and employed a culturally relevant pedagogy consistent with the approach described by Ares (2006). The narrative of Karma Kinle, an education leader and teacher, in Chapter Seven exemplified this stance. He explained that teachers at his school, himself included, naturally and implicitly invoked traditional epistemologies as a means to support modern lessons and generate a stronger connection in the minds of students than following the syllabus alone. The narratives of teachers who *accommodated*, therefore, did not always do so in response to a diametric opposition between two contrasting forms of knowledge. Extending the work of indigenous knowledge theorists, a view similar to Agrawal's (1999, 2000) is observed. That is, there is no 'divide' between traditional and modern

knowledges. This finding resonates with international development literature (e.g. World Bank 1999; Bates et al., 2009) and scholarship in comparative education (e.g. McGovern, 1999). For these educators, the point of tension between different ways of knowing offered affordances for learning and co-existing utility in the school setting. This therefore demonstrates that it is possible to resolve the points of tension between different knowledges.

Teachers also attempted to mediate the tensions between different ways of knowing by *subordinating* and *dismissing* ideas that arose in class, either in school texts or examples brought up by students. From this standpoint, tensions were the result of particular knowledges and worldviews hindering the implementation of the modern curriculum. This approach was often applied to traditional ways of knowing. For instance, in this study traditional ideas about health were seen as out-of-place and even harmful in Biology classes where students were taught ‘correct’ scientific knowledge about Western medicine, particularly because the ‘right’ answer on the exam reflected what is written in the text (see Section 7.3). This resonates with scholarship on African classroom interaction between traditional and scientific forms of knowledge (e.g. Ogawa, 1986; Yakubu, 1994) that found that teachers reject traditional ideas. Diverging from the findings of the aforementioned studies were participants who took a similar stance toward modern ways of knowing. For example, some teachers maintained that when tensions between worldviews emerge in class, the traditional view is emphasised as being the ‘right’ one and the modern view is *dismissed* or presented as *subordinate* (see Section 7.4).

What emerged from the analysis of findings presented in Chapters Five, Six, and Seven was that the individuals' locations within the educational sphere framed their views about how the tensions were approached and mediated. These understandings of participants in the outer two realms of the educational sphere, i.e. the political and policy participants and education leaders, were distinctly different from the understandings of teachers. This situation resonates with studies examining the appropriation of foreign educational models, materials and methods (e.g. Grigorenko, 2007; Steiner-Khamsi, 2004; Ochs & Phillips, 2004). These scholars emphasise that the adaptation process is complex and, in some cases, it may take a considerable amount of time before new education ideas take hold and become entrenched in the school setting. This finding also calls further attention to the lack of a 'shared meaning' (Fullan, 2007, 2009) about different knowledges and approaches to mediate the tensions between them, as was highlighted above (see Section 8.2.2).

8.3 Summary and reflections

This chapter has analysed the findings of the study across the levels of Bhutan's educational sphere against the extant theoretical and contextual literature. The aim of this chapter was to look critically across the three findings chapters and bring analytic coherence to the perceptions and experiences of education stakeholders in Bhutan with regard to the tensions in the discourse on the modernisation of education. The findings presented here take forward previous studies on Bhutan's modern system of education reviewed in Chapter Two and the theoretical literature on education and modernisation, indigenous knowledge theories, and sociocultural perspectives reviewed in Chapter Three

which included similar studies in other country contexts such as Nepal (Carney et al. 2012) and Zimbabwe (Shizha, 2007). However, this study evidences the dynamic, lively, and unstable relationship between traditional and modern mores (see Table 5). This complexity was attributed to the different knowledges and worldviews interact in modern state education and participants' oscillating perspectives and their varied means and methods for mediating the tensions. The tensions identified by this study were rendered in high relief, perhaps more so than in other countries, owing to Bhutan's distinctive adoption of modernisation as both discourse and policy reform, driven today by the policy priority of GNH, and the country's relatively isolated cultural setting. The strongly held traditional knowledges and worldviews of participants combined with the continual influx of exogenous influences through modern education and global connectivity generated tensions that were, for some participants, irreducible.

The narratives from across the three findings chapters established that modern ways of knowing can either be compatible with and support those considered traditional or can engender tensions. However, the findings presented in the previous three chapters, also demonstrated that Bhutan's distinctive schismatic environment gives rise to perspectives that often oscillated and contradicted. It is the complexity of the voices, Bhutan's unique educational and national history and modernisation paradigm – driven by the imperative to bring into confluence tradition and modernisation – which cause the findings to evade complete coherence with the existing theoretical literature presented in Chapter Three. Consequently, it is not possible, based on the analysis presented here, to make claims about how a national system can reconcile tensions between different ways of knowing.

This remains an open question, particularly given the recent official inclusion of GNH into the national curriculum. Further to this, it is not the contention of the study that education alone can mediate the evident tensions. As has been argued, the tensions discussed here are not only affected by education but are also influenced by stakeholders' experiences in a rapidly and unevenly changing society. Nevertheless, a number of implications emerged from the analysis and will be contemplated in the conclusion chapter based on the analysis presented here. Having synthesized the findings and analysed these critically in light of the extant literature, the next chapter will conclude this thesis.

Chapter Nine: Conclusion

9.1 Introduction to the chapter

This study established that there are a range of tensions associated with tradition and the modernisation of education in Bhutan (see Table 5). The evident tensions were located and typified across three levels of the educational sphere. The overarching goal of this study was to increase our understanding of the tensions in discourse on the modernisation of education in Bhutan and explore if and how tensions between traditional and modern knowledges, ways of life, and worldviews are mediated. The findings demonstrated that some tensions were reconciled and others were not addressed by the participants in this study.

This final chapter of this thesis is divided into four main sections. The first section synthesises the outcomes of the study and summarises how the narratives of the participant groups addressed each of the three lines of inquiry. To reiterate, this study focused on the following three research questions:

- (RQ1) At the political and policy level, what tensions are evident in the discourse on the modernisation of the education system in Bhutan?
- (RQ2) At the level of the curriculum, what tensions are observable in the translation of discourse and policy?
- (RQ3) How do teachers mediate the tensions?

The second section of this chapter summarises the contributions of the present study to research knowledge based on the detailed analysis presented in the previous chapter. The third section examines the implications of this study with respect to education policy,

education leadership, and teachers' mediation pedagogies. The closing section of this chapter presents the limitations of the study and directions for future research.

9.2 Answering the three research questions

Summarised here are the study's three research questions and how each was addressed.

The first research question considered the tensions from the perspectives of key political and policy level stakeholders.

(RQ1) At the political and policy level, what tensions are evident in the discourse on the modernisation of the education system in Bhutan?

The narratives of high-level government officials illustrated a set of dichotomous and deeply felt tensions between tradition and educational and national modernisation. *There was consensus that educational and national modernisation elicited tensions that are still felt today by stakeholders at the political and policy level.* For the majority of this group, formal schooling was associated with tensions that were moral, cultural, global, political and economic in nature. Four prominent tensions between traditional and modern mores emerged from the narratives, namely: 1) the shift in communication from traditional oral languages to English, 2) the introduction of ICTs and mass media, 3) young people's changing career aspirations from agro-pastoral vocations to desires for modern, white collar employment, and 4) discontinuities were exemplified by the stark contrasts between Western science and local knowledges and ways of knowing about health and medicine.

Significantly, the narratives of this group demonstrated particular understandings of the tensions associated with tradition and the modernisation of education. Their conceptualizations with respect to tradition were bound to a particular point in history – the period preceding the advent and expansion of secular education. This group constitutes senior participants who witnessed the construction of roads, schools, hospitals, and other modern infrastructure. Therefore, their ideas about tradition were framed by their generational, educational, and ideological backgrounds. As such, to this group, the modernisation of education and the nation as a whole was considered antagonistic to traditional epistemologies.

What distinguishes their perspectives from the other participants was that, despite their professional positions as developers and shapers of education policies, at the same time, many of the political and policy level participants have reservations about some of the changes brought about by educational modernisation. This standpoint seemed to be linked to their early experiences with the national system of education when it was viewed as ‘alien’ to or an ‘implantation’ into Bhutan.

While all but one of the members of this group reported a polarized relationship between tradition and the modernisation of education, they concomitantly felt that traditional and modern mores co-exist and support the imperatives of GNH. Representing the views of many members of this cohort was Ugyen Dorji who maintained that the ultimate goal of the national system of education was to bring together the best of traditional and modern epistemologies. It was apparent that the national system of education was considered to

hold a critical role in mitigating the perceived negative effects of modernisation by supporting the continuity of tradition. However, ideas about ‘how much’ modernisation to allow into the country and what aspects were considered acceptable in order to maintain a balanced relationship with tradition were in conflict. There was not clear consensus about which aspects of tradition should be carried forward and which should not. *Moreover, ideas about what tradition means and encompasses were variable. Thus, hindering the search for common points of reference in the process of educational change.* For some, tradition aligned with what is set out in GNH – e.g. driglam namzha, Buddhist values and beliefs, traditional arts, local languages, and knowledge about the country’s rich history (Ura, 2009). For others, tradition was equated with a lifestyle associated with the past, where, for example, modern infrastructure had not yet been built and young people walked for several days to reach the nearest school in Darjeeling. Traditional ways of knowing and ways of life generally evoked feelings of nostalgia and pride. However, aspects of tradition were also considered as ‘backwards,’ derogatory features of the past.

Some ministry and government members maintained the stand that there are no tensions and, if there were, they would be resolved by teachers or in the minds of individuals. Indeed, some maintained that it is the ‘flexible’ nature of Buddhism that enables Bhutanese citizens to adapt easily to rapid change. However, analysis of policy and political level stakeholders’ narratives did not overlook the perception of one individual who highlighted that the concern of policy should be on building infrastructure and

addressing the goals of EFA rather than attending to tensions between tradition and modernisation.

The second research question examined how tensions are perceived by those charged with translating policy and discourse to the level of the school.

(RQ2) At the level of the curriculum, what tensions are observable in the translation of discourse and policy?

