

## JIMMA UNIVERSITY COLLEGE OF SOCIAL SCIENCES AND HUMANITIES DEPARTMENT OF SOCIOLOGY

MA in Sociology and Social Policy

The Effects of Hydroelectric Dam Induced Resettlement on the Livelihood of Displaced People: The case of Resettled Households in Bulbul Village,

Jimma Zone of Oromia National Regional State

A Thesis submitted to Department of Sociology in Partial Fulfillment of the Requirements for Master of Arts Degree in Sociology (Specialization in Social Policy)

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### Jimma University College of Social Sciences and Humanities Department of Sociology

#### **Post Graduate Program**

This is to certify that the thesis prepared by Delil Muzeyin titled by The Effects of Hydroelectric Dam Induced Resettlement on the Livelihood of Displaced People: The case of Resettled Households in Bulbul Village, Jimma Zone of Oromia National Regional State submitted in Partial Fulfillment of the Requirements for Master of Arts Degree in Sociology (Specialization in Social Policy) complies with the regulations of the University and meets the accepted standards with respect to originality and quality.

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#### **Acronyms**

**DDAPs:** Dam Development and Resettlement Affected People

**DIDR:** Dam-Induced Displacement and Resettlement

**DIDR:** Development-induced Displacement and

**DP's:** Displaced Persons

**FDRE:** Federal Democratic Republic of Ethiopia

**EELPA:** Ethiopian Electric Light and Power Authority

**EEPCo:** Ethiopian Electric Power Corporation

**EIA**: Impact Assessment Reports

**FGD:** Focus Group Discussion (FGD)

**GG I:** Gilgel Gibe One

**GG II** Gilgel Gibe two

**GG III** Gilgel Gibe three

**GERD:** Grand Ethiopian Renaissance Dam GERD

**KII:** Key Informant Interview

**PAP's:** Project Affected Persons

**PSNP**: Productive Safety net Program (PSNP)

**WB:** World Bank

**WCD:** World Commission on Dams

#### **Abstract**

The main purpose of this study was to explore the effects of Hydroelectric Dam Induced Resettlement on the Livelihood of Displaced People: The case of Resettled Households in Bulbul Village, Jimma Zone of Oromia National Regional State. It mainly attempted to explore issues such as the process involved in resettling the displaced households to Bulbul village; the positive and negative effects of Gilgel Gibe I dam development and resettlement on livelihoods of households in the study area; description of the community's resilience and coping mechanisms to tackle the negative effects of dam-induced dislocation; and post-resettlement and livelihood reconstruction/re-establishment of the resettled people in Bulbul village. In order to achieve the stated objectives, the research selected a qualitative research approach and a narrative descriptive study design. The study employed purposive sampling method and empirical data was collected from 2 resettlement sites of Bulbul village, Sites 5 and 6., which was selected due to its ease of road accessibility. For this reason, this thesis relied on the following data collection methods: In depth interviews, key informant interviews, focus group discussions, and document analysis. Participants who engaged in Focus Group Discussion and in-depth interview were also been selected based on their prior participation and detail knowledge of the GG I dam-induced development and resettlement program. With regard to the instruments for data collection, while FGD guide was used for focus group discussants, an interview guide for interviewees and key informants respectively. For data analysis, thematic analysis was used and the collected data was transcribed and interpreted accordingly. Thus, the findings revealed that the dam development and resettlement imposed range of negative effects on livelihoods of the resettled community. In this regard the communities' assets and activities were found declining. In order to improve livelihood status of the resettled people, the study finally recommended that all kinds of community assets should be valued properly during compensation of relocates, attempts should be made by the concerned government body to restore the lost livelihood activities, livelihood associated risks need to be minimized, especial attention should be given to

marginalized people such as women, disabled and elders. On top of these, resettles are expected to be empowered through different capacity building interventions such as trainings.

