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*Livelihood Diversification into the Rural Nonfarm Economy:
A Case of the Resettled Households of the
Nam Theun 2 Hydropower Project*

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| ABSTRACT

Historically, agriculture has played a significant role in enhancing the economic base of rural areas in most developing countries. However, the rural nonfarm economy, previously neglected by policy makers, is currently receiving more attention as it is thought to be a potential alternative to agriculture in lifting the rural poor out of poverty.

This case study is centred on the resettled communities of the Nam Theun 2 Hydropower project, located in Lao P.D.R., and examines the transition of their livelihood strategy, with a focus on the diversification into the rural nonfarm economy. The objectives of the study is to describe and analyse the development on the rural nonfarm economy in the resettlement area of the Nakai Plateau as well as to analyse whether resettled households have been ‘pulled’ or ‘pushed’ into diversifying into the rural nonfarm economy. The collection of data, grounded in qualitative semi-structured interviews, was conducted through fieldwork in the resettlement area.

The development of the rural nonfarm economy emerged rapidly with the commencement of the construction of the dam, yet expansion has stabilised and been slow in recent years. Findings show that resettled households are increasingly incorporating rural nonfarm activities into their livelihood strategy, yet the significance of nonfarm activities remains weak as households continue to depend on more profitable activities outside the rural nonfarm economy. Furthermore, the dynamics of pull and push factors at play remains highly complex, yet both factors are simultaneously present and influence the development of the rural nonfarm economy of the Nakai Plateau. Nevertheless, push factors appear to be more prevalent as the sluggish agriculture results in an economic base that is not able to drive the expansion of the rural nonfarm economy.

Key words: Laos, rural nonfarm economy, livelihoods, rural nonfarm activities, diversification, resettlement, hydropower

| LIST OF ABBREVIATIONS

ADB	Asian Development Bank
GDP	Gross Domestic Product
GoL	Government of Laos
IFI	International Financial Institutions
LSMS	Living Standards Measurement Surveys
NTPC	Nam Theun 2 Power Company
NT2	Nam Theun 2 Hydropower project
POE	International Environmental and Social Panel of Experts
RAP	Resettlement Action Plan
RNFE	Rural nonfarm economy
VCF	Village Credit Fund
VFA	Village Forestry Association

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1 | INTRODUCTION

The growing demand for clean, affordable and reliable energy in the midst of climate change concerns has led to the reassessment of hydropower development as one of the ideal approaches by many governments in their energy policy. Hydropower, usually in regards to the 20th century invention of hydro-electric power, is electricity that is the result from the catching of energy of running or falling water due to gravitational force. Accounting for 16% of the global electricity production, hydroelectricity is the most broadly used kind of renewable energy (Worldwatch Institute, 2012). Hydropower is also viewed as a potential driver of economic growth, providing benefits in the form of irrigated food production, urban water supply, improved infrastructure and electricity accessibility in rural areas.

Nevertheless, such benefits tend to sustain merely on the short-term and thus, the actual sustainability of hydropower development is greatly contested. Large dam projects pose both short-term and long-term challenges and risks, such as the flooding of large areas of land and irreversible impacts on river basins and ecosystems. The development of large dams has also resulted in the involuntary resettlement of 40-80 million people worldwide, primarily afflicting the poor who are further impoverished by relocation (Scudder, 2008; World Commission on Dams, 2000). These resettled communities receive forms of compensation to different extents, if any, and are forced to restore and restructure their livelihoods.

This study is based on the Nam Theun 2 Hydropower Project (NT2), located in the Southeast Asian country of Lao P.D.R., commonly known as Laos. The NT2 project is jointly implemented by the Government of Laos (GoL) and the Nam Theun 2 Power Company (NTPC). It has impacted a substantial number of people who were involuntarily relocated, many who were foraging nomads dependent on subsistence agriculture. As the NT2 drove regional economic growth and improved access to infrastructure, resettlers were encouraged by NTPC to shift from subsistence agriculture to the cash economy and to restructure their livelihood strategies accordingly. The regional economic growth and access to markets and infrastructure also led to the emergence of the rural nonfarm economy (RNFE) within the Nakai Plateau, which resettlers were encouraged to participate in as a means of establishing another income generating activity to diversify their livelihood strategy.

The RNFE has regularly been neglected by policy makers due to the prioritisation of the agricultural sector, which is perceived as crucial in enhancing the economic base of rural areas in developing countries. However, findings from an extensive collection of rural household surveys indicate that non-farm incomes are vital as they account for substantial share of rural incomes across the world (Haggblade et al, 2010). The growing amount of literature in regards to the RNFE reflects notions and opinions about the sector as being a potential alternative to agriculture in lifting the rural poor out of poverty (Haggblade et al, 2010).

1.1 Problem Formulation

The NT2 project afflicted the lives of a significant amount of people. To be specific, it impacted a total of 6738 people in 1298 households, excluding the people who were affected indirectly, usually in downstream areas (Souksavath & Nakayama, 2013). Six core ethnic-linguistic groups represent the ethnic assortment of the affected people of the NT2 project, although divisions between groups are vague. The Brou (40%), Tai Bo (40%), Upland Tai (11%), Vietic (6%), Lao (2%) and Sek (1%) epitomise the ethnic diversity of the resettled communities (Souksavath & Nakayama, 2013).

Depending on the level of impact, households were accordingly placed into categories that would provide a type of compensation. A compensation of housing and livelihood programme were given to those who were fully impacted, whereby 970 households were eligible (Souksavath & Nakayama, 2013). Partly affected households received one of the two, whereby 130 households were only qualified for the livelihood programme while 94 other households were only entitled to housing compensation (Souksavath & Nakayama, 2013).

It should be highlighted that resettled households were given a choice regarding the type of compensation they wanted, whereby most people chose the provision of land and house rather than monetary compensation (Souksavath & Nakayama, 2013). Furthermore, resettlers were given the option of relocation to areas outside the Nakai Plateau where there was the availability of good agricultural land. Nevertheless, all but six households desired to stay on the Nakai Plateau, as they wanted to remain close to their spiritual territories and former agricultural land and forests, despite the livelihood challenges that were to follow (NTPC, 2014).

The Resettlement Action Plan (RAP) of the NT2 project outlines the objectives, conditions and guidelines of the resettlement procedure. The RAP guarantees support for livelihood rehabilitation and restructuring, with the assurance that resettlers' livelihoods after relocation would be restored and improved compared to livelihoods prior to resettlement (Souksavath & Nakayama, 2013). Consequently, the NT2 project provided livelihood facilities and the development of infrastructure, including housing, schools, roads, health facilities, a village hall, agricultural land and water and electricity supply. In the case of losses in agricultural produce, such as fruit trees, the NTPC provided some cash compensation. In regards to the livelihood programme, focus was placed on 'the five pillars' that were seen as vital components to rural livelihoods, including agriculture, livestock, fishery, forestry and nonfarm activities.

These five components of the livelihood programme are perceived as essential in order to restructure the livelihoods of the resettlers. Prior to the resettlement, the affected people lived remotely and were subsistence farmers and foraging nomads often engaging in swidden agriculture (also known as slash-and-burn agriculture). Since moving to the resettlements in the Nakai plateau, they are no longer allowed to engage in swidden agriculture as restrictions on land and forests have been instituted and thus, they are forced into more intensive agriculture on small farmland plots. Furthermore, resettlers are no longer able to rely on agriculture as the foundation for their livelihoods to the extent they did prior to the resettlement, due to limited agricultural land and relatively poor soil quality. Instead, they are encouraged to diversify into other income-generating activities within the other four components of the livelihood programme. This study focuses upon the component of nonfarm activities within the livelihood programme. Nonfarm activities are particularly interesting, as most people affected by the NT2 did not incorporate such activities in their former livelihood strategy. The shift from subsistence agriculture to the cash economy implies that they must more frequently sell their agricultural surplus, but also that they might begin to engage in the rural nonfarm economy (RNFE) as a means of acquiring an additional income generating activity in order to diversify their livelihood strategy.

The RNFE is increasingly gaining more importance in its role as a potential pathway out of poverty for the rural poor. However, this is dependent on a variety of

factors, such as the economic setting of the RNFE and the dynamics of ‘pull’ and ‘push’ factors inducing households to diversify into rural nonfarm activities.

1.2 Aims and Research Questions

The research objectives of this study are twofold. The first objective is to describe and analyse the emergence and development of the RNFE in the Nakai Plateau throughout the resettlement process. Secondly, the study aims to analyse whether resettlers have been ‘pulled’ or ‘pushed’ into diversifying into the RNFE. In order to achieve the objectives of this study, the research questions that call for answers are as follows:

- How has the rural nonfarm economy developed in the Nakai Plateau throughout the resettlement process?
- In what ways have resettlers been ‘pulled’ or ‘pushed’ into diversifying into the rural nonfarm economy?

1.3 Delimitations

The study focuses on the resettled communities of the NT2 project and is chosen as it is perceived as a ‘critical case’ within the debate on sustainable hydropower, where the steps taken towards resettlement and livelihood rehabilitation of resettlers, outlined in the RAP, has been acclaimed worldwide. The geographical scope of this study is that of the resettlement area of the Nakai Plateau, where focus is placed on nine different hamlets. Moreover, although four different perspectives of the rural nonfarm economy are outlined in the conceptual framework in order to give a more comprehensive review of existing literature, the conceptual framework is primarily grounded in the literature on household livelihoods and diversification, with a focus on the pull and push factors within the rural nonfarm economy. The boundaries of the methodology encompass qualitative methods, as quantitative studies in regards to resettlers livelihoods have already been carried out. As such, the study is intended to complement already existing literature.

1.4 Thesis Outline

This thesis will proceed as follows: Section 2 will present the background, with a brief summary of the economic development of Laos, the NT2 project, the process of resettlement as well as the livelihood programme. The conceptual framework is presented in section 3, introducing the four main perspectives of the RNFE. It also comprises of a characterisation of the RNFE and the dynamics within, with particular focus on pull and push factors. The limitations and motivations of the rural poor will also be touched upon in section 3. Subsequently, section 4 outlines the methodology used within the case study as well as a concise description of the fieldwork, with an emphasis on the issue of positionality. The findings are thereafter presented, discussed and analysed in section 5. Finally, section 6 concludes with final remarks and suggestions on future research.

2 | BACKGROUND

The development of hydropower in the Mekong River basin is rapidly intensifying, as it is the favoured energy option for the riparian countries of the Mekong. Based on study results from the Mekong River Commission, the estimated potential of the Mekong River basin is approximately 53,000 megawatts (ICEM, 2010). This has activated a competition amongst investors in the countries of the Greater Mekong Subregion to take advantage of the potential. The race for the increased use of water resources is clearly evident as there has already been the proposed construction of over 200 dams in the Mekong River and its tributaries (Souksavath & Nakayama, 2013). Out of these, more than seventy dams and sixty hydropower projects have been proposed in Laos (Souksavath & Nakayama, 2013). The hydropower boom is also reflected in the use of narratives to support these investments, where the GoL has proclaimed that it aims to become the “battery of South East Asia” and be at the forefront of hydropower development (International Rivers, 2008).

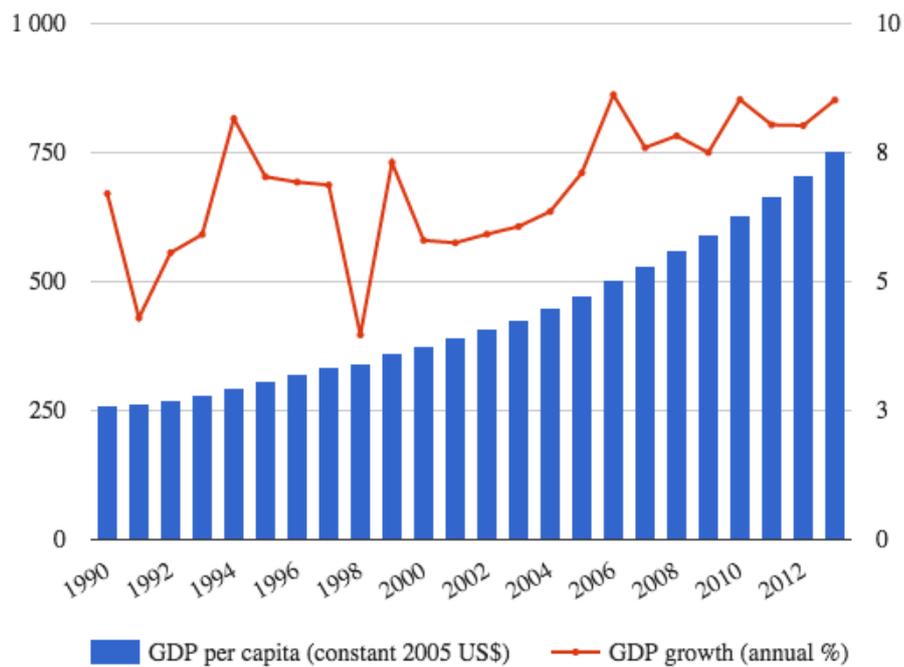
2.1 From Asia’s Littlest Dragon to the Battery of Southeast Asia

Laos is a landlocked, Southeast Asian country bordering Thailand, Myanmar, China, Vietnam and Cambodia. As a consequence of several years of inward-looking policies based on the central planning system as well as conflict, Laos continued to be isolated and poor throughout the 1970s and the early 1980s (Menon & Warr, 2013). Nonetheless, the government began to decentralise control in 1986, where market-oriented reforms were initiated, integrating exchange rates, encouraging private enterprise in manufacturing and agriculture, increasing foreign and interprovincial trade, and eliminating price controls (Menon & Warr, 2013). Through a legislative program supporting the base for private sector development and market-based policies, structural reforms persisted into the 1990s.