The second research question extended the notion of different epistemologies into understandings of how the curriculum should serve these. Should the curriculum be shaped or reshaped to sustain, even in part, traditional knowledges and views of the world to align with the imperatives of GNH? Or should education be reshaped to align the curriculum with a more modern view of the world?

Education leaders and teachers were charged with translating policy directives – in line with GNH – to infuse traditional culture into the designed and living curriculum. While teachers and education leaders identified similar tensions between traditional and modern epistemologies, it was apparent that the perceptions of tensions by those closer to the periphery of the educational sphere (education leaders) often differed significantly from that of those at the sphere's core (teachers). They generally held different views about *why* tensions emerged and the *means* by which they should be mediated. *The majority of the education leaders asserted that the evident tensions were resolved through their work on the construction of the designed curriculum and teacher training programmes.*

However, the majority of the teachers maintained that contrasting epistemologies came into contact and generated tensions which they addressed in their classrooms.

The narratives of the majority of the education leaders revealed that the curriculum was comprised of an appropriate mixture of traditional epistemologies alongside innovations from abroad. They generally maintained that different situated forms of knowledge (Lave & Wenger, 1991) – i.e. traditional and modern – were included in educational resources and teacher education programs at the country's colleges of education as a means to enable teachers and students to gain 'literacy' in different epistemologies (Kalantzis & Cope, 2002; Johnson & Kress, 2003; Johnson et al., 2003). Significantly, the majority of the teacher participants disagreed with this perspective. The analysis of the education leaders' narratives also revealed the view that the tensions were too 'high level' to be perceived by students. Education leaders generally maintained that any tensions between different knowledges and worldviews that emerged in classrooms were the result of teachers misinterpreting or resisting the curriculum and education policy.

In contrast, many teachers pointed out that it is actually education policies, practices, and curriculum materials adopted from abroad are the real source of the unresolved tension and mismatch with traditional epistemologies. Many teachers criticized the adoption of Western educational materials and techniques and the foreign consultants brought in to facilitate education reforms. They held that a curriculum which is too heavily steeped in exogenous ideas cannot be compatible within the Bhutanese context. As a result of the 'too modern' or 'too Western' curriculum the ability of some teachers to inculcate

traditional knowledges and ways of understanding the world were limited. In addition, the majority of the teachers held that the absence of a uniform understanding of the traditional epistemologies that should be inculcated in the classroom and the rapid pace of educational change resulted in confusion.

Some teachers also identified competing pressures, arising, for example, from parents and school authorities who reportedly pressed teachers to focus on test preparation over the GNH imperative to inculcate traditional knowledges and ways of viewing the world. These pressures sometimes steered the teachers' classroom practice and hindered the inclusion of traditional epistemologies into lesson planning and delivery. Thus, for some of the teachers in this study, extant tensions were exacerbated when there was not adequate time to address the fissures between different forms of knowledge and worldviews.

There were also similarities among the perceptions of the education leaders and teachers. Holding similar views to teachers regarding the existence of tensions in the classroom were two education leaders who worked both inside and outside of the classroom – Ugyen Lhendup, the vice principal at School C, and Karma Kinle, the principal of School B. Distinct from the other education leaders, they maintained engagement in the classroom setting while teaching courses in addition to their leadership duties. They both observed stark discontinuities between different knowledges despite current education reforms aimed at aligning the national curriculum with GNH. Thus, the empirical findings indicated that the perceptions of tensions brought about by the curriculum were

viewed through disparate lenses depending on stakeholders' locations in the educational sphere and their mobility across levels into the classroom.

The majority of the education leaders and some of the teacher participants shared the view that the curriculum's emphasis on critical thinking enables students to analytically engage with different situated forms of knowledge and ways of understanding the world. For these individuals, the classroom was considered to be an open arena for inquiry-led learning and engagement with traditional and modern epistemologies. Therefore, from this standpoint, students act as mediators and decide for themselves which particular aspects of tradition should be carried forward and which should not.

Characterising the narratives of many of the education leaders and teachers were contradictory and oscillating views. Running through the narratives of the majority of the participants was the opinion that traditional culture should be carried forward through the living and designed curriculum. Concomitantly, many individuals maintained that traditional epistemologies or particular aspects of tradition should be 'left behind' when deemed 'backwards' or irrelevant to life in contemporary Bhutan. While some individuals offered specific examples of 'backward' traditional epistemologies – e.g. traditional medical practices based on beliefs about local deities – there was no clear consensus about which derogatory aspects of tradition should be kept out of the curriculum.

The third dimension of the study focused on teachers as mediators of traditional and modern epistemologies. By examining the everyday experiences of teachers, this study sought to understand how policy unfolds into practice by answering the following research question:

(RQ3) How do teachers mediate the tensions?

The narratives of teachers illustrated the tensions between different forms of knowledge and worldviews encountered during their day-to-day classroom practice. *The findings evidenced four main pedagogic strategies – i.e. accommodating, inviting discussion, subordinating, and dismissing – employed by teachers in response to extant tensions.* These terms for teachers' pedagogic strategies can also be linked to the narratives of the political and policy level and education leadership level participants but were employed as strategies by the teachers in this study. Significantly, analysis of teachers' narratives and classroom observations evidenced that teachers, at times, employed these four main strategies in contradictory ways when mediating contrasting epistemologies in the curriculum. For instance, some teachers *accommodated* certain aspects of traditional knowledges and worldviews and *subordinated* or *dismissed* aspects they considered to be 'useless' or 'backwards'.

Teachers demonstrated strategies that enabled the co-existing utility of traditional and modern knowledges and ways of knowing – i.e. *accommodating* and *inviting discussion*. Educators who *accommodated* different epistemologies positioned different knowledges

and ways of understanding the world on equal footing. They also employed traditional knowledges and views of the world as scaffolding in order to render modern concepts more easily understood. The tenets of Buddhism, driglam namzha, and ‘wisdom of the past’ were considered to offer affordances for learning and to provide a sense of continuity amidst change. Teachers who *invited discussion* when traditional and modern epistemologies came into contact and elicited tension encouraged students to discuss the points of conflict, yet did not reveal their own beliefs. Significantly, teachers who *invited discussion* encouraged students to think critically and construct their own opinions about traditional and modern epistemologies. The majority of the teachers were concerned with the conservation and promotion of Bhutanese tradition.

It was apparent from the analysis of the empirical data that teachers employed strategies that constrained different knowledges in the classroom – i.e. *subordinating* and *dismissing*. The findings evidenced that the devaluation of traditional epistemologies emerged when teachers held the view that knowledges and ways of understanding the world developed outside of formal schooling were *subordinate* or ‘backward’ when compared with modern school knowledge. For teachers who *subordinated* or *dismissed* traditional epistemologies, even when they emerged clearly in the classroom setting, international, exogenous ideas were considered to hold greater currency than traditional ways of knowing. It was also apparent that some teachers *dismissed* traditional knowledges not only because they held derogatory views of tradition but also owing to pressures exerted by the school community and/or a lack of time to veer from the written curriculum.

This chapter highlighted that for teachers, it was difficult to be at ‘the juncture of change’. Owing to frequent and continuous changes to the national curriculum, they worked in an environment where new educational materials, programs, and methods were being introduced. In addition, teachers were located within a society that was characterised by shifting knowledges, ways of life, and ways of knowing. Despite their location in an ever-changing environment, the teachers in this study received little or no guidance on how to bring about the balance between traditional and modern epistemologies called for by policy. As has been emphasised, most of the teachers maintained there was not an agreed upon balance to which they should align their classroom practice.

Having summarised how each of the three research questions were addressed, the next section will set out the study’s contributions to knowledge

9.3 Contribution to knowledge

Against the backdrop of the recapitulation of the findings of this study and the detailed analysis of the findings against the extant theoretical and contextual literature presented in Chapter Eight, this study offers five main contributions to research knowledge with respect to the fields of: 1) education and modernisation, 2) sociocultural perspectives, 3) research on the interactions between indigenous knowledges and modern school curriculum, 4) Bhutan studies, and 5) education research in cross-cultural contexts. The findings of this study contribute to these fields theoretically, empirically, and methodologically.

First, this study has theoretically contributed to the field of study on educational modernisation (e.g. Fägerlind & Saha, 1989; Portes, 1973). This study offers new knowledge by examining the modernisation of education in Bhutan, a country about which relatively little is known. The findings evidenced that Bhutan's modernisation paradigm with regards to the education sector – to (a) prepare students with the knowledges and skills to engage in modern life and (b) carry forward tradition – elicits tensions from the perspectives of individuals from across the three levels of Bhutan's educational sphere (see Section 8.2.1). At the same time, the findings also supported Ingelhart and Welzel's (2005) revised conceptualization of modernisation theory by demonstrating that the modernisation of education in Bhutan was also characterised by the co-existence of traditional knowledges and worldviews and an educational and national modernisation agenda. In addition, this study provides an example of the international transfer of a Western-based education model, employed to advance national modernisation, by exploring the approach of education stakeholders toward localising an imported curriculum. This study broke new ground by bringing the voices of teachers into the discourse on the modernisation of education in Bhutan.

Second, by taking a sociocultural approach to examining teachers' narratives about their classroom practice and observations of teachers' pedagogies, this study offers new knowledge about how educators act as mediators between different epistemologies (see Section 8.2.4). As the findings demonstrated, in Bhutan, traditional and modern epistemologies represent exceptionally strong currents that converge and intermingle while at the same time, at particular points of intersection, flow in two competing

directions (see Section 8.2.2). This study explored the views of actors with respect to how they mediate different situated knowledges and worldviews and address the tensions between them variously through their work. In doing so, this study advanced the approach by identifying four main mediating strategies employed by teachers – i.e. *accommodating*, *inviting discussion*, *subordinating*, and *dismissing*. The analysis of the voices of teachers from across all the curriculum subjects demonstrated that *accommodating*, *inviting discussion*, *subordinating*, and *dismissing* were strategies that emerged in the absence of guidance and a country wide discussion of what balance might actually mean and then how to achieve it (see Section 8.2.4).