#### **CHAPTER ONE: INTRODUCTION**

#### 1.1. Background of the study

Development projects such as, dams, roads, reservoirs or oil, gas and mining have caused displacements of people worldwide. Displacement of people as a result of development interventions has been identified as one of the most significant forced migration problem worldwide of our time (Pankhurst and Piguet in Eguavoen and Tesfai 2012). While such projects can bring enormous benefit to the wider section of the community in a country, they also impose costs. For millions of the people around the world; development projects have cost them their homes, their farm lands, their livelihoods, their health and even their lives (Terminisk 2013).

The consequences of the displacement mostly affected land holders and rural households in many ways. First the transfer of land through such projects affects household's assets and the overall sustainability of their livelihoods. Robinson (2003) stressed that forced population displacement is always crisis-prone, even when necessary as part of broad and beneficial development programs because any improvement in social services and facilities for development projects needs land on which people currently have their homes and livelihoods. Second, forced displacement dismantles existing modes of production, disrupts social networks, causes the impoverishment of many of those uprooted, threatens their cultural identity, and increases the risks of epidemics and health problems. Chernea (1997) showed that displacement due to development project has profound socioeconomic and cultural disruption for those evicted as it breaks up living patterns and social continuity.

Although population displacement has been a prerequisite of growing economies especially in developing countries, it affects the livelihoods of the households who are involuntarily displaced to allow such development projects to take off. Cernea (1997) indicated that many governments in developing countries have policies of compensation which mainly depend on cash compensation in dealing with population displacement caused by development projects to the displaced households as stipulated by their proclamations and legal frameworks. However, focusing on payment of cash compensation has limited capacity to improve and/ or restore livelihood of the displaced households. Fernandez and Jayewardene (1998) (cited in Cernea

2000) amongst others refer to the fact that cash compensation is inadequate to re-establish livelihoods and other social losses. They argued remedy to compensate for the loss due to forced acquisition is to pay monetary compensation without consideration of other social consequences and cash is inadequate to regain the lost livelihood and social stability.

Such kind of development project has been a common problem in both developed and developing countries (Endeshaw 2016). One among such development projects is the development of large dams.<sup>1</sup>

In Ethiopian context, development of hydroelectric dams which have undergone in different parts of the country imposed various effects on resettled community. Recent empirical studies indicated that dam development projects caused displacement of thousands of people in various parts of the country (Desalegn 2011). On this regard, development of Tekeze dam swamped a total of 1002.956 ha of communities land (Cernea 1997). According to Kebede (2010), the impoundment of the land by the dam water has brought crisis to the livelihood of those who had land and dislocated. It also made the people from this area to be sharecroppers and agricultural wage laborers thereby making them too vulnerable to effects of the dam. On a study conducted on impacts of the Tana Beles Hydro-Electric Power Project launched in 2005, Sofie (et al. 2019) mentioned that the dam caused displacement of 5,000 rural people, land dispossession and loss of their livelihoods. It was empirically investigated that socio-economic change was faced by 500 farming households who had to relocate their homesteads due to the Koga dam project. The households have experienced the loss of livelihood assets. The Ethiopian Electric Power Corporation Gilgel Gibe Hydroelectric Project Completion Report on Environment and Resettlement (2006) mentioned that the dam resulted in displacement of 738 households out of which 562 households resettled through government assisted resettlement scheme and 144 households preferred to be resettled by them. As mentioned in analysis report of the Gilbel Gibe hydroelectric projects in Ethiopia (The Gilgel Gibe Affair 2008), the reservoir area covering about 34.150 square kilometres, caused in flooding of five hundreds hectares of communities' agricultural land. The dam's reservoir also affected the grazing lands of some 275 nomadic households (about 1,400 people). The analysis report also declared that livelihoods of displaced people as a result of Gilgel Gibe I dam development were diminished by the resettlement

1

<sup>&</sup>lt;sup>1</sup> A dam with a height of 15 metres or greater from lowest foundation to crest or a dam between 5 metres and 15 metres impounding more than 3 million cubic metres (International Commission on Large Dams)

whereby existing problems were accelerated and new problems had arisen without any adequate means being dealt with.