In 1992, ranking as one of the ten poorest countries in the world, Laos was labelled as ‘Asia’s littlest dragon’ (Flipse, 1992). The early reforms towards market liberalisation achieved notable outcomes, generating about 6.4% per year in gross domestic product (GDP) growth from 1990-1997 (Menon & Warr, 2013). The economic growth was however impeded by the Asian Financial Crisis, where foreign investment plummeted drastically as economists and donors maintained that the

government was unable to successfully manage the national economy and to convert foreign aid into relevant development outcomes (Singh, 2009). Despite the contraction in economic growth in 1998, the economy recovered the subsequent year, as can be seen in Figure 2.1, which depicts the GDP growth and GDP per capita in Laos from 1990 to 2013 (World Bank, 2015). Although Laos is still categorised by the United Nations as a least-developed country, the per capita annual income has risen from US\$227 in 1990 to US\$592 in 2011, due to the sustained growth averaging at approximately 7% per year (Menon & Warr, 2013, World Bank, 2015).

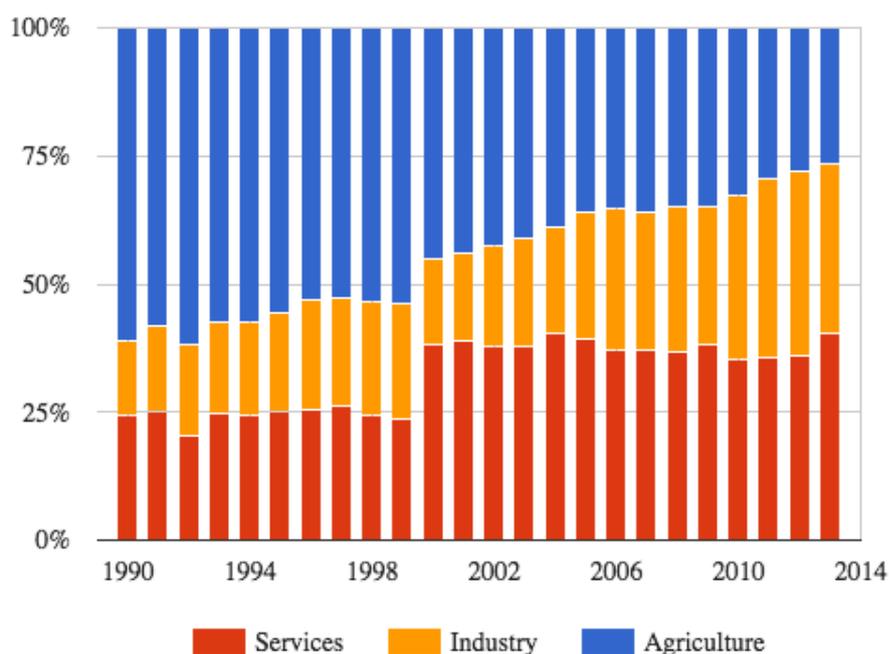
Figure 2.1 GDP Growth and GDP per capita of Laos



Source: Author's calculations using data from the World Bank, 2015

Coinciding with this growth was been a shift away from the agricultural sector, which in 1990 accounted for roughly 60% of value added and approximately 45% in 2000 (Menon & Warr, 2013). In 2013, the share of agriculture had decreased to approximately 27%, a smaller share to that of both services and industry. Figure 2.2 portrays the structural transformation between the sectors of agriculture, industry and services in the Lao economy (World Bank, 2015). In spite of that, income from agriculture still provides the livelihoods of about 80% of the population, which is primarily subsistence-based (European Union, 2007).

Figure 2.2. Sectoral Value Added (% of GDP)



Source. Author's calculations using data from the World Bank, 2015

The growing significance of industry for the Lao economy was firstly sparked by a growth in manufacturing, yet non-manufacturing industries constituted the majority of the industry's value-added by 2000 (Menon & Warr, 2013). Resource-based output as a share of GDP increased rapidly from 5.5% in 1999 to over 27% in 2011, primarily driven by investments in hydropower and exports of electricity and minerals (Asian Development Bank, 2011). Clearly linked to the aspiration of becoming the “battery of Southeast Asia” is the Lao government's ambition to advance from the status as a least-developed country by 2020 (International Rivers, 2008; Singh, 2009).

The opening of the country to foreign investments and institutional reforms was clearly encouraged by international financial institutions (IFIs), such as the World Bank and, International Monetary Fund and the Asian Development Bank (ADB), whom are also involved in the financing, planning and facilitation of hydropower projects within the country (Singh, 2009). One of the most prominent examples of hydropower development championed by these two IFIs is the Nam Theun 2 (NT2) hydropower project.

2.2 The Nam Theun 2 Hydropower Project

The NT2 is a trans-basin diversion power plant located in Khammouane and Bolikhamxay province in central Laos, whereby the water from the Nam Theun River is used and released into the Xe Bang Fai River, both tributaries of the Mekong River (World Bank, 2012). The project site stretches from the Nakai Plateau to the lower Xe Bang Fai River confluence with the Mekong River.

The NT2 is the largest energy project development in Laos with a cost of USD 1.45 billion and is jointly implemented by the GoL and the NTPC, a consortium lead by Electricité de France International (World Bank, 2012). Other shareholders consist of Ital-Thai Development with a 15% stake and EGCO with a 25% stake. In 2005, the ADB and the World Bank approved loans and guarantees for the NT2 project with a total of US\$107 million and US\$270 million respectively (International Rivers, 2008). With the endorsement from ABD and the World Bank, other lenders committed to finance the NT2. Financed by 27 parties, these include the Nordic Investment Bank, the European Investment Bank, Agence Française de Développement (AFD), the French, Swedish, Norwegian and Thai export credit agencies as well as a number of private banks (International Rivers, 2008).

The NT2 is expected to generate 1070 megawatts in electrical energy, whereby the main portion (93%) will be exported to the Electricity Generating Authority of Thailand, whilst the remaining will be used for domestic consumption in Laos (World Bank, 2012). Moreover, the NT2 project is anticipated to generate an estimated revenue of USD1.9 billion for the government during the course of the 25-year project concession period (Souksavath & Nakayama, 2013). This domestic financial resource is planned to serve as means of economic distribution towards reaching overall policies, such as poverty alleviation and environmental management (World Bank, 2012). In other words, the argument that the revenue generated will be a vital component in the early stages lifting Laos out of poverty has been used as a justification for the project's implementation.

It is important to note the important role of IFIs, especially the World Bank in promoting the NT2 project as “it signals the World Bank’s re-engagement with large-scale infrastructure development following a decade-long hiatus” (Singh, 2009). The NT2 is recognised as the flagship project intending to demonstrate the World Bank’s pledge to environmentally and socially responsible development. In that sense, the

World Bank aims to gain their legitimacy after the dam controversies of the 90s as well as trying to make the NT2 project a global model for large-scale hydropower development that could be applicable to other regions of the world (Singh, 2009).

Since the beginning, the NT2 has also faced scrutiny and criticism from civil society and international non-governmental organisations, such as International Rivers (Mirumachi & Torriti, 2012). Concerns that were raised varied from the likelihood of environmental to the socioeconomic impacts of the NT2 project. Various environmental concerns included the project's consequences on water quality, sedimentation, and erosion that could lead to impacting socioeconomic conditions such as impairing fisheries and drinking water (Mirumachi & Torriti, 2012). Other socioeconomic factors that would be affected due to resettlement were also questioned, as well as the methods for compensation for the affected people of the NT2 project (Mirumachi & Torriti, 2012).

2.3 The Process of Resettlement and the Resettlement Action Plan

In compliance with the concession agreement, the NT2 project aims to address and mitigate the impacts of the project on the local population and the surrounding ecosystem (NTPC, 2005). In the aim to exhibit responsible development, the Social Development Plan and the Environment Assessment and Management Plan were planned in accordance with international social and environmental safeguard standards (NTPC, 2005). These standards were primarily necessary to incorporate in order to be seen as legitimate and to fulfil the conditions of the ADB and the World Bank whose support was essential in instigating the project (Singh, 2009). The process of resettlement comprised of three broad, albeit somewhat overlapping phases: the consultation, design and planning phase; the physical relocation; the livelihood development (World Bank, 2012).

The first phase started in 1996 with consultations and planning procedures, whereby the initial research was conducted on livelihoods and cultural patterns, farming systems and baseline studies (NTPC, 2014). The consultation process resulted in the drafting of the Social Development Plan, officially approved in 2005 by the GoL (NTPC, 2014). In 2004, the physical relocation was first commenced with a pilot village. In 2006, the first batch of nine villages was moved into temporary settlements for safety purposes, as there was the risk of backwater effects generated

by the cofferdam (NTPC, 2014). During the dry season of 2007/2008, the second group of villages was relocated and by May 2008, all 16 villages were relocated to their new locations on the Nakai Plateau (NTPC, 2014). Coinciding with the relocation phase was the process of livelihood development as resettlers were allocated land and gardens, which they began to develop (NTPC, 2014). Following the impoundment in June 2008, new skills in regards to livelihood rehabilitation and restructuring were developed in regards to reservoir fisheries. Provided by the NTPC and the government staff, resettlers received technical assistance and existing skills within livestock and agriculture were further improved (NTPC, 2014).

The Social Development Plan and the Resettlement Action Plan (RAP) aims to support resettled households towards mitigation and development prospects in re-establishing their livelihoods in a sustainable manner and to attain consumption and income levels higher than those prior to the NT2 project (Porter & Shivakumar, 2011; NTPC, 2004). The NT2 project has provided technical assistance, safety nets for vulnerable groups, a mixture of assets as well as adapting the livelihood programme and established independent and external monitoring towards the goals of the concession agreement (NTPC, 2004). The multi-sectorial approach to the RAP consists of five components in restoring sustainable livelihood, also known as the 'pillars'. These five pillars of the livelihood programme are centred on agriculture, fishery, livestock, forestry including non-timber forest products (NTPFs) and nonfarm activities (NTPC, 2014). Based on the availability of labour, skills, preferences, experiences and interest, each resettled household decided on the combination of livelihood activities within the five pillars they would prefer to participate in (NTPC, 2014). Below is a brief description of the objectives and activities promoted within the four pillars of agriculture, fishery, forestry and livestock in order to gain a more comprehensive portrayal of the livelihood programme conducted by NTPC. The pillar of nonfarm activities will be later discussed in the findings of the study.

In regards to the agricultural component within NTPC's livelihood programme, the objectives are to support the use of arable land for the most productive purposes within reach and to increase the agricultural productivity (NTPC, 2014). Free or subsidized fertilizer, farming tools and improved crop varieties have been distributed and set up in each village are agricultural demonstration plots (NTPC, 2014). The recommended system is centred on rotational cropping and emphasizes the use of simple technology to support integrated agriculture consisting

of fruit plantations, vegetable gardening and agro-forestry on the 0.66ha farming plots allocated to each household (NTPC, 2014). Moreover, the access to water for agricultural purposes has been fostered, including the construction of gully dams and irrigation systems as well as the restoration of some riverbank gardens at higher levels of the reservoir (NTPC, 2014).