Third, examples of these strategies were illustrated by observations of the stark contrasts between knowledges and worldviews that are navigated, particularly by teachers of science subjects. Analysis of these science teachers offers new knowledge on the tensions and on teachers' pedagogic mediation between traditional and modern scientific understandings as compared with other studies in the field of Western science and indigenous knowledges (e.g. Gallard & Gallagher, 1994; Shumba, 1999a, 1999b; Yakubu, 1994).

Fourth, empirically, this study makes meaningful contributions to knowledge about the extant tensions in Bhutan. In the literature, there are other works on Bhutan which have pointed to tensions related to traditional and modern knowledges and ways of understanding the world (Alison, 2009; Childs et al., 2012; Phuntsho, 2000; Ueda, 2001; Wangyal, 2006; Whitecross, 2002; Roder, 2012). In Chapters Five, Six, and Seven this

study established that there are a range of perspectives regarding the evident tensions that are far more complex than other research has previously suggested. Further to this, the studies above are from a range of disciplines and were not focused solely on the tensions between tradition and the modernisation of education as did the present study. This is the first study to explore the evident tensions – and the interplay between policy and practice – through an analysis of the convergences and divergences of the perspectives across three levels of education stakeholders.

The findings of this study illuminate the factors that gave rise to and exacerbate tensions between traditional and modern knowledges and worldviews in the context of Bhutan. Despite the call of the GNH policy to maintain continuity with Bhutan's traditional knowledges and was of viewing the world (see Section 8.2.1), the findings revealed that the lack of dialogue and consensus regarding how much and what aspects of tradition should be carried forward hinder the achievement of the vision of policy (see Section 8.2.2). Chapters Five, Six, and Seven, evidenced that the lack of consensus engendered complex, contradictory, and oscillating voices, views that have not been given attention in previous studies on Bhutan or in similar studies in other country contexts (see Section 8.2.3). As has been emphasised throughout, extant tensions in Bhutan are uniquely framed by the country's historically isolated culture and relatively late shift toward modernisation and recent international connectivity in combination with the rapid and uneven pace of change.

More generally, this study makes a novel contribution to knowledge by exploring the evident tensions at a particular point in history when individuals who held both traditional and modern worldviews and familiarity with or fluency in different literacies were working in Bhutan's education sector. This study adds to the limited empirical research on Bhutan (see Sections 8.1) and explores discourses at a particular moment of educational and national change. As the older generation leave their official positions, their understandings of traditional knowledges and views of the world and influences on education policy may be replaced by different ideas about tradition and its place in the national curriculum.

Fifth, finally, this thesis contributes to the field of knowledge regarding education research methodologies employed in cross-cultural contexts. It develops our understanding of methodological approaches by adding an example of education research carried out by a non-national in the new context of Bhutan. It emphasised constant reflexivity, establishing rapport, and rigorous attention to cross-cultural communication. In addition to making possible the theoretical and empirical contributions, the approach employed by this study enabled a number of contributions. Foremost, it enabled long-term access into Bhutan and, through discussions with Ministry Officials, access to the school research sites. This is the first doctoral study conducted by a foreign researcher in the field of education to have been granted research permission by the Bhutanese government. The methodological approach provided a nuanced and comprehensive account of extant tensions associated with tradition and the modernisation of education as policy unfolds into practice (see Sections 8.2.1 and 8.2.2). This was achieved by

including a range of voices from across the educational sphere. The rich personal accounts this research has accessed from those responsible for developing modern education from its point of conception in Bhutan to the education stakeholders responsible for translating and enacting education policy and curriculum were attained through this study's rigorous methodological approach, particularly with regards to building rapport. Based on these contributions to research knowledge, the subsection below extends these to implications based on this study's findings.

9.4 The implications the study for education policy, education leadership, and teachers classroom practice

Located in intermediate positions between different epistemologies, this study explored whether or not and how education stakeholders in Bhutan resolved the tensions between traditional and modern knowledges and worldviews. The evident tensions that emerged across the macro, exo, and micro layers of the educational sphere were deep-seated and acutely experienced owing to Bhutan's geographically and culturally isolated setting and its distinctive path toward modernisation. However, the tensions highlighted in this study are not unique to the Bhutanese context and are visible in education systems in other countries with rich traditional knowledge systems that have employed Western education to advance planned modernisation (e.g. Tanzania and Papua New Guinea). This study then offers useful comparative data for policymakers, education leaders, and teachers as education systems around the world face similar challenges – the preparation of their nation's young people for entrance into contemporary society while carrying forward traditional knowledges, values, and ways of understanding the world.

While this thesis sought to identify the tensions between traditional and modern mores in the arena of state education in Bhutan, what has become clear is that it has been most effective at highlighting the powerful maelstrom of competing ideas from the views of individuals within Bhutan's educational sphere. The analysis of the narratives from across the educational sphere evidenced that Bhutan is an example of a country which is experiencing a state of flux with regards to traditional and modern epistemologies. This study found that the tensions experienced by education stakeholders are attributed not only to the national system of modern education but are also influenced by individuals' experiences in a rapidly and unevenly changing society.

The complex array of tensions and the different worldviews and locational frames through which individuals assess the evident tensions preclude one-size-fits-all implications for education policy and practice. In addition, the detailed analysis of the narratives across the three participant groups shown in Chapter 8 suggests that the evident tensions are strongly shaped by the present climate of cultural flux (Appadurai, 1996) where knowledges situated among people and communities are continually changing (Rogoff, 2003).

As described in detail in Chapter Eight, the following four concepts were common across the narratives of the three participant groups:

- Tensions engendered by educational and national modernisation
- Different epistemologies and different perceptions of tensions
- Oscillating perspectives among individuals
- Varied mediational approaches

Significantly, the findings indicate that the mediation and reconciliation of the evident tensions is possible, at least at the moment. At the same time, the findings of this study suggest that Bhutan will continue changing in modern directions enabled, in part, by the education system. These changes include, but are not limited to, democracy taking hold and liberal values becoming part of the national mind-set, the increasing movement of foreign nationals and exogenous epistemologies into Bhutan, an expanding economic and employment landscape, and increasing social and international mobility. Not surprisingly, the findings then suggest that the growing influx of foreign knowledges may exert greater impact on the continuity of traditional knowledges, ways of life and views of the world. In concluding the study, a logical question that may arise then, is what the results of this study might suggest as Bhutan, and other countries, become further modernised, globally connected, and influenced by international and Western mores. In the subsections below, what the results of this study may imply for education policy, education leadership, and teachers' classroom practice will be contemplated.

9.4.1 The implications of the study for education policy

This study offers meaningful implications for policymakers. Policy paradoxes elicited tensions that coalesced around the continuity of traditional ways of knowing, ways of life, and socioeconomic development. However, the findings of this study imply that the government should continue to expand its support for the vast traditional knowledges and ways of understanding the world if the continuity of the country's cultural heritage is to

be maintained while education and society in Bhutan inevitably change. As the findings of this study suggest, the mediation of tensions between different knowledges and ways of knowing is possible and achieving a balance remains a goal of Bhutan's national education policy (Ministry of Education, 2012). However, curriculum reforms aimed at bringing these dual imperatives of policy into confluence by further localizing the curriculum and aligning school settings with GNH are still unfolding and sustainability over the long-term remains to be seen. It is possible that too heavy an emphasis on either the continuity of tradition or curriculum reforms brought in from abroad may have a destabilizing effect and exacerbate the evident tensions.

The findings of this study drew attention to the need for recognition of the multiple ways in which participants identify and mediate the evident tensions between different knowledges and worldviews if policy is to be brought into closer alignment with practice. The findings imply that the perceptions of individuals are of preeminent importance toward understanding if and how the evident tensions between traditional and modern epistemologies can be resolved. Suggested by the analysis of the findings from across the educational sphere, there was a need for a countrywide discussion of what balance might actually mean and how to achieve it. Individuals at the political and policy level are in the position to initiate such a discussion and embed a comprehensive understanding of tradition into national education policy documents. Further to this, the analysis of the narratives suggests that until we understand individuals' perceptions, the various attempts at designing sustainable educational policies, as well as ensuring the continuity of tradition alongside modernisation, may remain a problem.

Finally, the findings also imply that the individuals at the political and policy level might consider generating more opportunities to develop social scientists within Bhutan. As the findings highlighted, the paucity of Bhutanese social scientists poses limitations on the quality and quantity of research documenting the country's traditional knowledges and cultural heritage. As Bhutanese society continues to change, recording orally communicated traditional knowledges and ways of viewing the world will be increasingly important in order to ensure these can be taught and carried forward in Bhutan's public school system. Specialists in Bhutan's traditional epistemologies and learning systems would enable stronger traditional and local cultural components to be made part of school curriculum and teacher education. Engaging specialists in curriculum and teacher education programmes may aid in mitigating some of the tensions, e.g. the findings indicated that tensions in the sciences can be alleviated when perceived from a Buddhist point of view. In this respect, the findings imply that the issue of the medium of instruction is also important as much of the cultural and educational concepts are only effectively conveyed through the right medium (see Sections 5.5 & 6.3.2).

The findings also imply that much of the knowledges and ways of knowing which are considered traditional are embedded in students' home communities. This is a standard sociocultural view of knowledges as situated in communities (Rogoff, 2003; Lave & Wenger, 1991; Greenberg & Moll, 1990). Involving members of different communities in documenting the ways of knowing extant in their everyday lives may fortify efforts to

comprehensively understand the range of traditional knowledges and ways of viewing the world extant in Bhutan and particularly those that inform students' understandings.

9.4.2 The implications of the study for educational leadership

Education leaders will also need to take cognizance of the commonly known and diverse understandings of traditional epistemologies. This is particularly important as education leaders are active contributors to the epistemologies that become legitimated and part of modern school knowledge. Further to this, if education leaders are to address the evident tensions they must have awareness of the points of discontinuity between contrasting epistemologies and an understanding that tensions exist inside school classrooms. The analysis of the teachers' narratives exposed a range of tensions that were unaccounted for by education stakeholders in the outer layers of the educational sphere, particularly the curriculum developers.