One of the hydroelectric dam projects in Ethiopia, which this study focuses on is Gilgel Gibe I Hydroelectric Dam development project in Jimma zone. Eventhough the case on this dam is researchable and one of the most critical issues pertinent to dam-induced resettlement and its associated effects imposed on livelihoods of resettled households, no research of this sort has been conducted on Bulbul Village before. Therefore, this research was intended to examine the Effects of Hydroelectric Dam Induced Resettlement on the Livelihood of Displaced People: The Case of Resettled Households in Bulbul Village, Jimma Zone of Oromia National Regional State.

#### 1.2. Statement of the problem

Significant number of people have been displaced and relocated as a result of these dam projects executed in different parts of Ethiopia which made hydropower dam-induced displacement and relocation in the country as the "most significant type of movement replacing earlier concerns with resettlement, refugees, returnees and demobilization" (Pankhurst and Piguet 2009: 246). Thus, the Federal GERD Project Office and the Benishangul region government reported that a total of 5,391 households (approximately 20,000 people) were displaced due to this dam development from 14 locations in six weredas of the region, and they were resettled into 17 new villages or settlement centers. 14 villages out of these 17 new resettlement centres had been established: four in Guba (Metekel zone); one in Menge (Assosa zone); five in Tsedal (Kamashi zone); and four in Wembera (Metekel zone). Tafari (2016) revealed that about 15 peasant associations or kebeles have become swayed by impacts of Tekeze dam and the total numbers of affected households were 1,549. In the Awash Valley, pastoralists were severely affected by the Koka dam and irrigation scheme (Gebre 2009). Uncontrolled inundation of the Fincha's reservoir in the Blue Nile basin constructed during the 1960s-70s and extended in 1987 forced about 3,100 farm households to move to former grazing land as well as to the steeper slopes after their houses were flooded. Others migrated to urban areas (Tefera 2006; Tefera and Sterk 2008). At the moment, an international campaign "Stop Gibe 3" is fighting against the displacement of about 3,400 people at the Omo River where the Gigel Gibe III dam will be finalized in 2013. Dam development in the Blue Nile basin has drawn international attention mainly because of hydro-politics over the Nile resources but displacement will certainly be an issue in the ongoing dam projects, such as the Gumara or Ribb dam. Another study on Rebuilding livelihoods after dam-induced relocation in Koga, Blue Nile basin, Ethiopia, Irit Eguavoen and Weyni (2011) analyzes the social and economic outcome of development-induced relocation of 500 relocated households, in particular the sub-set which moved to the nearby town.

Even though such large hydropower dams make an important contribution to the economic growth of mountainous countries like Ethiopia, they are also observed to create an adverse impact on livelihoods of local communities displaced by dams and reservoirs (Kevin, Longyi, & Mark 2016; Singer, Pham, & Hoang 2014). The World Bank's review on its project involving involuntary resettlement from 1986 to 1993 (WB 1996) and the survey on dam projects concluded that the outcomes for most resettled people related to livelihood were unsatisfactory (Scudder 2005b; Scudder 2005a). In this regard, a study conducted by Irit Eguavoen and Weyni (2011), on Rebuilding livelihoods after dam-induced relocation in Koga, Blue Nile basin, Ethiopia, analyzed the livelihood outcome of development-induced relocation of 500 relocated households, in particular the sub-set which moved to the nearby town. This study revealed that landlessness, loss of assets, social disarticulation and unfair compensation were the major livelihood impoverishment risks. It also stated that the communities' social relationships were disrupted and their relationship with host communities became rough. But this study mainly focused on analyzing the social and economic effects of the dam on relocated families which moved few distance from the dam project areas and was no more resettlement. So, this didn't show full picture of affected livelihoods of households caused by resettlement. The assessment also showed that, while the Dam have had wsome positive benefits, it also has detrimental impacts on affected rural communities such as loss of fertile farmlands and homes to flooding and deprived rural access to resources. The major limitations of this study was that it didn't give emphasis on how the resettlement process looked like and didn't mentioned level of community participation during resettlement process. According to Gilgel Gibe Affair (2008); a fact finding mission made an investigation on Impact of Gilgel Gibe hydroelectric dam plants (GG I, II and III). The assessment emphasized on environmental and social impact of the GG I dam on relocated household from the reservoir in 2001 which have been resettled at Kersa district. Findings of the independent mission revealed that the resettlement was far from good practice. But; the assessment was more of a desk research conducted long years after the resettlement