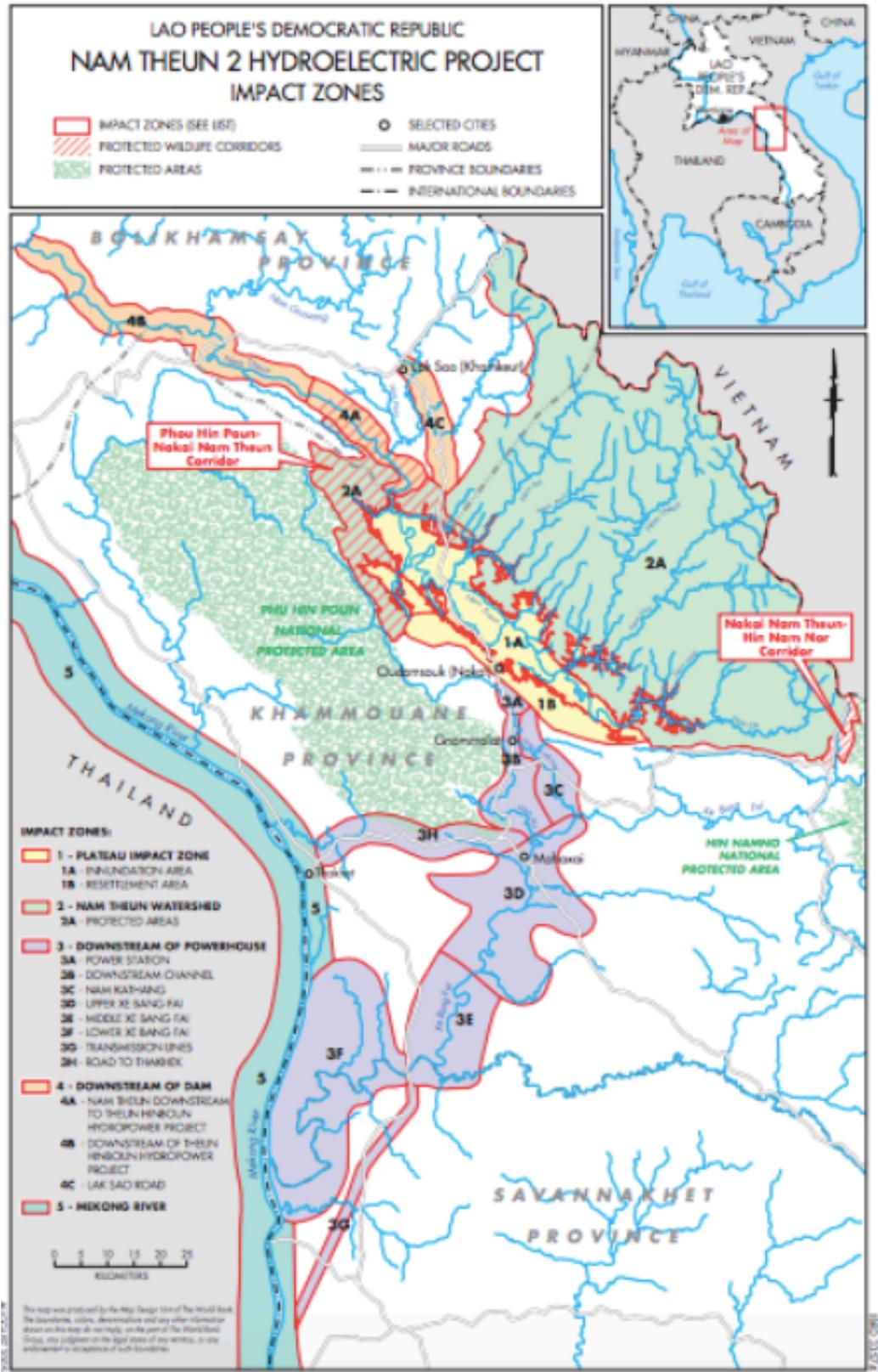
Fishery as a component in resettlers livelihoods has also been supported by NTPC. The livelihood programme has founded the provision of fishing gear, boats and training opportunities regarding fish processing. Approximately 5% of the caught fish is processed, typically as dried fish or padek, traditional Lao fermented fish (NTPC, 2014). The fish is sold when newly caught at the boat landings to traders coming from urban centres, especially from Lak Sao and Thakhek, but even from as far away as Xieng Khuong and Vientiane (NTPC, 2014).

Forestry is the third important pillar within the livelihood programme. The forest resources within the resettlement area are exclusively for the benefit and use of resettlers for the coming seventy years, following the establishment of the Village Forestry Association (VFA) (NTPC, 2014). The first objective of the VFA is to uphold the sustainable management of more than 17,500 hectares of forests surrounding the resettled villages. The other objectives are to provide dividends and opportunities for employment to the 6,289 resettlers who are shareholders in the VFA (NTPC, 2014). In 2010, dividends totalled US\$150,000, which is approximately equivalent to US\$155 per household. This increased to a total of US\$200,000 in 2011 and 2012 (NTPC, 2014).

The component of livestock also plays an integral role in of the livelihood programme. Statistics on livestock illustrate the gradual replacement of buffalo by cattle, which reproduce more regularly and use less grazing land per unit. It furthermore seems to be an inclination towards more intensive raising methods for large livestock (NTPC, 2014). Encouragement is also placed on the move towards greater reliance on smaller livestock, such as ducks, chickens and pigs as they are more easily marketable in small quantities and are more suitable to the conditions of the Nakai Plateau. “Suitable breeds of smaller livestock have already been distributed to interested resettlers, and some households have been keen to take up this opportunity” (NTPC, 2014:24). This can be observed by the number of pigs, which have moderately, but continuously increased since the beginning of resettlement (NTPC, 2014).

Below is a map of the impact zones of the NT2 project, whereby this study is based on 1B of the Plateau Impact Zone marked with the yellow colour.

Figure 2.3 Map of Nam Theun 2



3 | CONCEPTUAL FRAMEWORK

Historically, agriculture has played a significant role in enhancing the economic base of rural areas in most developing countries. However, the role of RNFE, previously neglected by policy makers, is presently receiving more attention as it is thought to be a potential alternative to agriculture in generating rural income growth (Barret et al, 2001). The conceptual framework of this study defines the RNFE as consisting of all economic activities other than the production of primary agricultural commodities. Nonfarm activities thus include manufacturing, mining, agro-processing, utilities, commerce, transport, construction and a range of financial, governmental and personal services (Haggblade et al, 2010). However, the categorisation of income transfers and migrant remittances is more ambiguous, but this study will follow the standardisation whereby transfers by government, relatives or former household members are classified as transfer income (Haggblade et al, 2010). Rural nonfarm income, on the other hand, includes earnings from commuting or seasonal and temporary migration by members of the family who continue to be part of the rural household (Haggblade et al, 2010).

The prominent diversity within the RNFE, with activities ranging from home-based cottage industries to advanced multinational agribusiness firms, has attracted an extensive array of analytical and disciplinary perspectives aspiring to explore the potential of the RNFE in lifting the rural poor out of poverty. From this mounting interest, four different perspectives have shaped the emergence of four interrelated literatures examining in the RNFE (Haggblade, 2007). The first three perspectives will be briefly touched upon before focus is placed on the fourth perspective of households livelihoods, which is the perspective this study is grounded in.

3.1 The View from the Farm - Agricultural Growth Linkages

During the 1950s and 1960s, a pervasive antiagricultural bias seeped into the field of development as the West promoted industrial fundamentalism to newly emerging governments in developing countries (Mellor, 1998). Mainstream thinking assumed that the fast track to economic growth was through enhancing the manufacturing sector due to higher productivity, growing market demand and superior growth-enhancing linkages with other sectors (Haggblade, 2007).

During the early 1970s, a mounting concern regarding rural poverty overlapped with the early successes of the Asian green revolution. Furthermore, from an equity perspective, industrial growth was recognized as unreliable as its benefits had spread unevenly and had not trickled down (Staatz & Eicher, 1998). Encouraged, agriculturalists presented literature on agricultural growth linkages, where the significance of the RNFE was first recognised (Haggblade, 2007). Furthermore, it advanced the notion of agriculture as a constraint to industrial-led growth to the notion that agriculture itself could serve as the engine of economic growth (Timmer, 1998). The shift of attention to agriculture also radically shifted development priorities as Western donors began to concentrate on rural development, income distribution, equity and employment (Staatz & Eicher, 1998).

In regards to the RNFE, this perspective views rural nonfarm activities mainly as a demand-driven by-product of agricultural growth. Through labour, input supply, financing, processing, and marketing, these significant reverse flows support the RNFE in accelerating and strengthening the equity of technologically induced agricultural income growth (Haggblade, 2007).

3.2 The View from the Firm - Rural Nonfarm Employment

In comparison, the literature on rural nonfarm employment focuses on individual nonfarm enterprises and supply chains, rather than the sector of agriculture, although they view it as the prevailing, albeit not the sole source of rural demand (Haggblade, 2007). The substantial literature on rural nonfarm employment emerging since the 1970s shed light on the modest capital prerequisites, the labour intensity and the small size of rural nonfarm activities (Lanjouw, 2007). These positive aspects stimulated interest in promoting rural nonfarm activities as they were seen as potentially equity-enhancing pursuits (Lanjouw, 2007).

As the promotion of entrepreneurship and small enterprises grew, two prevalent views of the 1950s and 1960s opposed these initial small enterprise pursuits. First was the mainstream perception that bigger is better, whereby small enterprises were held to be inefficient, primitive and backward by industrial planners (Hoselitz, 1959). Moreover, the second belief viewed rural nonfarm goods and services as inferior (Hymer & Resnick, 1969). It was assumed that as rural incomes increased, consumers would without hesitation favour imported manufactured products over

low-quality rural nonfarm alternatives (Mellor, 1998). Supposedly hampered on both the supply side due to inefficient technology and the demand side due to diminishing demand, the RNFE had to prove itself worthy of promotion. Hence, empirical work was conducted, studying not only the basic characteristics of the RNFE including its size, composition and income distribution but also the efficiency in production of small firms and the consumption preferences in relation to rural nonfarm goods and services (Haggblade, 2007).

In the early stages, concerned about the potential trade-offs between efficiency and equity, and growth and employment, the issue of efficiency sparked extensive debate. As a result of this debate and empirical exploration, a new orthodoxy sprung forth, summarised in White's review (1978). To begin with, small-scale and intermediate technologies are nearly always technically efficient. "That is, with the same capital-labour combination, no other technology can produce greater output" (Haggblade, 2007:37). Furthermore, "when inputs are priced at their opportunity cost, many labour-intensive or intermediate technologies are economically efficient, that is, lowest-cost producers, particularly in consumer goods industries and in low-wage countries" (Haggblade, 2007:37). Based on the empirical evidence, small-scale enterprises can be economically efficient within a wide-ranging variety of activities and countries (White, 1978). Likewise, found to be conclusive was the dispute over consumption preferences. A study of household survey data repeatedly discards the assumption of inferior nonfarm goods and services, whereby all empirical work reported positive income elasticities (Haggblade, 2007). While the demand elasticity for imported manufactures is typically higher, cottage manufactures generally attract the lowest income elasticities of demand. The highest income elasticities are often attributed to commerce and services, including health, education, transport and ceremonial services (Hazell & Roell, 1983; Hossain, 2004). As such, an increase in agricultural income will result in increased expenditure on rural nonfarm output, especially in services and commerce.

The literature on rural nonfarm employment has illustrated a comprehensive portrayal of the RNFE. The literature acknowledges and sheds light on the factors that can influence the supply chain of nonfarm goods and service such as rural infrastructure, technical efficiency, entrepreneurship, education, and access to credit (Reardon et al, 2001). Furthermore, it has highlighted the various motors of change within the RNFE, from agriculture to population growth to mining, tourism and

urban-led urban-to-rural subcontracting (Reardon et al, 2001). Also discussing the spatial implications of the RNFE and its growth, these observations found a group of kindred scholars in the regional development branch of the rural linkages literature.

3.3 The Spatial Perspective - Regional Development

In the 1950s and 1960s, spatial thinking was dominated by the concept of urban growth poles. Through forward and backward production linkages, it was anticipated that economic growth concentrated in a given position would spread to the surrounding hinterlands (Renkow, 2007). The economic growth that was expected to drive these growth poles would be based on urban-based, large-scale manufacturing (Renkow, 2007). It was thought that economic growth from the growth poles would trickle down and dominate backwash effects, whereby benefits would spread to surrounding regions (Renkow, 2007). However, after several decades of urban-based industrial promotion, there was a backlash as rural poverty prevailed within the surrounding areas of highly localised pockets of economic growth and modernity (Haggblade, 2007). As such, in the 1970s, regional planning was reconsidered, where rural reorientation shifted from urban to rural and focused on equity.

Fundamental to the pursuit of alleviating poverty and promoting equity was the focus on the geographic distribution of basic services since the majority of the world's poor lived in rural regions (Haggblade, 2007). Similarly, regional development itself was considered to play a role in economic growth. As agriculture took centre stage, it became recognised that critical inputs, such as infrastructure, marketing, credit, processing, input supply and other agricultural services, were necessary for lubricating the engine of agriculture (Renkow, 2007). Therefore, it was acknowledged that nonfarm support services and a network of rural towns and markets were significant components in supporting both the growing agriculture-led economic growth and the regional equity (Renkow, 2007).