This study has also shown that for those in positions of leadership, such as school principals and vice principals, curriculum developers, and teacher trainers, a reconceptualization of the curriculum is particularly important. That is, given that knowledges are situated in students' home communities (Greenberg & Moll, 1998; Lave & Wenger, 1991; Rogoff, 2003), the curriculum should be viewed 'as part of a larger process in which teachers, pupils, parents, and the community correct and supplement the experiences of each other' (Montero-Seiburth, 1992: 177). Such a conceptualization would enable the national curriculum to be part of a *generative process* rather than a *product* (Montero-Seiburth, 1992; Shizha, 2010; Bates et al., 2009). A dialectical approach would recognize members of the school community as contributors to the

epistemologies that become part of the designed curriculum. The findings imply that a generative curriculum may bridge the fissures, particularly for students who grow up in traditional home communities and later move to urban centres to complete their education as they would find themselves surrounded by modern ways of knowing.

Finally, this study highlighted the need for the development of in-service training and guidance for teachers if they are to carry out the imperative of policy to infuse traditional epistemologies into their everyday classroom practice. Support from education leaders in the form of teaching guides and in-service teacher training will be increasingly important in an environment of rapid change. In addition, this study pointed to the unique training needs of expatriate teachers. While some expatriate teachers interviewed in this study had developed a strong reverence for Bhutanese traditional knowledges and culture over time and infused these into their teaching practice, their narratives drew attention to the lack of in-service training specifically for teachers from abroad who had been recruited to work in Bhutan owing to teacher shortages. From the perspective of these teachers, their practice would benefit from training on traditional epistemologies and how to include these into their teaching practice developed particularly for teachers from abroad.

9.4.3 Implications of the study for teachers' classroom practice

Despite the contradictions in policy and curriculum that permeate into classrooms, this study found that many of the teacher participants acted as mediators of tensions between different knowledges. The teachers' natural, implicit, and deliberate inclusion of tradition as a means to create scaffolding between contrasting knowledges and worldviews may have important implications for students learning and attitudes toward traditional culture.

The analysis of teachers' voices implies that, concurrently with developing an awareness of the diverse and changing traditional epistemologies extant in Bhutan – an implication that resonated across the educational sphere – teachers should employ a multiliterate pedagogy (Johnson & Kress, 2003; Kalantzis & Cope, 2002). Bridging traditional worldviews and knowledges understood by students with modern lessons in the curriculum and creating a classroom environment that favoured *accommodation* of different ways of knowing was considered to enable learning. Therefore, the findings of this study imply that including traditional epistemologies in the informal – and formal (see Section 9.4.2) – curriculum may contribute to improving the quality of education in Bhutan. This is an overarching goal of current education reforms (Royal Education Council, 2009).

This study also indicated that current educational reforms that foster creative and critical thinking, while seen as deleterious to tradition by some participants, may actually support teachers' multiliterate classroom practice (Johnson & Kress, 2003; Kalantzis & Cope, 2002). The replacement of rote teaching and learning with the current emphasis on critical thinking and open classroom dialogue may have implications for a plurality of epistemologies being *accommodated* with each benefitting from the other and any divide being dismantled which, in turn, might enhance educational attainment.

However, if different epistemologies are to be *accommodated*, the analysis of teachers' narratives and classroom observations implied that teachers will need to understand and accept the goals of the curriculum (Goodson, 1994) and then recognise and resist

competing demands of the school community on their teaching practice. Indeed, teachers contend with pressures from members of the school community who may hold different ideas about the relevance of traditional knowledges and worldviews in contemporary Bhutan. Teachers should be prepared to oppose these pressures if they are to bring their classroom practice into alignment with policy and reconcile the tensions between traditional and modern epistemologies.

While this study demonstrated that many teachers have developed pedagogic responses to the evident tensions, new and ostensibly younger teachers will continue to enter the profession. One might question whether their abilities to infuse traditional epistemologies into their classroom practice might be significantly be altered or phased out given the implication of continuing social and educational change.

9.5 Limitations of the study and suggestions for further research

This closing section of the thesis discusses two areas: 1) the limitations of the current study, and 2) suggestions for future research. In viewing the weaknesses of the present study, as with any independent DPhil project, there are many limitations to this research, most of which are tied to constraints of time and resources. While there is growing research on the educational domain with respect to Bhutan, possibilities for future study, which arose from this inquiry into the tensions related to tradition and the modernisation of education, are numerous. Five main elements were judged to be outside the scope of the study but are considered vitally important toward illuminating, more broadly, the tensions associated with aspects of tradition and modern education.

First, the geographic location of the schools must be considered. While this study explored education tradition and modernisation in the relatively urban area of Thimphu and Paro owing, in part, to Shipman's (1971) view that during processes of modernisation, ways of life transition most rapidly to modern in urban areas. It was therefore expected that the tensions between tradition and the modernisation of education might be rendered in highest relief in and around the urban centre of Thimphu. However, empirical investigation of teachers' perspectives in rural Bhutan is also vital toward achieving a comprehensive view of the coherence – and incoherence – between policy and practice. This is particularly critical in the case of Bhutan where 69 percent of the population resides in rural settings and more than half of the population is engaged in agro-pastoral vocations (Research and Evaluation Division, Gross National Happiness Commission, 2010; National Statistical Bureau, 2011). Understanding how teachers in rural schools mediate the tension between different epistemologies represents a rich avenue for future research with potential implications both for studies on education policy and its enactment in Bhutan and in other non-Western countries that are in the process of adapting education models from the West.

Second, another area which was outside the scope of this study, was the examination of extant tensions from students' points of view. Expanding the study to include the voices of students – the recipients of education – would be an obvious and critical next step. Participants from across the educational sphere suggested that tensions between traditional and modern epistemologies are felt most acutely by young people, particularly those who grew up in rural areas where traditional knowledges and worldviews framed

their early life experiences in their homes and communities and who later moved near or in urban areas to attend secondary school where modern school knowledge became a source of authority in everyday life. Although Ueda's (2003) study examined discourses on tradition, culture, and modernisation from the standpoint of young people and Stiles's (2009) study probed the experiences of adults who had been trained in traditional, monastic and modern Western education, there are no available empirical studies that give attention to students' as mediators of different knowledges and worldviews. Therefore, building on this study, it would be valuable to understand how young people understand and manage their experiences shifting between different situated epistemologies as they move between localities. Similarly, there are no available studies on how parents in Bhutan influence students' experiences with traditional and modern ways of knowing. Thus, further study in this area would contribute to research examining the curriculum as part of a network that extends beyond the school setting.

Third, another avenue for future research concerns the identification of and capitalization on points of tension between contrasting epistemologies and the exploration of the affordances of this approach for learning outcomes. The findings of this study demonstrated that teachers have awareness of tensions – some of which were frequent and vividly exposed – between traditional and modern knowledges and ways of knowing. However, in light of the findings of the present study that showed that mediation between different ways of knowing is possible, this is an area where future studies could supplement research on both extant tensions and teachers' strategies for addressing these by taking focus on teachers' procedural knowledge using this study as a starting point. In

other words, future studies might explore the possibility of whether teachers' means and methods for mediating evident tensions are as accomplished as they might be. It would also be useful to see if these points of tension, when addressed by teachers, would actually result in increased learning outcomes in the context of Bhutan as suggested by some of the extant literature (e.g. Bates et al., 2009; De Haan, 2001; Paradise & Rogoff, 2009; Rogoff, 2003). Further education research may yield valuable information about the relationship between traditional knowledges and ways of knowing and learning outcomes when pupils attend Western schools both in Bhutan and more widely in other countries. Furthermore, expanding the study of the affordances of different situated knowledges and worldviews in education both in depth and in breadth – including highly contextualised ethnographic studies and quantitative works – might also provide useful insights. For instance, it may be worthwhile to examine the role of education in promoting active stewardship of traditional ecological knowledges and environmental conservation, which is another pillar of GNH (Allison, 2009).

Fourth, this study considered the modernisation of education as a framework for understanding the tensions that emerged from a specific point in time – from the advent of planned modernisation in the 1960s – and within a climate of rapid change. This study recognized the effects of global interconnectivity however, considering Bhutan's relatively recent (but rapidly increasing) international connections; this study did not consider globalization as the starting point of the tensions but rather an influence and indeed a cause of certain tensions. In other words, I propose that future work give priority to the interaction between the global and local (e.g. Weber, 2007) as it might provide a

rich opportunity for educational researchers to explore extant tensions. This approach may be useful as the older generation leave their official positions, namely the ‘educational pioneers’ (Roder, 2012) whose experiences in mediating the evident tensions cannot be separated from the starting point of planned educational and national modernisation and as Bhutan becomes more globally connected.

Finally, the relationship between tradition and the modernisation of education during this pivotal moment in history, when democracy and increasing international engagement are exacerbating extant tensions and affecting change, remains under-researched. The rationale for this study has been underpinned by the contention that studies on the modernisation of the educational system in Bhutan – particularly those that consider the voices of teachers – are necessary, owing to the evermore fervent thrust in policy to balance change with the continuity of the country’s rich tradition. As globalization intensifies, further research is vital toward understanding if and how a national system of education can bring traditional and modern epistemologies into confluence under the policy imperative of GNH. As was emphasised, these reforms were in their early stages at the time of fieldwork and had not yet been rolled out across all of the curriculum subjects. Further research in this area focusing on the emerging strengths, weaknesses, and obstacles of education reforms aligned with GNH may offer important insights for policy makers in Bhutan and in other non-Western countries in the process of aligning Western based curriculums with the cultural context. It will be important to query how classroom actors in particular are experiencing educational change, what resources might support their classroom practice, and if teachers’ needs are considered by actors in the

outer layers of the education sphere in reform processes. This study has advanced an interdisciplinary approach to the examination of the tensions between tradition and the modernisation of education across three levels of the education sector and may serve as a theoretical and empirical base on which future research may build. The contribution of the present study could be enriched through future research exploring the tensions in various contexts – including other regions of Bhutan – and further empirical and theoretical interrogation, thus advancing the knowledge base this study has provided.

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Appendix I. Politicians and policy makers' pseudonyms and positions

Pseudonym	Position
Ugyen Dorji	Ministry of Education Official
Yeshi Namgyel	Royal Civil Service Commission Official Former Ministry of Education Official
Tashi Tobgay	Historian, scholar, member of national council
Sonam Lhamo	Policy and Planning Division Official, Ministry of Education
Sangay Dendup	Department of Culture Official, Ministry of Home and Cultural Affairs Former Ministry of Education Official
Kuenga Palden	Director of Research Institute, Former Government Official, Author
Tashi Yangzom	Member of Parliament
Tenzin Tashi	Former Member of Government Committee on Education, Education Specialist
Jigme Wangchuck	Vice Chancellor of a University, Former Ministry of Education Official

Appendix II. Education leaders' pseudonyms and positions

Pseudonym	Position
Mindu Dorji	Curriculum Officer Department of Curriculum Development and Research
Jamyang Sherab	Official with Bhutan Board of Examinations
Karma Dendup	Teacher Training Official at a College of Education
Selden Gopal	Curriculum Officer Department of Curriculum Development and Research
Pema Loday	Official Department of Curriculum Development and Research
1. Ugyen Lhendup Vice Principal, School C 2. Chenchu Kuenden Vice Principal, School C 3. Yangchen Dorji 4. Vice Principal, School F 5. Karma Wangmo Principal, School E 6. Thinley Khandu Principal, School D 7. Karma Kinle Principal, School B	School Principals and Vice Principals

Appendix III. List of teacher participants and demographic details

Experience(years)	Age	Home Region	Curriculum Subject
2	26	Eastern Bhutan	Computers
3	31	Southern Bhutan	Chemistry
4	28	Eastern Bhutan	History
4	27	Eastern Bhutan	Geography
4	31	Eastern Bhutan	Computer, Math
4	29	Eastern Bhutan	Maths
5	27	Eastern Bhutan	Chemistry
5	28	Thimphu	Biology
5	28	Thimphu	History
5	28	Eastern Bhutan	Chemistry, Biology
6	32	Thimphu	Biology
6	29	Thimphu	English
6	28	Southern Bhutan	English, Counsellor, Career Educator
6	30	Eastern Bhutan	History, Geography
7	29	Thimphu	English
7	30	India	History, Civics
7	30	Western Bhutan	Geography, Science
8	29	Thimphu	English, Geography, Counsellor
8	36	India	Maths
8	35	India	Economics
8	35	Central Bhutan	History, Geography
8	31	Southern Bhutan	Economics
9	32	Thimphu	English
9	34	Western Bhutan	Physics, Math
10	33	Central Bhutan	History, English
11	36	Southern Bhutan	English
11	39	Eastern Bhutan	History, English
12	36	India	Physics
12	34	Eastern Bhutan	Economics
14	35	India	Chemistry, Biology
14	35	India	Chemistry
15	36	India	Biology
15	40	India	Physics
20	44	Southern Bhutan	English, History
24	46	Southern Bhutan	Biology
28	55	Eastern Bhutan	Dzongkha
28	49	Southern Bhutan	Geography
30	57	India	English, History
32	57	India	Maths
--	--	--	Dzongkha
--	--	--	English
--	--	--	English, History
--	--	--	English, School Counsellor
--	--	--	Chemistry, Biology
--	--	--	Chemistry
--	--	--	English

--	--	--	Physics, Chemistry
--	--	--	History
--	--	--	Math
--	--	--	Economics

Appendix IV. Semi-structured interview questions

CURRICULUM DEVELOPERS

1. Perception of tensions, if any, between new (scientific) knowledge and cultural ways of knowing? (examples)
2. What allowances/affordances does the curriculum offer in response to these tensions? To what extent is it effective? (examples)
3. Do you think the curriculum successfully draws on Bhutanese culture learned at home?
 - a. In your opinion, are parents involved in conveying traditional culture to their children?

MINISTRY OFFICIALS

1. Perception of tensions, if any, between new (scientific) knowledge and traditional ways of knowing.
2. How does education policy address these tensions?
 - a. To what extent is it effective?
3. Role of education in mediating the tension, if any, between traditional ways of life and modernization

TEACHER TRAINERS

1. How are teachers trained to deal with conflicts between traditional ways of knowing and elements of the modern curriculum?
2. Are foreign teachers trained to mediate between traditional ways of knowing and lessons, which might conflict with cultural perspectives?
3. Perception of tensions, if any, between new (scientific) knowledge and cultural ways of knowing?
4. How are these tensions addressed in teacher training programs?

TEACHERS

1. Perception of existing curriculum?
2. Perception of tensions, if any, between modern (scientific) content of the curriculum and cultural ways of knowing?
3. Do any of the lessons conflict with your own values?
 - a. If so, describe how you overcome these conflicts?
4. From your point of view, does the curriculum successfully embed traditional culture in children?
 - a. If so, how does it do this?

Appendix V. Codes and sub-codes

CODE	SUB-CODE
Curriculum	- Absence of tension 'Loss of culture' - Content of curriculum (general) - Curriculum challenges (general) - Curriculum success (general) - Drawing on indigenous knowledge - English curriculum - GNH Education 'Cultural conservation' - Mediation of tension through GNH - Moral and Values Education - Localized curriculum - Informal curriculum - Science curriculum subjects - Geography curriculum - Math Curriculum - Dzongkha Curriculum - History Curriculum - Examples of tension - Mediation of tension - Exacerbated tension
Education Policy	Policy success (related to modernization)

	Challenges (related to modernization)
	Policy implementation
	Policy mediating tension
	Policy and cultural conservation
Education System	
	Challenges of the education system (in relation to modernisation)
	Role of the education system
	Role of teachers
	Tensions in the education system (general)
Job Market	
Modern Education	
Modernity	
	What it means to be modern
Social Change	
Teacher Training	
Teachers Practice	
	Discipline/corporal punishment
	Dismissing IK
	Drawing on IK
	Inviting discussion
	Student centred teaching
	Teachers view of their role in the classroom
	'Traditional' rote style teaching
Teachers view of policy and its translation into the classroom	
Tension	
	Response of modern education sector to perceived tensions

Social tension (stemming from modern education)

Polar relationship between 'tradition' and 'modernization'

Absence of tension

'Traditional culture'

'Culture should be embedded at home'

'Culture is part of the lifestyle'

Participants definitions of 'culture,' 'tradition,' and 'indigenous knowledge'

Loss of 'tradition'

'Traditional values'

Gratitude

Respect

Driglam Namzha

'Traditional,' monastic education

Appendix VI. Curec forms

University of Oxford

CENTRAL UNIVERSITY RESEARCH ETHICS COMMITTEE (CUREC)

CUREC/1A Checklist for the Social Sciences and Humanities

The University of Oxford places a high value on the knowledge, expertise, and integrity of its members and their ability to conduct research to high standards of scholarship and

ethics. The research ethics clearance procedures have been established to ensure that the University is meeting its obligations as a responsible institution. They start from the presumption that all members of the University will take their responsibilities and obligations seriously and will ensure that their research on human subjects is conducted according to the established principles and good practice in their fields and in accordance, where appropriate, with legal requirements. Since the requirements of research ethics review will vary from field to field and from project to project, the University accepts that different guidelines and procedures will be appropriate. Please check the CUREC website to ensure that you have the correct form for your project.

This form does not cover research governance, satisfactory methodology, or the health and safety of employees and students. As principal investigator, it is your responsibility to ensure that requirements in these areas are met. Please carry out a risk assessment of the project, in consultation with all researchers involved, using the checklist and CUREC's other documentation.

The use of an asterisk in this form indicates a phrase defined in the glossary. The glossary and further information on the University's research ethics procedures are available from the CUREC website:

www.admin.ox.ac.uk/curec

This form is designed largely for research that falls within the Divisions of Social Sciences and Humanities and which does not involve a high-level of risk to the subjects. Elite interviews, field work and oral history are included in the CUREC process. Please take a moment to read through it and if you have any questions or doubts as to whether it is the appropriate form, please review Section A or consult the CUREC website.

Note on anonymised data: If you are using previously collected anonymised data about people which neither you nor anyone else involved in your study can trace back to the individuals who provided them (e.g. census data, administrative data, secondary analysis), you do not need to obtain ethical approval for your study. Please refer to the definition of *personal data in the glossary and FAQ no. 6 for further guidance.

Note on audit: If you are conducting research on behalf of or at the request of a service provider that matches the definition of *audit in the glossary, you do not need to obtain ethical approval for your study.

SECTION A

	Yes	No
1) Are you using research methodologies commonly used in biomedical or behavioural laboratory sciences?		X
2) Is there a significant risk that the research will induce anxiety, stress or other harmful psychological states in participants that might persist beyond the duration of any test or interview in which they are participating?		X

3) Will the research involve human participants recruited by means of their status as present or past NHS patients or their relatives or carers or present or past NHS staff?		X
4) Does the research involve *human participants aged 16 and over who do not have *capacity to consent for themselves? See the Mental Capacity Act 2005		X
5) Is the study to be funded by the US National Institutes of Health or another US federal funding agency?		X

Office use only: IDREC Ref. No. _____

Date of confirmation that checklist accepted on behalf of IDREC: // //

If you answered 'yes', please stop work on this checklist and

- **for questions 1 and 2**, complete CUREC/1 instead (available from www.admin.ox.ac.uk/curec);
- **for questions 3 and 4**, submit your proposal to the appropriate NHS ethics committee (see www.nres.npsa.nhs.uk and www.admin.ox.ac.uk/rso/clinical for further information);
- **for question 5, or if you answered 'yes' to questions 1, 2 or 4 and your research will take place outside the EU**, submit your proposal to OXTREC, which uses separate documentation (www.tropicalmedicine.ox.ac.uk/ox trec).

If you have answered 'no' to all questions in Section A, please complete Sections B-E.
This form and any supporting materials should be typewritten.