The role of rural towns in rural development has however been contested. It is argued that the development of rural towns and agricultural growth are mutually beneficial because the demand for nonfarm output is stimulated by agricultural growth, which are often supplied from centralised locations in rural towns to dispersed farms in the hinterland (Renkow, 2007). Subsequently, the accessibility of nonfarm inputs and services accelerates the growth in agriculture and diversification

(Renkow, 2007). However, others would claim otherwise, arguing that rural towns pose negative effects on the surrounding hinterland and agricultural growth. It is maintained that the economic flow between rural towns and farms is primarily a one-way process, extracting the resources from the hinterland (Haggblade, 2007). In such a case, ‘polarisation’ and ‘backwash’ effects are claimed to dominate, where hinterlands are drained rather than stimulated by rural towns (Myrdal, 1957; Hirschman, 1958).

Disentangling this debate and contributing with an important perspective are anthropologists who have studied spatial characteristics of rural marketing systems, which reflect prevailing social relations (Haggblade, 2007). In egalitarian situations where income and land are uniformly spread across households, markets are often consistently dispersed throughout space. In such a setting, there is no surplus extraction or unfair bargaining leverage since it results in substantial interaction and competition between and within rural markets (Haggblade, 2007). However, in settings with significant disproportions in wealth and assets, it leads to traders controlling transport, licences and commodity flows and to owners of large plantations (Haggblade, 2007). Such a top-heavy marketing system enables the transfer of resources from farmers to towns, as there is insufficient competition and interaction amongst rural markets. As such, this indicates that towns and cities are not fundamentally exploitative as it depends on the allocation of land and resources in rural areas (Haggblade, 2007).

3.4 The View from the Home - Household Livelihoods

From the four differing perceptions of the RNFE, this study focuses primarily on the literature on household livelihoods in regards to rural nonfarm activities. Most rural households are diversified, engaging in both agricultural and nonfarm activities. This perspective views households as “the key decisionmaking unit owning and allocating productive assets – such as land, entrepreneurial and management skills, labour, and capital – across economic activities” (Haggblade, 2007: 42). Therefore, a complex set of criteria, examining the risks and diversification priorities, determine the dynamics of rural nonfarm labour allocations and output supply. The factors of livelihood diversification can be classified into two general scenarios, namely the ‘pull’ scenario and the ‘push’ scenario (Reardon et al, 2001). These two scenarios will be discussed

below, but first, a brief characterisation of the RNFE, grounded on the four alternative perspectives, will be presented to give a more comprehensive picture of the RNFE.

3.5 Characterising the Rural Nonfarm Economy

To begin with, it is important to shed light on some of the characteristics of the RNFE, in regards to its size, composition and effects on equity. Firstly, the size of the RNFE can be grasped by studying the data on primary employment as it is the most broadly available indicator of the scale of rural nonfarm activities. Primary employment data estimates that “the RNFE accounts for about 30% of full-time rural employment in Asia and Latin America, 20% in West Asia and North Africa, and 10% in Africa” (Haggblade et al, 2010). Furthermore, the inclusion of rural towns increases nonfarm employment shares by another 10-15% as rural towns often depend on the rural hinterlands for markets and inputs (Hazell & Haggblade, 1993). Nonetheless, this is typically only a measure of primary occupations and thus it devalues the significance of the RNFE since secondary and seasonal activities are not taken into account (Liedholm, 1998). Income data can therefore portray a more comprehensive depiction of the size of the RNFE as it includes income generated from part-time and seasonal activities. Findings from an extensive collection of rural household surveys indicates that nonfarm incomes account for approximately 50% of rural income in Asia and Latin America and roughly 35% of rural income in Africa (Haggblade et al, 2010). Being nearly 20% higher than the employment data, it recognises the importance of seasonal and part-time nonfarm activities to rural livelihoods.

In regards to composition, the RNFE composes of a greatly heterogeneous assortment of agro-processing, commercial, manufacturing, trading and service activities. Strong differences emerge depending on location, labour supply, infrastructure, culture and natural resource endowments (Ferreira and Lanjouw, 2001). As rural nonfarm activities are often seasonal, they also fluctuate with the availability of agricultural raw goods and in pace with financial flows between farm and nonfarm activities and household labour (Liedholm, 1998). The composition of the RNFE in regards to sectors is typically composed of construction, transport, trade and other services accounting for 75-80% of rural non-farm employment whilst manufacturing accounts for approximately 20-25% (Haggblade et al, 2010). The

composition of the RNFE varies spatially as well, where there is a growing prevalence of services, trade and factory manufacturing in towns and urban centres whilst more rural areas are dominated by home-based cottage industries (Renkow, 2007).

The great diversity within the RNFE leads to a divergence in profitability and productivity between different rural nonfarm activities. Due to dissimilar human and physical capital requirements, returns vary significantly. For example, white-collar jobs within education, healthcare, administration and accounting are rural non-farm activities, which are prevalent amongst households of higher incomes and levels of education (Lanjouw & Shariff, 2004). In comparison, poorer households partake in low-return activities such as small-scale trading and unskilled wage labour within transportation, construction and other services. Women also engage in low-return activities, primarily in low-return cottage industries (Hossain, 1984). Due to the small-scale and the low capital requirements of numerous rural nonfarm activities, there are substantial fragments of the RNFE that are dominated by the households of the rural poor (Haggblade et al, 2010). As such, the RNFE has been given more attention within policy-making as it is seen as having an important role in poverty reduction and equity.

On the other hand, others argue that promoting the RNFE ought not to be a cure-all for rural poverty and equity. It is emphasised that diversification into low-return, labour-intensive rural nonfarm activities may be an indication of 'distress' diversification and a lack of more productive opportunities within the RNFE, given that low capital requirements commonly converts into low returns to labour and low productivity (Hossain, 1984; Islam, 1987). Furthermore, the overall impact of nonfarm earnings on rural income distribution remains mixed, whereby aggregate nonfarm income has been shown to improve equity across households, yet in some cases, to aggravate inequality between rural households (Haggblade et al, 2010).

3.6 Dynamics of the Rural Nonfarm Economy

Agriculture undoubtedly plays an essential role in influencing the size and structure of the RNFE, particularly in the early stages, as it is the largest income generator and the largest employer in rural regions as well as being the foremost supplier of raw materials (Haggblade et al, 2010). Therefore, the manner in which rural development

unfolds typically commences with a population of predominantly agricultural households producing the majority of the goods and services they themselves need (Haggblade et al, 2010). Due to subsistence agriculture, restricted infrastructure and prevailing low-input farm technologies, the level of trade and commerce remains limited in these rural areas (Haggblade et al, 2010). In rural areas of rapidly increasing agricultural productivity, the patterns and composition of growth within the RNFE diverge distinctly from those of more stagnant agricultural areas. Thus, it is important to examine and differentiate between these two contrasting settings and the processes and effects operating within them respectively.

3.6.1 The “Pull” Scenario

Within a ‘pull’ scenario, as a result of a growing availability of new agricultural technologies and farm in-puts, there are increased agricultural surpluses in certain goods and improved prospects for trade. In such an environment, a flourishing agriculture may activate growth of the RNFE through a number of important linkages (Reardon et al, 2007). Similar dynamism can also be created in regions where mining and tourism act as the growth motor.

To begin with, increased labour productivity on the farm increases per capita food supplies, whereby members of the family are released from farm activities and are able to partake in non-farm activities instead. Furthermore, increases in farm income may eventually result in enough available capital for investment in nonfarm activities (Reardon et al, 2007). As farm households seek agricultural inputs and services for their new and modern agricultural technologies, such as fertilizers, seeds, and machinery, the demand grows for nonfarm businesses that can provide such goods and services (Reardon et al, 2007). The demand for nonfarm goods and services, including clothing, healthcare, and housing also raises since farm households, with rising incomes, subsequently increase their expenditure share on non-food items (Reardon et al, 2007).

As a result, rural households begin to diversify into nonfarm activities to meet the emergent demand. Some part-time non-farm activities that were primarily undertaken for self-consumption may evolve into full-time commercial activities (Haggblade et al, 2010). The foremost trend is however that household manufacturing usually diminishes as the labour-intensive household manufacturing of pottery, roof

thatching and baskets are substituted by cheaper import alternatives (Haggblade, 2007). The increase in real wages also increases the opportunity cost of labour, whereby households switch from low-return nonfarm activities to higher-return nonfarm activities such as commerce, transport, mechanical milling and educational services (Reardon et al, 2007). There is thus more growth in the employment within commerce and services rather than in manufacturing.

Migration and rural-to-urban commuting becomes more prevalent as towns grow bigger and attract labourers from the rural hinterland. Thus, there is a decline in the share of agriculture to the total labour force, although absolute levels of agricultural employment and output may grow for a short period of time (Haggblade, 2007). As a result, the role of agriculture as the economic motor for the regional economy becomes less important over time.

In such a dynamic agricultural setting, the rural poor are benefitted indirectly since the increased rate of rural wages for unskilled labour undoubtedly is to the advantage of the poor (Reardon et al, 2007). The rural poor are also benefitted directly as rising consumer demand leads to better prospects for self-employment, especially within trade and commerce.

3.6.2 The “Push” Scenario

Growth of the RNFE unfolds differently, on the other hand, in regions with a stagnant economic base. Where income growth in agriculture is sluggish, it results in limited agricultural input requirements and agro-processing, weak consumer demand and stagnant wages (Reardon et al, 2007). The combination of these inclinations impedes opportunities for employment and entrepreneurship in the RNFE.

In such a setting, the availability of land diminishes as population growth is persistent. Consequently, soil fertility, without careful land management, may also diminish over time. (Haggblade, 2007) The lack of new agricultural technologies leads to a fall in per capita farm production and labour productivity. As such, there is a growth in landlessness, whereby the workforce is gradually pushed into the RNFE in order to find other opportunities (Reardon et al, 2007). Rural households begin to diversify into low-return, labour-intensive non-farm activities, such as pottery, basketry, weaving, and mat-making due to the low opportunity cost of labour, the decrease in agricultural labour productivity, and the diminishing household

purchasing power (Haggblade et al, 2010). Such a specialized diversification is however not in the pursuit of utilizing prospective productivity gains but rather due to the shortage of savings and investible capital and the lack of agricultural opportunities (Reardon et al, 2007).

In stagnant agricultural areas, the growth in migration is evident as the labour force migrates in the search of better economic prospects. As such, the role of migration is highly important as it functions as a regional safety valve for the rural poor who seek agricultural and nonfarm opportunities elsewhere (Haggblade et al, 2010). Instead of becoming a hub for aiding agricultural advance, rural towns develop into an evacuation site for rural workers and for selling labour-intensive nonfarm goods (Haggblade et al, 2010). In stagnant agricultural regions, the rural poor face weakened prospects for both wage earnings and entrepreneurship as consumer demand is sluggish and wage rates are falling (Reardon et al, 2007). Therefore, the potential for the development of the RNFE in such a setting remain unpromising.

3.7 The Motivations and Limitations for the Rural Poor

In this study, livelihood diversification is defined “as the process by which rural families construct a diverse portfolio of activities and social support capabilities in their struggle for survival and in order to improve their standards of living” (Ellis, 1998). As such, the main motivations for livelihood diversification into the RNFE is primarily to increase household incomes, to lower income variability, to minimize risks, or as an compulsory response to cope with shocks and crises, such as periods of drought. As such, earnings from non-farm activities function as a vital safety net for many rural households (Haggblade et al, 2010). Nonfarm income also contributes as a significant source of liquidity for funding the procurement of various goods and services needed for raising agricultural productivity, such as fertilizer and seeds, particularly, as a result of irregular seasonal cash flows in agriculture and poor credit markets in rural areas . Furthermore, more light has been shed on the role nonfarm earnings plays in safeguarding food security. As earnings from nonfarm activities assist to finance procured goods and on-farm investments, they assist in attaining food security, both directly and indirectly as it allows the rural poor to buy food and to buy essential agricultural inputs in order to raise food production (Haggblade et al, 2010).

Nevertheless, the pursuit of participating in the RNFE is limited due to the lack of human, physical and financial assets held by rural households. Consequently, there is a divergence between poorer and richer households in rural areas. Wealthier households thus dominate the more profitable nonfarm activities whilst poorer households tend to only have access to partake in low-productivity segments of the RNFE (Haggblade et al, 2010). Furthermore, the factors of caste, social status and gender can in some cases impede the access to the most lucrative activities within the RNFE. Due to the caste and social restrictions as well as the constraints on mobility faced by women with child-rearing responsibilities, the rural poor are forced into traditionally reserved, low-productivity, labour-intensive nonfarm activities that are often home-based, such as basketry, weaving, pottery and silk rearing (Haggblade et al, 2010). As a result of discrimination, constraints on physical and occupational mobility and a lack of assets, the most marginalised and poor groups in rural areas are restricted from participating in the most productive and profitable activities of the RNFE (Haggblade et al, 2010).

4 | METHODOLOGY

This study follows the structure of a case study. The researcher considers a case study to be the most suitable strategy as it “aims to understand the case in depth, and in its natural setting, recognizing its complexity and its context” (Punch, 2005:144), thus approaching the study with a holistic focus. Consequently, it complements the research objectives appropriately as it aims to study the particular case of a group of people, namely the resettlers of the NT2 project and their livelihood in a specific context, namely the resettlement area within the Nakai Plateau. The methodology of this case study is based on secondary data from a literature review as well as qualitative research methods, whereby semi-structured interviews were used to collect primary data throughout a field study in the NT2 project site.

Qualitative research has often been criticised for its limited scope in producing generalisations. Nonetheless, the purpose of this study is to grasp an in-depth understanding of the attitudes and behaviours of people in a specific context, based on the perceptions of the participants as this is where the knowledge gap is considered to be (Bryman, 2008). Numerous quantitative studies in regards to resettlers’ livelihoods has already been conducted and continues to be, due to the monitoring procedure approved in NT2’s concession agreement. As such, the intentions of the case study are to complement already available quantitative information and to contribute to the evaluation of nonfarm activities as a component within the livelihood programme, which tends to be generally overlooked.

Nevertheless, Mikkelsen maintains that “the ‘generalizability’ of case studies can be increased by strategic selection of critical cases” (2005:92). Critical cases are defined as holding strategic importance connected to the general problem and are capable of revealing more information than a random or representative case (Mikkelsen, 2005). Although the NT2 project might not hold strategic importance in regards to the RNFE, it is highly significant in the debate on sustainable hydropower development as it is seen as a flagship intervention, exemplifying environmentally and socially responsible development within large-scale infrastructure. The worldwide praise of the RAP and livelihood programme of the NT2 thus triggered curiosity as to how successful it actually is in assisting resettled households adapt and cope to new livelihood conditions, based on the perceptions of the resettlers themselves.

4.1 Literature Review

To begin with, this study utilises secondary data from a literature review of the resettlement process and the livelihood conditions of resettlers, which assists in forming the foundation of the study. It is based on the work of various NT2 monitoring groups, reports from NGOs, such as the International Rivers Group, and from data collected by the NTPC's Nakai Resettlement Office. Moreover, the research focuses on the reports of the one of the independent expert panels of the NT2 project, namely the International Environmental and Social Panel of Experts (POE). The collection of these independent reports has highlighted the foremost weaknesses and strengths of the resettlement programmes. Additionally, a review was also carried out in regards to the literature on the RNFE.

4.2 Selection of Field Site

To begin with, the field site of this case study is that of the resettlement area in the Nakai Plateau, which consists of 10 villages and can also be categorised as 16 hamlets. A hamlet is a small settlement, and is generally smaller than a village. Due to bureaucratic reasons, some hamlets have been grouped together in order to create a larger village. Focus was however placed on hamlets rather than villages because hamlets within a village can differ in geography, ethnicity and level of development.

The case study focuses on nine different hamlets within the resettlement area; three being less developed, three being more developed and three in the medium spectrum. This categorisation of a hamlet's level of development has been carried out by NTPC from extensive research and monitoring, including household surveys (NTPC, 2014). The hamlets were also sampled based on their geographical position in the Nakai Plateau, including hamlets from both the south and the north in order to uphold more representativeness in regards to particular factors, such as different ethnic minorities and natural resource endowments.

4.3 Sampling

Interviews are comprised of three different groups of individuals, namely resettlers, resettlers who have recently completed vocational training and experts involved in the NT2 project. Within each hamlet, five resettlers participated in the semi-structured

interviews, totalling to the sum of forty-five semi-structured interviews. Furthermore, another seven semi-structured interviews were conducted, consisting of three interviews with resettlers who have recently completed vocational training and four interviews with experts. The collection of primary data consists of a total of fifty-two semi-structured interviews.

The collection of primary data is based on purposive sampling. The aim of purposive sampling is to strategically sample participants so that those interviewed are relevant to the questions being put forth (Bryman, 2008). In the case of the semi-structured interviews with resettlers, there was some randomisation in sampling yet factors, such as age, gender and hamlet played a part in selecting the interviewee. In the case of respondents from the vocational training, two interviewees were chosen with the same gender, age and type of training in order to detect how their experiences of the vocational training and future plans would defer or not. The third vocational training respondent was chosen with a different gender and type of training to see what their experience during the vocational training and future plans are in comparison to the first two vocational training participants. In the case of the experts, they were chosen due to their work in the NT2 project as well as their diverse expertise, ranging from anthropology to marketing and agriculture.

4.4 Semi-Structured Interviews

The main method of data collection is based on semi-structured interviews. Semi-structured interviews are seen as a suitable method as it accentuates the understandings of events and processes from the perspective of the interviewee (Flowerdew & Martin, 2005). Whilst the interviews were somewhat structured with predetermined questions, they were also more conversational, thus permitting the formulation of new questions and follow-up questions throughout the interview (Bryman, 2008). Interviews were recorded if possible and were subsequently transcribed. However, many resettlers who were being interviewed felt uncomfortable with being recorded. In its place, notes were taken and thereafter transcribed into summaries. Field notes were also taken throughout data collection as they were found to be useful in order to gather thoughts on observations, surroundings, behaviours and reflections (Mikkelsen, 2005).

Interview questions with respondents of the resettlements ranged from their livelihood strategies to their perceptions of the RNFE. To begin with, they were asked to describe what comprised of their livelihood strategy at present in comparison to before. If they do engage in the RNFE, follow-up questions would include, amongst others, the reasons for doing so, the level of financial gain, and the main challenges faced. Respondents were also asked to discuss the level of competition, how they set up the business (whether they used their savings or took a loan) and the manner in which NTPC has supported the expansion of the RNFE. In order to grasp a holistic depiction of the RNFE, respondents were also asked whether they thought people engaging in nonfarm activities were mostly wage-employed or self-employed and whether they were remaining in the village or migrating elsewhere. The attitude and aspirations of the younger generation in regards to livelihoods and rural nonfarm activities were also discussed as well as the benefits and disadvantages of the vocational training provided by the NTPC. Respondents who did not include nonfarm activities in their livelihood strategy were asked similar questions but instead with a focus on why they choose not to participate in the RNFE. The combination of these questions helped form an idea of whether households were ‘pushed’ or ‘pulled’ into diversifying into the RNFE.

Furthermore, three other resettlers were interviewed who recently completed the vocational training provided by NTPC. Two respondents attended vocational training in tailoring which took place in Vientiane. The third respondent attended vocational training within car repair, in the nearby town of Thakhek. The interviews touched upon similar questions asked to the other resettlers, in regards to their view of the RNFE. However, more emphasis was placed on their experience of the vocational training and their future plans in regards to their livelihoods. Questions ranged from how they would use their new skills to the challenges facing them if choosing to engage in the RNFE. The concepts of push and pull factors were intertwined into these questions.

Lastly, four interviews were carried out with experts who are/have worked for NTPC, either as staff members, or as consultants in monitoring groups and project-based activities. The interviews with these respondents varied a bit as they differed in expertise. In comparison to interviews with resettlers, the experts agreed to record the interview. As such, all interviews were transcribed, allowing for a more comprehensive and reiterated examination of the data (Bryman, 2008). General

questions were discussed, such as the main strengths and weaknesses of the NT2 project and the resettlement programme. Issues in regards to the restructuring of resettlers' livelihood and their ability to integrate into the cash economy were furthermore discussed. Respondents were also asked to review the role of nonfarm activities in the livelihood strategy of the resettlers, the challenges within the RNFE and what further actions need to be taken by NTPC in regards to the nonfarm component of the livelihood programme.

4.5 Fieldwork Experience and Ethical Dilemmas

The duration of the fieldwork comprised of 7 weeks, whereby I was chiefly based in Vientiane, the capital of Laos and carried out three separate trips to the NT2 resettlement site in Nakai Plateau. Due to logistical reasons, I had one of two different interpreters accompany me to the project site. Although I am half Lao and can speak the Lao language relatively well, I felt more at ease having a translator with me to be able to attain the conversational and casual manner I wanted my semi-structured interviews to be. This was possible as I understood almost everything that was being said and thus did not have to frequently interrupt as well as having the advantage to be able to distinguish any biases and misinterpretations in what the translator said.

Having previously worked within the development field in Laos, I was furthermore fortunate to have contacts that could support me throughout my fieldwork. Entering the field was particularly difficult due to the political orientation of Laos and the bureaucracy of attaining a research permission. Luckily, I received direct access to the NT2 project with the assistance of a former colleague who was able to introduce me to the NTPC Headquarters in Vientiane.

Predictably, there were a few obstacles that emerged throughout the process of data collection. One of the main challenges I faced was explaining concepts, such as nonfarm activity, self-employment and wage-employment to my translators and interviewees. My interpreters were briefed on their specific tasks, the study's objectives and the methodology, whereby I focused on explaining the most difficult concepts (Scheyvens & Storey, 2003:133). Although it was not too difficult for my translators to grasp the concepts, it did take time with some interviewees. Confusion arose as to what a nonfarm activity could be, and what the difference between self-employment and wage-employment was. For example, although both are wage-

employed, many resettlers found it strange to put teachers and construction workers in the same category, because one works in the public sector and the other in the private and their occupations are linked with different social connotations, such as level of education, status and income. Another example is that many confused self-employment for self-sufficiency and did not comprehend that self-employment was solely in regards to RNFE in my interview. These communication challenges arose often, yet after the initial interviews, we were able to better explain the concepts. The main solutions were to include several examples, reformulate the question, and ensure that they felt comfortable in asking us questions if they still did not understand. This allowed for more in-depth and reliable answers as we ensured that questions were clear and that respondents felt at ease.

In my return to Laos to conduct fieldwork, many ethical dilemmas emerged in regards to issues of positionality, reflexivity and power structures. The distinction between 'the field' and 'home' was sometimes blurred, yet sometimes clear. The rural setting and socioeconomic context of the resettlement site is significantly different to that of Vientiane, yet having done fieldwork previously, I also found it familiar. At times, it did not take long to detect the positionality within an interview because the respondents' answers revealed what they thought of me and what they thought of themselves. When asked to be interviewed, some shied away and said they were 'too stupid to be interviewed'. Other times, I would feel that I was very foreign to them due to the combination of my age, gender, class, ethnicity, level of education, Swedish nationality and marital status.

Nevertheless, I would argue that many commonalities, such as my Lao nationality, attire, ability to speak the Lao language, and sometimes my gender, definitely aided in lessening the power structures between resettlers and myself as I think some could relate to me to a certain extent. At times, I was surprised by the honesty of some respondents who even shared information about illegal activities, such as illegal logging. Such situations led to ethical dilemmas as I knew how to morally act, based on the consent I had given to the respondent, yet I would at times feel anxious having received such information.

As Sultana eloquently describes, I felt as if "I was simultaneously an insider, outsider, both and neither" (2007: 337). Nevertheless, I am mindful of not truly being an insider, of merely gaining partial access to the lives of my interviewees and that our relationship was not wholly equal. On the other hand, I do think that through the

manner in which I interacted and listened to my interviewees, I was able to bridge gaps and create a space where they could comfortably share their stories. I believe this was principally possible as a result of my efforts in practicing reflexivity throughout my fieldwork.

4.6 Criteria for Evaluating Qualitative Research

The criteria of reliability and validity play an important role in quantitative research, yet its relevance has been questioned and contested in regards to qualitative research. As such, alternative criteria have been proposed, such as the idea of trustworthiness put forth by Lincoln and Guba (1994). Trustworthiness consists of four criteria, namely credibility, transferability, dependability and confirmability.

The criterion of credibility stresses the importance of establishing results that are credible from the perspective of the participants of the study. Although Bryman highlights the element of multiple accounts of social reality, and I acknowledge that mine is just one of many, I attempted to fulfil the criterion of credibility by using respondent validation (Bryman, 2008). Although it is a simple version of respondent validation, after every interview I gave a brief account to each respondent on what I had heard and learned from the interview, whereby they could clarify any misunderstandings in order to increase credibility.

The second criterion of transferability, refers to the extent to which the findings of qualitative research can be generalised or transferred to another context (Bryman, 2008). In order to do so, I have attempted to produce ‘thick description’ and include detailed accounts of my findings, providing others with the possibility of transferability into another context of study if they deem the data as relevant.

In regards to the criterion of dependability, paralleling the criteria of reliability within quantitative research, it stresses the need for accounts to be made and kept for the continuously altering context within the research process (Bryman, 2008). I argue to have met this criterion as I have retained records of my fieldwork notes, interview transcripts and the coding of my data analysis. Furthermore, throughout the course of the fieldwork, reflective papers focusing on the choice of research questions and methodology and the issue of positionality have been written and give an account of my research process whilst in the field.