SECTION B

*Principal investigator/ supervisor/student researcher (title and name):	Chelsea Robles
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Name of supervisor (STUDENT RESEARCH PROJECTS ONLY):	Dr. David Johnson
Department or institute:	Department of Education
Address for correspondence (if different):	15 Norham Gardens, Oxford, OX2 6PY, U.K.
Email and phone contact:	Chelsea.robles@education.ox.ac.uk 07859153210
Title of research project:	Mediating the tension between tradition and modernization? Curriculum reform and implementation in Bhutan
<i>Brief description of research methods and goals plus description of the nature of participants (including the criteria for inclusion/exclusion, method of recruitment), explanation of how professional guidelines and/or CUREC protocol(s) will be applied (if relevant) and expected use to which the results/data will be put. Please describe how you will obtain informed consent. Approx 400 words.</i>	

The purpose of this study is to understand the relationship between Bhutanese government policies toward the preservation of cultural heritage, the role of the modern system of education in conveying traditional knowledge, and the ways in which this knowledge is inculcated through the English-medium secondary school curriculum. This study is composed of three intersecting, interrelated lines of inquiry: 1) an in-depth understanding of Bhutanese culture and society; 2) curriculum and education policy; and 3) the enactment of the curriculum in the classroom.

This project involves a month long pilot study and five months of fieldwork, both of which employ an ethnographic approach. The main, overarching questions are:

- 1) Is Bhutan's modern education system compatible with traditional lifestyles, behaviours, and attitudes?
- 2) If indeed it is, how is the education system maintaining the country's cultural heritage?

In order to address these questions, this research will identify salient themes drawn from documentary analysis and interviews with key stakeholders. Multiple methods of data collection will be employed as appropriate to the participants and their socio-cultural environment, including: observations, unstructured and semi-structured interviews (audio recorded) and document analysis (e.g. historical and contemporary texts, which are housed in Bhutan's national library and in the public and private spheres; newspapers; reports; and research studies).

The main participants will be adult key informants involved at multiple levels with education and cultural conservation, including curriculum developers, policy makers, and educators. Stakeholders' perceptions, beliefs and intentions for the education sector will not only inform the study, but also will allow for cross-validation of data derived from the documentary analysis. Adult informants will be selected using snowball sampling.

In combination with classroom observations, semi-structured interviews will illuminate students' experiences with localized curriculum in social science classes in lower secondary schools. The researcher will follow protocol P2.1 and will select students using convenience sampling. Students will be approached individually or by a teacher or school administrator, as appropriate. Parental permission will be obtained from each student participant (consent form will be translated into appropriate dialect for non-English literate parents). Observations of purposively selected secondary school social sciences classes will provide an ethnographically informed account of the ways in which cultural knowledge is enacted in the classroom. Furthermore, observations will enhance the quality of the interpretation and triangulation of data gathered in previous phases of this study. Classroom observations will be conducted following protocol P15.1 in order to observe normal pedagogy and educational activities. Permission will be sought from both the teacher and the head teacher; and additionally, an opt-out form will be provided to students and parents.

The data collected from this study will be anonymized and kept confidential. While it is anticipated that all data collected will be in English (the language of instruction in Bhutan's modern system of education and a national language), a research interpreter may be employed to assist with data collection, if necessary. The results of the project will be used as the basis of my DPhil thesis and may also be used in academic articles and reports,

List actual or probable location(s) where project will be conducted, if known:	Institute of Language and Cultural Studies, the Royal Education Council, Curriculum and Professional Support Division, Ministry of Education, Lower Secondary Classrooms in the Thimphu area. Since this project will be informed by an ethnographic approach, it is difficult to specify all of the sites where the research will be conducted at the moment. Paro and Thimphu, Bhutan
Anticipated duration of project:	23 Months
Anticipated start date:	15 October 2010
Anticipated end date:	September 2012
Name and status (e.g. 3rd year undergraduate; post-doctoral research assistant) of others taking part in the project:	None
Please indicate what training on research ethics the researchers involved with this study have received, e.g. the title of the online or in-person course, and date completed (online training available at www.admin.ox.ac.uk/rso/integrity/#Training):	Online Research Skills: Ethics 1 completed on 4th July 2010

Section C.

Methods to be used in the study (**tick** as many as apply: this information will help the committee understand the nature of your research and may be used for audit).

	Please tick
<i>Interview</i>	X
<i>Questionnaire</i>	X
<i>Analysis of existing records</i>	X
<i>Participant performs verbal/paper and pencil/computer based</i>	
<i>Measurement/recording of motor behaviour</i>	
<i>Audio recording of participant</i>	X
<i>Video recording or photography of participant</i>	
<i>Physiological recording from participant</i>	
<i>Participant observation</i>	X
<i>Covert observation</i>	
<i>Systematic observation</i>	
<i>Observation of specific organisational practices</i>	X
<i>Other (please specify)</i>	

SECTION D

Have you read one or more of the following professional guidelines and do you undertake to use the principles listed there as a guide for your own work? Please note that this is not intended to be an exhaustive list. Links to the guidelines listed below are included on the CUREC website.

	Please tick
<i>British Society of Criminology: Code of Ethics for Researchers in the Field of Criminology [britsoccrim.org/ethical.htm]</i>	
<i>British Educational Research Association Ethical Guidelines for Educational Research [www.bera.ac.uk/publications/guidelines/]</i>	X
<i>Academy of Management's Professional Code of Ethics [www.aomonline.org]</i>	
<i>Association of American Geographers Statement on Professional Ethics [www.aag.org/Info/ethics.htm]</i>	
<i>Oral History Society of the UK Ethical Guidelines [www.oralhistory.org.uk/ethics/index.php]</i>	
<i>American Political Science Association (APSA) Guide to Professional Ethics in Political Science (Section H) [www.apsanet.org/content_9350.cfm]</i>	
<i>British Psychological Society Code of Ethics and Conduct [www.bps.org.uk/the-society/code-of-conduct/code-of-conduct_home.cfm]</i>	
<i>Ethics Guidelines of the Association of Social Anthropologists of the UK and Commonwealth [www.theasa.org/ethics/guidelines.htm]</i>	
<i>Social Research Association: Ethical Guidelines [www.the-sra.org.uk/ethical.htm]</i>	X
<i>Statement of Principles of Ethical Research Practice from the Socio-Legal Studies Association [www.slsa.ac.uk]</i>	
<i>Statement of Ethical Practice for the British Sociological Association [www.britsoc.co.uk/equality/Statement+Ethical+Practice.htm]</i>	
<i>Other professional guidelines (please specify):</i>	

SECTION E

Please put a tick in the yes/no column as appropriate to indicate your response.

1) Will you obtain informed consent according to good practice in your discipline before participation?	Yes	No
	X	
2) Will you ensure that *personal data collected directly from participants or via a *third party is held and processed in accordance with the provisions of the Data Protection Act?	Yes	No
	X	
3) Does the research involve as participants *people whose ability to give free and informed consent is in question? (This includes those under 18 and vulnerable adults.)	Yes	No
	X	
4) As a consequence of taking part in the research, will participants be at serious risk of rendering themselves liable to criminal prosecution (e.g. by providing information on drug abuse or child abuse)?	Yes	No
		X
5) Does the research involve the *deception of participants, as part of the investigation/experiment?	Yes	No
		X
If any of your answers above are in a shaded box, please indicate whether those aspects of your project are fully covered by the following.		
6) Research protocol(s) which has/ve received IDREC/CUREC approval? If yes, please give protocol number(s): P2.1.2 and P15.1	Yes	No
	X	
7) Professional guidelines that you will be following, as noted under Section D?	Yes	No
	X	

If any of your answers in Section E are in a shaded box and are not covered by a protocol or by professional guidelines, please complete CUREC/2, available to download from the CUREC website. Then submit both this form (you need not complete section F) and the CUREC/2 to the Social Sciences and Humanities IDREC.

If all your answers in Section E are in the unshaded boxes or your answers in shaded boxes are covered by a protocol or professional guidelines, complete Section F and submit this form and any accompanying documents to the Social Sciences and Humanities IDREC (see notes and address below).

SECTION F

Complete this section only if you do not need to submit form CUREC/2.

I understand my responsibilities as principal researcher/supervisor/student researcher as outlined in the CUREC glossary and guidance on the CUREC website.

I declare that the answers above accurately describe my research as presently designed and that I will submit a new checklist should the design of my research change in a way which would alter any of the above responses so as to require completion of CUREC/2 (involving full scrutiny by an IDREC). I will inform the relevant IDREC if I cease to be the principal researcher on this project and supply the name and contact details of my successor if appropriate.

Signed by principal student researcher:.....

Date:.....

Print name (block capitals).....

Signed by supervisor:.....(for student projects)

Date:.....

Print name (block capitals).....

I understand the questions and answers that have been entered above describing the research, and I will ensure that my practice in this research complies with these answers, subject to any modifications made by the principal researcher properly authorised by the CUREC system.

Signed by associate/other researcher:

.....

Print name (block capitals).....

Date

I have read the research project application named above. On the basis of the information available to me, I:

- (i) consider the principal researcher/supervisor/student researcher to be aware of her/his ethical responsibilities in regard to this research;
- (ii) consider that any ethical issues raised have been satisfactorily resolved or are covered by relevant professional guidelines and/or CUREC approved protocols, and that it is appropriate for the research to proceed without further formal ethical scrutiny at this stage (noting the principal researcher's obligation to report should the design of the research change in a way which would alter any of the above responses so as to require completion of a CUREC/2 full application);
- (iii) am satisfied that the proposed project has been/will be subject to appropriate *peer review and is likely to contribute something useful to existing knowledge and/or to the education and training of the researcher(s) and that it is in the *public interest.
- (iv) [FOR DEPARTMENTS/FACULTIES WITH A DEPARTMENTAL RESEARCH ETHICS COMMITTEE (DREC) OR EQUIVALENT BODY - PLEASE DELETE IF NOT APPLICABLE] confirm that this checklist (and associated research outline) has been reviewed by the Department's Research Ethics Committee (DREC)/equivalent body, and attach the associated report from that body.

Signed:.....

(Head of department or nominee e.g Chair of DREC, Director of Graduate Studies for postgraduate student projects)

Print name (block capitals).....

Date:.....

Please send an electronic copy and a signed paper copy of this completed checklist, together with any supporting documentation, to the following addresses, keeping a copy for yourself:

Secretary of the Social Sciences and Humanities IDREC Email: ethics@socsci.ox.ac.uk

University of Oxford Social Sciences Division

Hayes House, George Street

Oxford, OX1 2BQ

Forms may be sent by email (without signature), where both the note of submission from the researcher and the note of endorsement from the supervisor/Head of Department are sent from a University of Oxford email address.

IDRECs and/or CUREC will review a sample of completed checklists and may ask for further details of any project.

FINAL CHECK

To prevent delay please check each of the following before submitting the application.

Have you completed Sections A-E? ☐

Have you defined all technical terms and abbreviations used? ☐

Have you included any supporting documentation, including – as appropriate – questionnaires and participant information, consent forms/form or note of procedure for recording oral consent, advertisements and surveys to be used? ☐

Are all pages (including appendices and attachments) numbered? ☐

Are all relevant declarations in Section F complete and any necessary authorisations obtained (by email or by signing the form) ☐

Appendix VII. Protocol 15.1

1. Title

Protocol for research on teachers and teaching in educational settings for typically-developing students.

2. Brief outline of nature and purpose of procedure

This protocol aims to enable trained researchers to use opt-out procedures for a range of typical classroom research methods, subject to certain constraints and protocols.

Researchers in education often study teachers and teaching in normal educational settings for typically-developing students. All students in school are considered to be 'people whose ability to give free and informed consent is in question' (IDREC checklist section F, question 3).

This protocol covers situations in which such research focuses on normal classroom activity. The meaning of 'normal' is to be agreed between researcher and teachers. The use of 'normal' in this document is to ensure that under this protocol children are not exposed to, nor asked to do, anything that would not be within the range of usual educational practice for that site. Classrooms have been selected using purposive or opportunistic sampling, or are used as case studies. Children and young people are research participants only because they are normal participants in the context.

This protocol is not appropriate for studies which focus on the learning, behaviour, or developmental trajectories of individual students.

For a full range of students in a particular classroom to be included in the research, the sample must not be skewed towards those from well-organised households who respond readily to messages which go home, and reasonable efforts have been made to contact parents and ensure they understand the research. Because of confidentiality the onus for this rests with the school and this protocol seeks to "minimise the impact of [...] research on the normal working and workloads of participants". (para 19 BERA guidelines) while ensuring that participants are fully informed, as far as is possible. This protocol is in full accordance with the Revised Guidelines of the British Educational Research Association (2004) <http://www.bera.ac.uk/files/2008/09/>

ethica1.pdf. In particular it conforms to the United Nations Convention on the Rights of the Child and the Data Protection Act (1998) and the Children and Young Persons Act (2008). It also conforms to research practice as it has developed in the Department of Education. Details of the types of research covered by this protocol, and their related constraints and procedures, are in section **13 Further information**.

3. Training of research staff All researchers will have had appropriate research training, and student researchers have agreed the study with a supervisor.

4. Methods for recruiting participants The study must have been agreed with the school headteacher and the teacher(s) concerned. Usually the first contact is with the teacher with whom the research is to be conducted, a head of department, or a headteacher. A formal letter to the headteacher should follow including the information and requirements for the research and consent forms intended for students, teachers and parents and a formal request to host the research. The classes for the research can then be chosen and the procedures for consent agreed with the school. It should be noted that agreement by the University for the opt-out procedure to be used does not commit the school to this, and they may still request opt-in procedures be used. Researchers and the school need to ensure that non-English-literate parents are contacted in an appropriate way, and that parents and students who may, for cultural reasons, be especially sensitive about recordings fully understand the implications. Teachers who are the subjects of the research must sign a permission form for the research to proceed, and undertake to maintain anonymity of individual students, and to provide any necessary anonymous secondary data.

5. Information provided to participants The specific details will vary between studies, but will always include:

- the name of the study
- the name(s) and status of researchers carrying out the study and how to contact them
- a brief rationale of the study, including its purpose and value
- why potential participants are being invited to take part in the research
- an explanation of what is involved in the research, and its duration
- description of the data that will be collected and kept

- that potential participants can ask questions about the study before they decide whether to participate
- that potential participants can choose whether to participate or not, and can withdraw from the study, or any part of it, without penalty at any time by advising the researchers of this decision
- a statement that children are participating as members of their normal classes, and not as specially-selected individuals
- information about any additional information that will be obtained from the school
- information about who will have access to the data, how it will be stored and for how long, and what will happen to the data at the end of the study
- a statement that the data will be made anonymous
- what benefits (direct or indirect) will accrue to participants
- what risks are involved in the study
- that the project has received ethics clearance through the University of Oxford's ethical approval process for research
- that the project conforms to the guidelines of the British Educational Research Association

The information is written in simple and non-patronising language at a level suitable for a reading age of 12.

See attached sample information sheets

6. Consent of participants *Group A activities*, which do not alter the students' normal classroom experience and/or which focus solely on the teacher will need only signed informed consent from the headteacher and teacher. Sample letters should be provided with the ethics application. All information will be shared with the teacher. For Group A, there are no vulnerable subjects and no additional or abnormal activities involving young people. The research would be covered by CUREC 1.

Group B activities do not place students at educational risk, do not store images of students, and do not identify or focus on individual students. Students and parents need to be fully informed by information letter and provided with an opt-out form, and can choose to opt out at any stage. Opted-out students must have alternative provision of equivalent educational value, or in other cases they must be placed where they cannot be observed or recorded. All reasonable efforts must be made to contact parents and ensure they understand the letter, but confidentiality means that this onus often rests with the teacher or other school staff. In some contexts, such as independent boarding schools, the school itself is *in loco parentis* in this respect.

7. Financial and other rewards to participants

Apart from the implicit benefits to practitioners and children of having extra attention paid to their work, no rewards will be given in exchange for participation in the research.

8. Potential risks to participants/researchers/others and what will be done to minimise

Researchers should take advice from the Department and host schools about CRB clearance (<http://www.disclosure.gov.uk>). Researchers must be sensitive to child protection issues and not work in situations that could leave them open to accusations of abuse. Researchers must be aware of, and conform to, the requirements of the Data Protection Act (1998) and the Children and Young Persons Act (2008) and the BERA Revised Guidelines (2004).

See also parent information sheet.

9. Monitoring and reporting of adverse or unforeseen events

The research will take place in the classroom under the supervision of the classroom teacher. Any adverse or unforeseen events will be reported to the Head Teacher.

10. Communication of results

The school should receive a brief report about the research, and parents informed that this will be available.

See also parent information sheet.

In all publications arising from the research, identities of the school and teachers and students will be concealed unless further, specific, informed, opt-in permission is obtained. Teachers should be informed about any reports of the research which are going to be in the public domain, but do not need to be informed about reports which are only going to be in the research domain.

It is usual to give teachers copies of video and audio material arising from their practice, and copies of any transcripts made.

11. Duty of care issues/confidentiality Research under this protocol does not focus on individual children as subjects so it is unlikely that any data would accrue which would give reliable information about individual children that is not already available to the school in other ways. Data about the class which is of direct interest in the study may be kept confidential from the teacher if this is necessary, whilst it would be unethical not to share general matters of concern with the teacher if they are unaware of them (see BERA guidelines paras 27-29). Data collected under this protocol should not be withheld if it has serious implications for the child and might give access to services that might be of help, but matters of this nature should be discussed with the teacher rather than with parents. It has to be considered that the researcher may have a skewed, partial, perspective and may not be an expert in special needs.

12. Data Protection issues Each child whose words or work is used in the study as an individual has to be given a code name and the key to these must be kept secure. Written work must be made anonymous before being handed to the researcher. Any video or audio material on which children are still identifiable must be kept securely in a locked cabinet and not stored on desktops, laptops or websites and destroyed as soon as an anonymous version has been produced.

13. Further information

BERA ethical guidelines, under which the research must operate, are available at <http://www.bera.ac.uk/files/2008/09/ethica1.pdf>

Group A research activities:

Classroom research typically includes:

observation of teachers

audio-recording of the teacher with lapel microphone

agreed curriculum-related non-invasive normal activities such as paper, verbal, computer tasks set by the teacher as part of the curriculum (excluding sensitive topics sometimes taught during pastoral, social and health education lessons) where the focus is not on

individual performance on such tasks but how the tasks relate to the teaching.

For this kind of research, opt-in informed consent of the teacher is usually sufficient, but researchers are advised to follow the ethics procedure of the school.

Group B research activities:

Classroom research also typically includes the following methods, in which there may be some focus on students as participants in the classroom:

observation which includes students in normal classroom behaviour

audio-recording with microphones which include students' voices in normal classroom interactions

video-recording focused on teachers

analysis of written artefacts from the lesson, made anonymous

pedagogic activity such as researcher teaching the whole class, or having teacher-like conversations with individual or small groups of students in the classroom, within the usual curriculum teaching innovations, such as trialling innovative methods in a systematic way

All the above methods are often used in schools for development purposes and internal information purposes. The difference between research activities in Groups A & B is that in Group A there is no need at all to focus on students. In Group B there is the possibility that individual students will be the subject of temporary focus, in their normal classroom participation, but the unit of analysis is the teacher and/or the classroom situation and/or the lesson, not individual students. This protocol recognises that opt-out procedures are adequate for these types of research, so long as it does not:

(a) disrupt the normal range of classroom practices as agreed by the school

(b) identify individual students by name or by video image, but instead uses codes to maintain anonymity

(c) focus on individual students' behaviour or learning, nor on named work

(d) place any student at risk educationally or in any other way and is agreed by the headteacher of the school and the relevant teacher(s). Students and parents are fully informed and can opt out at any stage without educational risk.