Lastly, the fourth criterion of confirmability is in regards to the ‘good faith’ in which the researcher is meant to conduct their research (Bryman, 2008). While acknowledging that full objectivity is impossible within social research, it should be evident that the researcher “has not overtly allowed personal values or theoretical inclinations manifestly to sway the conduct of the research and findings deriving from it” (Bryman, 2008:379). Through my practice of reflexivity, I aim to be mindful of any biases I hold that may influence the data collected and my findings.

4.7 Analysis of Collected Data

The collection of data from the field study resulted in the compilation of 52 semi-structured interviews. These interviews were transcribed, if there were recordings, or summarised, based on notes taken during the interview. The analysis of data was thereafter carried out through a process of coding. Open coding was primarily employed, which is the process of breaking down, studying, comparing, conceptualising and classifying data. In coding within qualitative data analysis, “the data are treated as potential indicators of concepts and the indicators are constantly compared” (Bryman, 2008:542). In this case, the main concepts considered during data analysis are the concepts of pull and push factors and distress diversification. Furthermore, it is important to stress that the study’s findings are chiefly grounded in the primary data collected in interviews with resettlers. The findings from interviews with the experts play less of a central role because their expertise lies not on rural nonfarm activities, and because the purpose of the case study is to primarily shed light on the perceptions of the resettled communities and not the experts.

5 | DISCUSSION ON FINDINGS

To begin, an overview of resettlers' livelihoods and living conditions prior to and after resettlement will be presented in order to better grasp the transition in their livelihood strategy and the ways in which they have diversified in general. This also allows for an initial insight into the role of nonfarm activities in resettlers' livelihoods. Thereafter, findings will be presented and discussed in relation to the emergence and development of the RNFE and the characteristics it embodies. Finally, the dynamics of the push and pull factors within the RNFE of the Nakai Plateau will be described and analysed in order to determine whether households have been engaged in distress diversification or led into the RNFE by more profitable and productive motives.

5.1 Livelihoods and Living Conditions prior to Resettlement

As the primary means of subsistence, the communities located on the Nakai Plateau traditionally relied on agriculture, especially shifting cultivation of swidden agriculture, which involved a seven-year rotation period (NTPC, 2014). Rice shortages were recorded for all villages, as rice cultivation was largely poor except for wealthier households in certain villages who were in the position to grow paddy rice (NTPC, 2014). The cultivation of swidden agriculture was estimated to account for 500ha of upland areas and were "exposed to poor soil fertility, frequent floods and droughts while suffering from a lack of modern technology" (NTPC, 2014). As such, villagers relied on fish, the main source of protein, from the Nam Theun River and its tributaries as well as hunting in the surrounding areas (NTPC, 2014). Some vegetables were also grown in the vicinity to the home or in river garden beds. The accessibility to forests and NTPFs was furthermore an important component in their livelihood and food security because NTPFs were the most vital source of cash income as well as food during periods of rice deficiency (NTPC, 2014). Moreover, livestock played a significant role in their livelihood strategy as it was a means to accumulate wealth which could be liquidated whenever necessary (NTPC, 2014). The procurement of food was thus for the well-being of the family, but only on a subsistence basis as there was no surplus.

The communities of the Nakai Plateau were amongst the poorest and most

marginalised in Laos, with limited access to basic services such as roads, education, electricity, clean water and adequate healthcare (NTPC, 2014). Historically, the Nakai Plateau was extremely isolated with poor road infrastructure. During the rainy season, it was practically unmanageable to access the area (NTPC, 2014). During the dry season, to travel from the capital town, Oudomsouk to Thakhek took about half a day, a journey that takes an hour by car with present road conditions (NTPC, 2014). Eight villages had no road access and some were only accessible by boat during the rainy season. In regards to education, 63% of the population lacked access to schooling as schools were mainly allocated in larger villages or were functioning inadequately (NTPC, 2014). Furthermore, there was an absence in electricity accessibility for all villages except in Oudomsouk, which had unreliable and limited connection (NTPC, 2014). There was no infrastructure in place providing clean water and sanitation. The fetching of water from rivers was a daily household chore of women (NTPC, 2014). In respect to basic healthcare, most villagers depended on traditional medicine and local herbalists as access to health facilities were poor (NTPC, 2014). The standard distance to the nearest healthcare facility was 11km, typically journeyed by foot and for some villages the closest trained healthcare practitioner was a two-day walk away (NTPC, 2014).

From the depiction of the resettlers' livelihoods and living conditions prior to resettlement, it is evident that nonfarm activities played a minor role, if any, in resettlers livelihood strategy and that the RNFE had not yet emerged on the Nakai Plateau, particularly due to its isolation and lack of infrastructure.

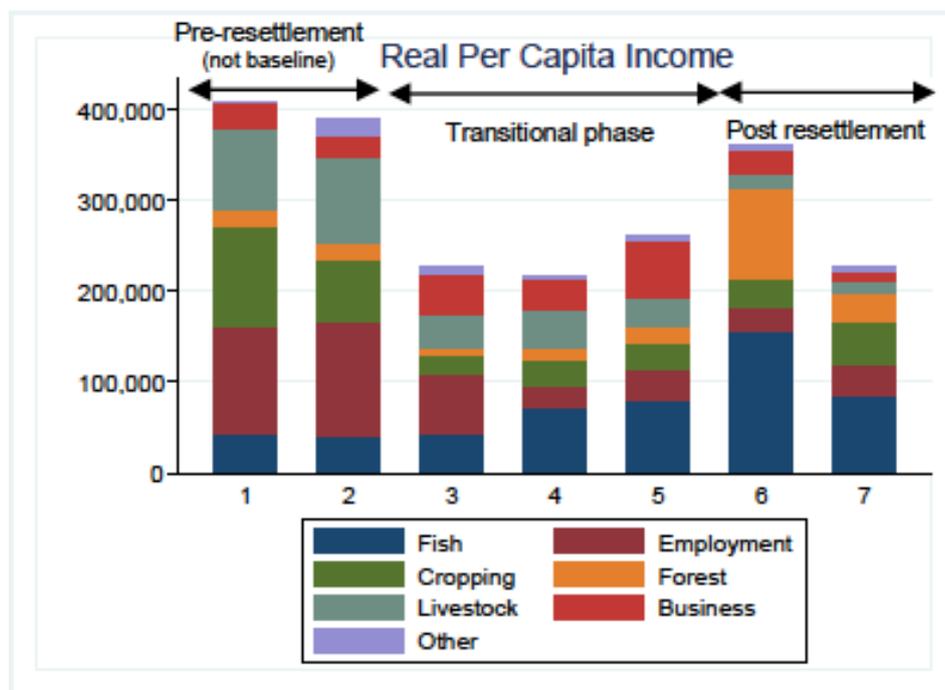
5.2 Livelihoods and Living Conditions after Resettlement

The process of resettlement is challenging as households are not merely relocated to a new location, but have to alter their ways of living and adapt to a different economic and social context brought about by compensation packages, improved road access and the availability of electricity and telecommunications. This altered context encourages a transition from subsistence agriculture to a market economy, and hence incites a shift in the livelihood strategies of resettlers as new livelihood opportunities present themselves, and previous practices might be more difficult to depend on. In order to grasp an understanding of the transformation of resettlers' livelihoods, the indicators of income per capita, composition of income, household consumption

levels, assets, savings and debts will be presented, based on monitoring studies conducted by NTPC.

To begin the analysis of present livelihood conditions, one significant indicator, which reveals how resettlers coped with the new context, is per capita income of resettlers and how this evolved throughout the resettlement process (NTPC, 2014). This analysis is based on seven rounds of the Living Standards Measurement Surveys (LSMS), carried out between 2006 and 2013 by NTPC, and comprises of the three phases of pre-resettlement, transitional and post-resettlement, as seen in Figure 5.1.

Figure 5.1 Real Per Capita Income of Resettlers throughout Resettlement



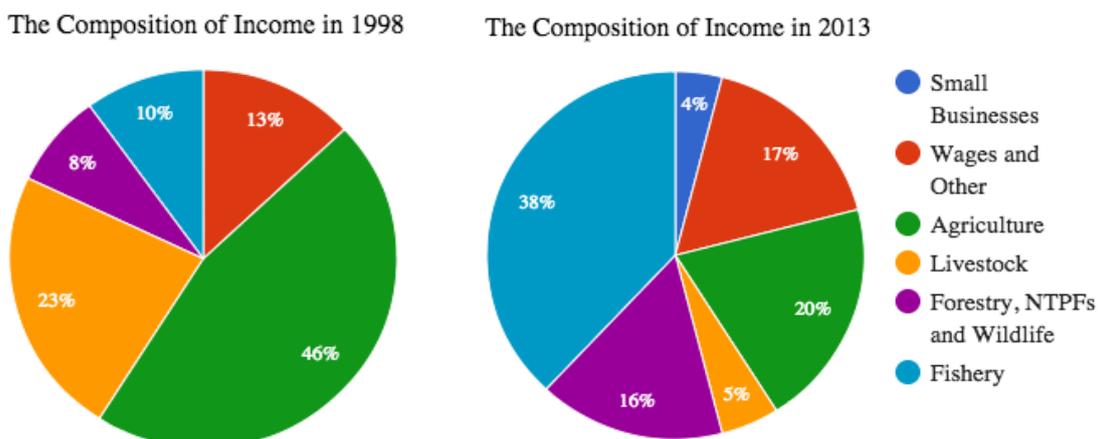
Source: NTPC, 2014

The pre-resettlement phase, based on survey rounds 1 and 2 from 2006 and early 2007, had already been impacted by the presence of the NT2 project and thus, do not represent baseline figures (NTPC, 2014). The pre-resettlement phase was characterised by temporary cropping of old and new land, liquidation of livestock and an increase in wages from project-related activities, such as clearing land (NTPC, 2014). In 1998, pre-project mean per capita income levels were valued at 110,000 kip/month (NTPC, 2014). In contrast, resettlers witnessed a drastic rise in their income during survey rounds 1 and 2, with real per capita income over 400,000 and 375,000kip/month respectively (NTPC, 2014).

However, during the transitional phase, based on rounds 3 to 5, the increased income dropped to under 300,000 kip/capita/month (NTPC, 2014). This trend was the result of the halt to double-cropping, the phasing out of transitional food subsidies and project-driven salaries, the cessation of income from livestock sales and the decline in the quantity of livestock (NTPC, 2014). Nevertheless, throughout the phases of the resettlement process, food support was sustained to vulnerable households (NTPC, 2014). Defined by NTPC and the Nakai District, vulnerable households are those whom significantly struggle in increasing their income due to household characteristics, such as disability or lack of labour (NTPC, 2014). Commencing with the impoundment in 2008, these sources of income were gradually substituted by income from fishery, as can be observed from round 4 to 5 in the LSMS surveys. The present declared average per capita income is 228,000 kip/month, which is above the present poverty line of 186,000 kip/month and the pre-project mean pre capita income level (NTPC, 2014).

In order to grasp the livelihood strategies of resettlers, it is also important to analyse the composition of income, or in other words, what type of activities resettlers are engaged in. There are significant changes in the source of per capita income, as can be seen in Figure 5.1 and 5.2. During rounds 1 and 2 of the pre-resettlement phase, the main sources of income derive from livestock, cropping and employment (NTPC, 2014). In 2013, the foremost source of income is from fishing, where mean fishing incomes are estimated to be 86,000 kip/capita/month (NTPC, 2014). The second main source of income is declared forest income, consisting of NTPF harvesting, logging and dividends from the VFA (NTPC, 2014). In a context of increased prices and demand for rare timbers, the drastic decline of forest income might be a result of the effectiveness of regulatory enforcement and/or the availability and quality of timber supply or plausibly to incomplete declarations in order to conceal certain illegal activities (NTPC, 2014). The third main source of income in 2013 is from agriculture, where the increase from round 6 to 7 can be linked to the provision of additional land for agriculture (NTPC, 2014). The difference in the composition of incomes in 1998 and 2013 is stark, where incomes from livestock and agriculture has dropped over time and the role fishery plays as a source of income has become increasingly more vital in the livelihoods of resettlers, as is illustrated in Figure 5.2. There is also a increase in wages and small businesses, indicating that resettlers are diversifying into the RNFE.