Types of research in group B

observation

Students' real names must not be used, nor obviously identifiable features. A coding system has to be established at the start of the research and used throughout observation notes, and the key to this code must be kept securely and only accessible to those members of the research team who need to use it. Events the researcher sees or hears which are of any concern and might relate to Health & Safety or Child Protection issues must be reported to the teacher. No information can be recorded about students who have opted out.

audio-recording

Normally students will not be identifiable from audio-recording, and identifying sounds can be disguised in any use of the recording outside school and the research team's use. Names uttered in the sound recording can be digitally cut or obscured and the original recording destroyed. Transcriptions should be accessible only for research purposes. Students who have opted out must be positioned somewhere which avoids accidental capture while ensuring that they have their normal educational experience.

video

The camera will point at the teacher, and avoid deliberate filming of students' faces or otherwise identifiable images. If a student walks into view, or goes to work in the area at which the camera is directed, the identifiable image will be removed from the electronic record. For example, this can be done in situ by covering the lens and recording in sound only, or by taking steps within a reasonable timeframe after recording to edit out the images of students. Images of students accidentally captured will not be reproduced or used for research purposes in an identifiable way, nor stored electronically in an accessible form. It is not just a matter of obscuring visual images, but of obscuring identity within the clues provided by a familiar context. Researchers should have such procedures in place at the planning stage. Students who have opted out must not be captured on film at all; it is usually possible to seat them somewhere which avoids accidental capture while ensuring that they have their normal educational experience.

analysis of written artefacts

This research does not focus on individual students, so written artefacts are only used to give depth and full information about what was being done in the lesson, not as records of individual learning. The written material being used in this kind of research is that which is produced in the normal work of the lesson and has to be made anonymous or coded before being handed to the researcher, excluding that of opted-out students. This process must be included in the agreement with the teacher.

pedagogic intervention

Some classroom research entails the researcher acting as a support teacher, or questioning individual or small groups of students in the classroom in ways typical of teachers and teaching assistants. Many classroom researchers are also qualified teachers so their ability to act appropriately is not an issue. Any pedagogic intervention by the researcher must be agreed with the teacher and must be within the normal practices and curriculum of the classroom, teachers and teaching assistants. Students who have opted out must have alternative educational provision which is equivalent to what they would have without the intervention. This protocol is not appropriate for deliberate non-curriculum innovations.

teaching innovation

Researchers may agree with teachers a particular way of teaching for a certain period of time, and monitor both the methods and the results. To obtain permission from a school for such a teaching innovation, researchers must produce a full justification for this research and convince the school that what they are going to do will not put students at risk educationally. This process does not therefore have to be repeated with every student and every parent. Instead, the information letter should be from the school and researcher jointly, and the opt-out procedure used. This procedure recognises that educational development is a normal part of school life, and that teachers constantly change the way the curriculum is organised, try new ways to teach, and alter the nature of tasks. Thus as long as the school supports the research it can be seen as within normal school practice. Students who have opted out must have alternative educational provision elsewhere which is equivalent to what they would have without the innovation.

MSD/IDREC/2005/P.2.1.1 may be an appropriate opt-in protocol for other kinds of research into classroom teaching and learning.

Appendix VIII. Participant information sheet



University of Oxford
Department of Educational Studies
15 Norham Gardens, Oxford OX2 6PY
Director: Professor Anne Edwards
Tel: +44 (0)1865 274024 Fax: +44 (0)1865 274027

Mediating the tension between tradition and modernization? Curriculum reform and implementation in Bhutan

Information for Participants

The purpose of this study:

The purpose of this research project is to understand the relationship between education policy, the curriculum, and the ways in which traditional values and cultural heritage are inculcated in Bhutan's English-medium secondary school classrooms. This research is particularly concerned with how teachers mediate the tension (if any) between traditional ways of knowing and modern, scientific knowledge.

Why am I being asked to take part?

My project involves interviewing adults involved at multiple levels with the modern education system; including curriculum developers, policy makers, and

educators. I would like to learn about your perceptions, beliefs and intentions for the education sector, particularly at the grade 10 middle secondary level.

Why should I participate?

The results of this study will be made available to government organizations involved in Bhutan's education sector and the schools involved in this project. While participating in this study may have no direct benefit to you, the project will potentially be of benefit to those involved in the education sector. Please let me know if you would like a copy of the results of this study.

How will I participate?

If you choose to participate, you will be involved in a semi-structured, one-on-one interview. You can ask me questions about this research at anytime. Your participation is voluntary and you are free to withdraw at any time without giving any reason. With your permission, I will audio record the interview. We can discuss this in more detail before the start of the interview.

Will my name be used?

Without your permission, I will not use your name and will make every effort to make any identifying information anonymous. However, I cannot guarantee that all readers will not be able to identify you. We can discuss any concerns you might have at any time.

Who will have access to the personal data provided?

All gathered data will be treated confidentially, and the names of participants will be concealed through the use of a code that only I will know. All collected data will be stored securely on my password-controlled personal computer. Only I will have access to the data.

What will happen with the information at the end of the project?

The UK Data Protection Act (1998) will provide a legal basis for withholding personal information by which participants may be identified. Material from interviews will be used for the following purposes: 1) As the basis for my DPhil thesis; 2) For the creation of reports for participating organizations and government ministries; 3) In academic articles.

I will provide all participants with copies of published materials upon request.

Ethics:

This project has been designed in accordance with the Ethical Principles of the British Educational Research Association. This study has been reviewed by and received ethics clearance through the Central University Research Ethics Committee (CUREC), University of Oxford.

I hope you will agree to take part and find this experience interesting. If you have any questions regarding this research project, please do not hesitate to contact me via email at: chelsea.robles@education.ox.ac.uk.

Appendix IX. Consent form

UNIVERSITY OF OXFORD DEPARTMENT OF EDUCATION

15 Norham Gardens, Oxford OX2 6PY
Tel: +44(0)1865 274024 Fax: +44(0)1865 274027
general.enquiries@education.ox.ac.uk www.education.ox.ac.uk

Director Professor Anne Edwards



Mediating the tension between tradition and modernization? Curriculum reform and implementation in Bhutan

Consent Form

If you agree to participate, please sign below and return the form to the researcher.

- ✓ I have read and understood the information on this study and had the opportunity to ask questions and get satisfactory answers about this study.
- ✓ I understand that I can withdraw from this study without any consequences at anytime by informing the researcher of my decision.
- ✓ I understand who will have access to identifying information provided and what will happen to the data at the end of this project.
- ✓ I understand that this project has been reviewed by, and received ethic clearance through, the University of Oxford Central University Research Ethics Committee.

I agree to participate in this study:

Your Name: _____

Signature: _____

Date: _____

Researcher's Name: _____

Signature: _____

Date: _____

Appendix X: Letter to school principals



University of Oxford

Department of Educational Studies

15 Norham Gardens, Oxford OX2 6PY

Director: Professor Anne Edwards

Tel: +44 (0)1865 274024 Fax: +44 (0)1865 274027

(Principal name)

School name and address)

(Date)

Dear *(Principal name)*,

I am writing to enquire about conducting some research in your school during the academic year. I am a doctoral research student at Oxford University, supervised by Dr. David Johnson (Reader in Comparative and International Education), and have received research approval for my study from Bhutan's Ministry of Education. My research project, *Mediating the tension between tradition and modernization? Curriculum reform and implementation in Bhutan*, will explore the evident tensions in the discourse on the modernization of the education system in Bhutan. In doing so, this study will examine: 1) the observable tensions in the translation of discourse and policy into curriculum implementation; and 2) how teachers, as front-line agents, mediate the tensions.

I am interested in conducting interviews with teachers at your school (please see attached information sheet) and observations of one of your science teachers.

The observations will take place with Year 10 science teachers and I am looking for a science teacher at your school who would be interested in participating in this research project. I am not aiming to change what or how the teacher chooses to teach, and will not be making any judgments about teaching. My research focuses on teachers' pedagogic strategies for mediating the tensions between traditional and modern, scientific knowledge

By participating in the research, your school would be contributing to a study that will deepen our understanding of how teachers act as mediators between commonly held cultural beliefs and contrasting scientific knowledge. By bringing the narratives of educators to the fore, this study hopes to offer new perspectives to the discourse on the modernization of Bhutan's educational system. It is hoped that the findings may be useful both for academics and a range of stakeholders, including policy makers, administrators, curriculum developers, and teachers in Bhutan.

The commitment from the school would be to allow me into science lessons over the course of several terms, from the middle of spring term (June 2011). I would audio-record teachers engaged in normal classroom teaching, observe and take notes, and photocopy some instructional materials. The observations will focus on the teacher and my presence in the classroom will be unobtrusive and should not disrupt students' normal classroom experience.

Oxford University has strict ethical procedures on conducting ethical research with teachers and young people, consistent with current British Educational Research Association guidelines. Before beginning the research, I would talk with teachers about the research, provide information, and make clear that their participation is completely voluntary. Throughout the research teachers will be able to refuse to participate at any time.

All participants, including the teacher and the school, will be made anonymous in all research reports. The data collected will be kept strictly confidential, available only to my supervisor and myself, and not used other than specified without the further consent of all involved being obtained. All audio recordings will be destroyed at the end of the research period, and stored on my password-protected laptop until then.

If you would like to take part in the study, or need more information about any aspect of my study, please contact me. Whether or not you feel it would be appropriate for your school to participate, I would be grateful if you would complete the pro-forma below, and return it to me in the stamped addressed envelope enclosed in this letter.

Thank you for your time and attention. I look forward to hearing from you.

Yours sincerely,

Chelsea Robles

Appendix XI. Consent form for school principals

Mediating the tension between tradition and modernization? Curriculum reform and implementation in Bhutan

Chelsea Robles
Oxford University Department of Education

(School name)

(School address)

(Principal name)

- ☐ We do not wish to participate in this project.
- ☐ We would like to find out more about this project.
- ☐ We would like to take part in this project.

If you would like further information, or are interested in taking part, please give the name of a contact person for your school, and details of the best way to contact him or her.

Contact name: _____

Contact email: _____

Contact telephone number: _____

Thank you for your time.