Figure 5.2 The Composition of Resettlers' Income in 1998 and 2013



Source: NTPC, 2014

Another important indicator that provides insight into the livelihood conditions throughout the resettlement process is the patterns of household consumption. The pre-project consumption level is estimated at about 300,000 kip/household/month (NTPC, 2014). During the early stages of resettlement, the local population seem to have faced a phase of rapid economic growth as they were given food allocations and employment opportunities, where average household consumption rose to 750,000 kip/capita/month. Thereafter, the average consumption level fell to 585,000 kip/capita/month in 2009 (NTPC, 2014). Nonetheless, this seems to have altered in round 6 and 7 of the LSMS survey where consumption levels per capita reached 810,000 kip/month and 622,000 kip/month respectively (NTPC, 2014). This increase is assumed to be partly due to internal and external factors, including a drastic increase of timber value, continued gains from fishery windfalls and a compensation payment of US\$737,000 for fruit trees and paddy fields (NTPC, 2014).

In comparison, per capita income demonstrates a comparable but not identical pattern over the process of resettlement (NTPC, 2014). For example, during the transition phase where incomes declined, the levels of consumption continued to be above the poverty level during survey rounds 3 and 4. Therefore, it has been claimed by NTPC that consumption as an indicator is more dependable in measuring the living standards of resettlers because declared incomes stand far below levels of consumption which suggests that incomes have been under-declared. As mentioned

previously, this could be due to the need in concealing particular income-generating activities that are prohibited.

The accumulation of assets is another significant indicator in analysing the transition of livelihoods throughout the resettlement process. There has been an evident upwards pattern, as the asset index has increased across all wealth groups since the first LSMS survey round in 2006 (NTPC, 2014). Many resettlers have purchased new assets, particularly electronics such as televisions, mobile phones, rice cookers and refrigerators (NTPC, 2014). Vehicles and furniture are also popular items of expenditure. Between survey rounds 1 and 7, the relative increase in the asset index was highest for non-rich households who experienced roughly a five to eight fold increase in their asset index (NTPC, 2014). This pattern suggests that as household incomes have increased, households begin to increase their expenditure on non-food goods and services, and to meet this growing demand, there has been an emergence of small businesses within the RNFE providing such goods and services. Moreover, several resettlers have also spent money on house improvements. While houses were designed together with resettlers during the consultation process prior to relocation, 85% had made modifications to their house by survey round 7 in 2013 (NTPC, 2014). 6.9 million kip (nearly US\$900) is the mean investment in house modifications per household since relocation.

Increased savings and limited debt also suggest that the resettled communities are financially better off. From 21% in 2006, the percentage of households with savings in the form of gold, jewellery or bank deposits has increased to almost 100% in 2013, with 97% of vulnerable households (NTPC, 2014). Relying less on buffaloes and more on bank deposits, the form of savings has likewise changed, suggesting a move towards a market economy. In regards to debt, 25% of households stated having obtained loans during the past year, with a majority of those loans being from the Village Credit Fund (NTPC, 2014). Mean debt was restricted to 200,000 kip/capita and largely used for productive purposes as the guidelines of the VCF “require that loans can only be obtained for productive purposes or for emergencies and cannot exceed the amount of the capital share of an individual member” of the VCF (NTPC, 2014:35).

5.3 The Development of the Rural Nonfarm Economy

Since the commencement of the dam construction and relocation, the RNFE in the Nakai Plateau seemed to boom in comparison to the previous state of the area. To begin with, the commencement of the construction of the dam led to improved prospects for resettlers to engage in rural nonfarm activities due to the increase in employment opportunities. These employment opportunities, offered by NTPC, were primarily centred on the construction work of infrastructure and new houses in resettled areas as well as the preparatory work needed in clearing land for agricultural purposes. Moreover, at the beginning of the NT2 project, the influx of labour into the area, such as construction workers, researchers, enumerators and other project-related staff, led to a rapid increase in demand for various goods and services. To meet this growing demand, resettlers as well as other people who voluntarily moved to Nakai Plateau due to its growing development, opened up small businesses. However, as civil works was concluded in 2008, the availability of such employment opportunities dwindled considerably. Nevertheless, the “skills obtained during this period have enhanced the capacity of many resettlers to engage in other forms of off-farm employment and sole-trader enterprises” (NTPC, 2014:27).

As the livelihood programme emphasises the vital component of rural nonfarm activities in resettlers’ livelihoods, it is important to first begin with a clarification of the role NTPC played in the development of the RNFE. It is argued by NTPC that they have strived to set up an enabling environment for the expansion of the RNFE. With the inauguration of the project and the resettlement, regional economic development and improved infrastructure, such as access to market facilities, new roads and electricity and telecommunications, has boosted local demand and provided resettlers with improved access to employment opportunities and markets (NTPC, 2014). Furthermore, the provision of technical and financial support has been delivered by NTPC in order to develop nonfarm livelihood activities. The joint Community Development team by NTPC and the Lao Women’s Union assisted with the identification of nonfarm livelihood priorities and provides vocational training and seed capital to support the establishment of small businesses (NTPC, 2014). The VCF is also a major component in creating an enabling environment for rural nonfarm activities as it provides access to credit, allowing resettlers to start and scale up their nonfarm activity in the long-term (NTPC, 2014).

The small businesses of the Nakai Plateau include various different orientations, from small shops/kiosks selling cooking materials, toiletries and gasoline to car repairs shops and beauty saloons. Weaving and tailoring are also nonfarm activities that can be seen in the resettled communities. Other nonfarm activities consist of fish and food processing, employment by the VFA, the NTPC and its sub-contractors as well as other service enterprises (NTPC, 2014). Remittances from family members outside the household or assistance from the state are also received by some households. There are also a few signs of growing tourism, especially in the northern area of the Nakai Plateau, with two households opening up guesthouses for backpackers.

Patterns within the ‘functionality’ of rural nonfarm activities also highlight the development of the RNFE. The function of rural nonfarm activities refers to whether resettlers are involved in wage-employment or self-employment. The large majority of respondents claimed that most resettlers participating in the RNFE are doing so in the manner of self-employment. There were few who stated that wage-employment was the main function of nonfarm activities in the Nakai Plateau. In these cases, the most common forms of wage-employment are in regards to occupations as a construction worker or in the military service. However, self-employment can be argued as the most prevalent. The foremost reason for this trend, based on the perceptions of the resettlers, is due to the lack of skills and education of resettlers, since many cannot read and write, which limit them to many employment opportunities. Another reason is that unskilled labour opportunities are not present in the Nakai Plateau, and thus, many resort to self-employment as a means of livelihoods within the space of their community and family. The third reason mentioned, which is a particularly noteworthy concern to shed light on, is the argument that most resettlers simply do not want a formal employment, at least not the older generation. Many prefer their traditional means of attaining a livelihood and are not accustomed to the structured routine of a nine-to-five job. Instead, they prefer the flexibility to set their own agenda for the day or the week which can easily be restructured if necessary. Such a preference is also more attainable if one is self-employed within the RNFE.

Furthermore, the development of the RNFE is also characterised by the location of rural nonfarm activities. In other words, the aspect of location distinguishes whether resettlers are participating in the RNFE locally or are migrating elsewhere for rural nonfarm livelihood opportunities. Findings show that a large majority of

respondents perceive rural nonfarm activities as locally based, since very few engage in migratory rural nonfarm activities. For the few who claim that the RNFE consists of more migratory than local nonfarm participants, these nonfarm activities are often arranged on a weekly basis where participants continue to have their base in the village and regularly return for the weekend. Consistently, more extensive periods of labour migration were not mentioned whatsoever. The main reasons for this was claimed to be due to an attachment for their family and village and the lack of information on rural nonfarm opportunities elsewhere, typically as a result of weak social networks and contacts who typically give access to such information.

To grasp the development of the RNFE, it is moreover important to consider the aspect of competition. Firstly, the perceptions of competition are chiefly based on the spatial confines of the respondent's village. Findings indicate that the perceived level of competition is very low as most goods and services are priced at the same level within the village. Business enterprises, such as small kiosks also tend to have their general set of customers, as most people purchase goods and services from the store within the closest proximity to their households. As such, stores have a set area from whom they can expect customers and few bother to walk to the other side of the village to purchase an item that might be slightly cheaper. Although some have noticed that the level of competition is rising, people claim to try to be supportive and not let it trouble them if someone is receiving more profit in comparison.

In order to predict how the RNFE will develop and evolve over forthcoming years, an emphasis was also placed on the perceptions of the young generations and how they might resolve their means of gaining a livelihood. To begin with, it is important to note that these findings reflect the perceptions of the older generation on the younger generation. The respondents of resettled communities explain that a majority of the younger generation desire to leave the village for better opportunities, either for further education or for wage-employment. It is also claimed that less obstacles face the younger generation as they have had access to primary and sometimes secondary education and have also been exposed to the a higher level of modernity, in regards to telecommunications for example. As a result, they are more competent and able to compete in the labour market and in academia, as well as being able to more easily adapt to a more urban setting, than their parents and grandparents would be capable of. Despite the aspirations of the younger generation, very few have relocated in actuality. The main impediments facing them is claimed to be a lack of

capital and a lack of social networks and contacts who they can depend on in a new setting.

The skills required of nonfarm activities have often been passed down from generation to generation or taught and learnt between members of the village. Some of these skills have also been acquired through the vocational training provided by NTPC. The experiences of three participants of the vocational training will be discussed hereafter.

5.3.1 Vocational Training

In order to grasp the development of the RNFE within the Nakai Plateau, the successes and failures of the vocational training provided by the NTPC should be highlighted. Depending on the year, roughly 25-45 people are selected to go to vocational training either in Thakhek or Vientiane, to acquire a variety of different skills (NTPC, 2014). This has helped expand the RNFE to some extent as a few people have established a small enterprise upon coming back to their village. However, impediments still persist and hamper this development. To begin with, findings show that people who return find it difficult to formally establish their business, mainly due to the lack of capital. Although access to credit exists, with the possibility to acquire a loan from the VCF, many people prefer to wait and save up on their own, primarily because they are afraid of getting in debt. Others who have established a business find it difficult to maintain it as demand is low for many of the skills acquired in the vocational training.

“I have this beauty saloon, but not many people come. They don’t have enough money to spend and they don’t care about fixing their hair or looking nice. Maybe if there is a wedding or a big event, then they come. But this doesn’t happen a lot. So I have a shop, but no customers. So I am not always in the shop. I spend my time doing other things because I can’t waste my time” (Interview 45)

As such, it was frequently reported that people may open a shop when they first came home from their vocational training, yet only after a few months, they were forced to shut down. Many might try to open another sort of business, on a trial-and-error

approach and so the period between opening and closing down a business remains a short cycle. Others resort to offering their service from the basis of their own home. Members of the village may have heard that someone knows how to cut hair or tailor clothes and so come to their home to ask personally. Others however, are more successful and are able to use their newly acquired skills as their main source of income.

The findings from three respondents who had recently completed their vocational training, gave insight into their aspirations and challenges. The reason they enrolled in the vocational training was to gain skills which they can thereafter utilise to gain a source of income that can be combined to the household income. They all enjoyed their vocational training, as it allowed them to live in a more urban setting, to meet new people and to gain a new set of skills. However, they were also eager to come home to be with their family again and to set up their small business, although it might be in the long-term as many impediments exist. Their main worry is whether or not they will have enough capital to set up the shop and whether the profit generated will be enough. They would all prefer to use their own savings to open up a business as they are apprehensive towards taking a loan with the fear of getting in debt as they would not know how to pay it back. However, one of them is still considering it whilst the other two would only take a loan in the case of an emergency. Their other worry is that they will not be able to compete.

“You know, the training is very short, only about three months. We start from the very basic, learning how to draw patterns for different clothes like shirts and skirts and pants. There was a lot to learn in such a short time and I feel like I am not skilled enough. I need more practice and experience before I can tailor something very beautiful. So I worry that I am not as good as others, that can’t compete with them”
(Interview 47)

As a result, one interviewee wants to begin on a smaller scale, producing only for her relatives before she opens up a shop. If the shop is unsuccessful, she plans to engage in agricultural activities as the other members of her family. Others are more determined to use the skills acquired in the training.

“I attended this training because I truly want to become a tailor. I had a few sewing skills before, because I used to work in my cousin’s tailoring shop in Thakhek. I really want to open my own shop in my village, but of course I am worried. If it doesn’t work out, I wouldn’t give up. I would go to work at my cousin’s shop again and practice and practice and return to the village later on. If I had to stay in the village, I would have to help my family with farming and such things, but it wouldn’t be my main occupation. I will always try to make tailoring my main job, so when I had spare time, I would sew and try to sell what I made” (Interview 46)

Another challenge they believe they will face is the lack of local demand in the village. In the case of tailoring, they claim that most villagers buy ready-made clothes produced in factories and that few order tailored clothes for events.

“People don’t want tailored clothes so much. They buy clothes made in the factories, it’s easier, they say. So my idea is to also make ready-made clothes that are for sale. But of course I will also offer to tailor clothes for those who want nice clothes, clothes that fit them well” (Interview 46)

As such, the vocational training has aided some resettlers in terms of gaining skills, one of the impediments to entering the RNFE. However, findings show that the main shortfalls of the vocational training is the limited time of the training itself, and that the subjects prioritised in the vocational training programme might not be suitable for the local context as low demand for their skills are often reported.

5.3.2. The Main Challenges faced within the Rural Nonfarm Economy

In order to understand the development of the RNFE, it is vital to shed light on the many challenges faced by resettlers who participate in the RNFE. The foremost challenge highlighted in interviews is the lack of demand for goods and services as people simply do not have enough money to spend. Demand also fluctuates a lot depending on the seasonality of certain things, such as events. For example, in Laos,

following Theravada Buddhist tradition, lay people may not marry during Khao Phansa, Buddhist Lent which takes place from late July to late October. Therefore, certain small enterprises, such as tailors, relying largely on big events such as weddings, face difficulties as fewer customers place orders during these months.

Another challenge to resettlers engaging in the RNFE is the transportation of goods. As suppliers rarely come to the village to sell their products, resettlers have to travel to the closest town to purchase necessary items. This can be challenging depending on the available mode of transportation and the time and distance needed to travel. Other challenges mentioned are the level of competition and the issue of pricing. As more small kiosks are opened in the village, owners find it tricky to price similar products. Although most pricing is on the same level, people who have the possibility to travel to a larger market providing a greater supply and variety of products, are able to purchase more products on wholesale at lower prices and are thus able to be more competitive as they can charge lower prices for the same product. Lastly, there is the challenge of borrowing goods to members of the village, on a credit basis. A few interviewees indicated to having borrowed items from their small store to villagers, especially to those who were going on a longer journey into the forest and who needed certain products for their travels. In some cases, these customers were not able to pay back what they owed, making it difficult for business owners to balance their costs.

Study findings also illustrate the numerous challenges hindering resettlers from entering the RNFE at all. The foremost challenge is the aspect of capital, as most resettlers do not have a sufficient amount of capital to invest in their own business and are apprehensive of taking a loan from the VCF. Other nonfarm activities, such as waged labour is also difficult to attain as many resettlers state that their lack of skills, education and experience impede them from acquiring formal employment. Furthermore, the lacking presence of unskilled employment opportunities in the Nakai Plateau is another obstacle facing resettlers desiring formal employment. Resettlers aspiring to be self-employed and owning their own small business fear that they will lose their money if their business pursuit is unsuccessful and thus, they will also not be capable of reinvesting. Lastly, interviewees claim that social networks and contacts are necessary when entering the RNFE. Those without suitable contacts and social networks might find it difficult to ‘get their foot in the door’ and to find necessary support.

To summarise, the emergence of the RNFE appeared rapidly with the commencement of the dam project and the resettlement process as the construction phase was characterised by increased employment opportunities and high local demand for goods and services due to the influx of labour into the Nakai Plateau. Nevertheless, as construction was completed, these livelihood prospects within the RNFE diminished. Instead, the local demand and the level of competition declined and remain low, with most resettlers participating in low-return, labour-intensive home-based cottage industries. The majority of resettlers engaging in the RNFE are self-employed rather than wage-employed. Such a pattern is consistent with findings from existing literature, where self-employment is found to predominate remote rural areas, similar to the setting of the Nakai Plateau, whilst nonfarm wage-employment is more prevalent in zones with a higher density of rural towns and better infrastructure (Reardon et al, 2007). As a consequence to the lack of accessibility and availability to nonfarm opportunities in the region, most resettlers engage in local nonfarm activities and labour migration remains limited.

Despite the expansion of the RNFE and resettlers' diversification into rural nonfarm activities, farm incomes continue to constitute the majority of resettlers' income, acquiring 38% of their income from fishing, 20% from agriculture, 16% from forestry, NTPFs and wildlife and 5% from livestock. In comparison, resettlers only gain 4% from small businesses and 13% from wages and other activities (NTPC, 2014). It is important to note that wages might still be waged labour within agriculture and so it is unclear what constitutes as nonfarm income. Nevertheless, it is clear that nonfarm activities remains limited and fishing appears to be the main source of income for resettled communities. Furthermore, those respondents who do participate in the RNFE claimed not to rely on nonfarm activities as their sole source of income, although there were a few who did. Some reported having a small profit, a small loss or just attaining equilibrium, and so no general trend could be distinguished from the data collected. However, no one stated gaining a substantial profit, and most described it as "having enough to eat" and "having enough to survive" as most of the profits, if any, were used to purchase simple cooking staples, such as oil and chilli.

Nevertheless, although limited, it is evident that resettlers are increasingly diversifying into the RNFE and that rural nonfarm activities are gaining a larger role in livelihoods than before the NT2 project and resettlement. Findings show conclusively that resettlers perceive the new situation of the Nakai Plateau and the

location of their new village site as favourable to the expansion of the RNFE as the improved infrastructure, especially the accessibility and availability of water, electricity, markets and roads, allow resettlers to more easily engage in rural nonfarm activities. In order to understand the causes of such a diversification strategy, it is vital to distinguish the pull and push factors at play.

5.4 Dynamics of the Push and Pull Factors

As described previously, as construction of the dam commenced, there was a rise in rural nonfarm employment opportunities concentrated around the construction of infrastructure and houses for resettlements as well as the clearing of agricultural land. Moreover, the influx of labour into the Nakai Plateau resulted in a rapid increase in local demand for goods and services. To meet this demand, resettlers began to engage in the RNFE evermore, by opening up small enterprises. The rise in demand and employment opportunities can be attributed as pull factors as they ‘pull’ resettlers into diversifying their livelihood strategy and engaging in profitable rural nonfarm activities. The expansion of the RNFE was however not as a result of a dynamic agricultural base, as the ‘pull’ scenario is generally grounded in, but from the economic growth emerging from hydropower development.

Nevertheless, after the completion of the construction phase, the level of demand dropped as project-related employees began to migrate out of the Nakai Plateau. The availability of employment opportunities also diminished with the completion of the construction phase. The relatively sluggish agriculture productivity due to limited land and poor soil quality did furthermore not aid the expansion of the RNFE, as agro-processing and agricultural input requirements declined. In areas of sluggish agricultural zones, the rural poor are often pushed into the RNFE in the pursuit of better income-generating activities (Haggblade, 2007). In such a setting, where there is a decrease in agricultural labour productivity, low opportunity cost of labour and reduced household purchasing power, rural households tend to diversify into labour-intensive, low-return nonfarm activities, such as basketry, weaving, and other handicraft activities (Haggblade, 2007). Specialised diversification in such a case, is however due to the lack of savings, investible capital and the shortage of agricultural opportunities and not in the pursuit of exploiting potential productivity gains. In other words, rural households are pushed rather than pulled into the RNFE.

There are indications of push factors operating in the RNFE of the Nakai Plateau, where rural households tend to engage in low-return and labour-intensive activities, which are not as profitable as other forms of rural nonfarm activities. However, it seems that the degree of the push factors are relatively modest because rural nonfarm activities continue to constitute a small portion of resettler's income. Resettlers claim not to make a substantial profit from nonfarm activities and those who are active in the RNFE, in the form of operating small kiosks and producing handicrafts, seem rather indifferent to their pursuits in the RNFE. Instead, they rely heavily on the income generated from fishing, and probably from illegal logging as well, although this income source is difficult to calculate. As such, it becomes difficult to determine how dependent resettlers are to illegal logging and thus, this component in the resettlers' livelihood strategy remains hidden. Consequently, with the presence of these more lucrative activities, the emergence of push factors has been limited and their influence weak.

To gain insight into the dynamics of push and pull factors, respondents were asked to discuss their main reasons for entering the RNFE, as a means to distinguish if they diversified in order to 'cope' and reduce risks and income variability or to take advantage of an opportunity within the RNFE. Most interviewees stated that they began to participate in nonfarm activities because they needed extra income, although it was not intended that nonfarm income would become their main source of income. The other main reason for participating in nonfarm activities, often home-based activities or cottage production, was the utilization of female labour. Although most women participate in agriculture and forestry activities, women with new-borns and young children tend to stay at home to care for their children as well as having the responsibility over other household chores. As these women were limited to the space of the home, many opened up small shops as a way to use their time and labour more productively. Older women also established small shops, as they maintained that they were either too old or sick to participate in activities with a greater workload.

In such a case, it can be argued that these women are pushed into the RNFE as they are restricted from participating in other livelihood activities. Yet there was a divergence in attitudes, as some resettlers with small businesses seemed ambitious whilst others seemed nonchalant about the state of their business. Those most concerned and ambitious about their small enterprise seemed to be so because it constituted an important part of their income, but primarily because that was their

way of contributing to the household income and what they spent their time and efforts on every day. Those who were more indifferent towards the progress of their nonfarm pursuits claimed it was due to the lack of importance to their livelihoods as it generated little profit. In general, findings show little indication of distress diversification, since most respondents did not engage in nonfarm activities in a desperate manner and with the aspiration of it being highly profitable. Instead, resettlers engaged in the RNFE for more practical reasons and do not heavily rely on nonfarm activities for their livelihood, and thus, the push factors remain weak.

The initial signs of tourism are also evident within the Nakai Plateau, predominantly in the northern areas. The promotion of a modest tourism industry primarily centred on ecotourism, has also been recommended by the POE in previous reports (2014). Furthermore, it is predicted that the completion of the road from Lak Sao to Thalang in 2015 will lead to a rapid increase in regional traffic from China and Vietnam to Myanmar and Thailand (POE, 2014). Two households in particular have established enterprises within tourism, providing accommodation, food, and services, such as boat trips in the reservoir. These two guesthouses seem relatively popular amongst backpackers who are travelling across the plateau, especially those on motorbike and cycling trips. These two households rely heavily on their nonfarm tourist activities, where most members of the household increasingly contribute to the business, and less on agricultural activities. The case of these two households signifies relatively strong pull factors, as households diversify into more profitable activities.

In regards to tourism, findings show that all respondents are positive towards promoting ecotourism in the Nakai Plateau. A majority were also open for offering homestay opportunities for tourists although there might be some challenges, such as the language barrier and condition of their houses. Respondents argued that a growth in ecotourism could create opportunities for employment and that with an influx of more people, there might be a rise in demand for goods such as handicrafts and traditional food but also services such as kayaking and trekking. In such a situation, if planned well, it could be expected that resettlers would be ‘pulled’ into diversifying their livelihoods in nonfarm activities within tourism.

The dynamics of pull and push factors at play remains highly complex within the RNFE of the Nakai Plateau. Findings indicate that pull factors seem to be more prevalent at the beginning of the NT2 project, with the construction phase and

resettlement. Thereafter, the pull factors weakened as local demand declined and employment opportunities dwindled. Subsequently, push factors emerged as a result of sluggish agriculture, but remained modest, as households relied more on income from fishing. The availability of more lucrative activities allowed households to avoid the need to partake in distress diversification. As such, there are both pull and push factors working simultaneously in shaping the development of the RNFE of the Nakai Plateau.

6 | CONCLUSION

This study sheds light on the restructuring of livelihoods of the resettled households of the NT2 project. Coinciding with the process of resettlement, the study examines the emergence and development of the RNFE within the Nakai Plateau, where it was perceived to boom at first. After the early years of the project, the development of the RNFE has stabilised and its expansion remains rather slow as the regional economic growth created by the construction of the dam declined. The sluggish agricultural base of the Nakai Plateau also contributed to the slow development of the RNFE.

The study furthermore examines the role of rural nonfarm activities in resettlers livelihoods and whether resettlers have been ‘pushed’ or ‘pulled’ into diversifying into the RNFE. The dynamics of pull and push factors at play remains highly multifaceted. One tends to generally be stronger than the other during different periods of the project, yet both factors are simultaneously present and influence the development of the RNFE of the Nakai Plateau. However, it can be argued that the resettlement area of the Nakai Plateau resembles more of a ‘push scenario’, then a ‘pull scenario’ as the economic base does not hold the dynamism needed to drive the expansion of the RNFE. On the other hand, the push factors still remain rather weak and there are few signs of distress diversification as households rely on the more profitable activities within fishery and probably within illegal logging as well. Consideration should however be placed of the hidden component of illegal logging within resettlers’ livelihoods because any negative changes within this livelihood activity could hamper the livelihood security of resettlers and induce them into distress diversification.

Nevertheless, one significant indicator of the presence of pull factors is the emerging ecotourism within the Nakai Plateau, which has the potential to drive an expansion of the RNFE. As such, one suggestion for future research would be a more in-depth study on the potential opportunities and challenges within ecotourism in area, as well as a preliminary assessment of the demand for goods and services within ecotourism on the Nakai Plateau, in order to be able to successfully foster ecotourism grounded in the local context and with a community-based approach.

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