carried out, very general and did not see effect of the dam on livelihoods of resettles at Bulbul village. In general, the study considered three types of gaps. Firstly, methodology gap i.e. the only study conducted before was solely depended on desktop review. Secondly, gaps in research area in which the previous study foccussed only on social and environmental impact of the dam. Other pillars of livelihood were neglected. Thirdly is time gap which denoted that the study conducted before was carried out a decade before so that changes braught later on were neglected.

The data obtained from Ethiopian Electric Power Corporation (EEPC)-Oromia Region shows that about 600 households (5,000 people) dislocated in the aftermath of the GG I dam construction from Kersa and Omo Nada districts have been resettled to 9 different sites located some 5-30 km from the reservoir. Out of the 9 sites, 7 of them are at Kersa district. About 164 households have been resettled to Sites 5 and 6 of the kersa district which is named after a place called Bulbul. Even though these households are victimized as a result of the dam-induced resettlement, no previous studies have been conducted focusing on livelihood effects of the dam-induced resettlement. Therefore; this study then explored livelihood effects of the displacement and resettlement caused by the dam development.

#### 1.3. Objectives of the study

#### 1.3.1. General objective

To explore the effects of hydroelectric dam induced resettlement on the livelihood of displaced people: the case of resettled households in Bulbul Village, Jimma Zone of Oromia National Regional State

#### 1.3.2. Specific objectives

- To describe the process involved in resettling the displaced households to Bulbul village
- To explore the negative effects of the dam-induced resettlement on livelihoods of households in the village
- To explore the community's resilience and coping mechanisms to tackle the negative effects of dam-induced ressettlement.

#### 1.4. Significance of the Study

Development induced resettlement is long considered one of the challenges of attaining sustainable development goals. The phenomenon is considered development challenge because development projects that displace people result in difficult and deplorable resettlement experiences like impoverishment and disempowerment. Development induced displacement, if unmitigated, often gives rise to severe economic, social, environmental, and political risks. This study which explored the effect of Gilgel Gibe I Hydroelectric Dam Development and Resettlement on Livelihood of Households in Bulbul Village will contribute to the efforts of finding out mechanisms by which the negative effects can be mitigated by providing evidence based information to policy advocates and makers. It will also be used as an important input for further researches. This means it will produce preliminary data and evidence to those who want to conduct further research in the area. Moreover, the findings are very informative of dam induced resettlement and its negative effects that can be used by the concerned government bodies, potential displaces and other stakeholders in relation to dam development and resettlement. All these are potential significances from which atleast one among them could be practical.

#### 1.5. Scope of the study

This study explored the effect of dam induced resettlement in a case of Gilgel Gibe I Hydroelectric Dam. The area is found at 35 km apart from Jimma town, alongside of the main Jimma-Addis Ababa road. The study engaged in the description of the effects the project on livelihood of the households in the study area after its implementation. It employed qualitative approach and narrative study design.

#### **Definitions of basic terms**

The following terms described hereunder will be used in the context:

**Large dams:** A dam is a barrier that stops or restricts the flow of water or underground streams. It also means Dam, structure built across a stream, a river, or an estuary to retain water.

**Hydropower:** is power derived from the energy of falling or fast-running water, which may be harnessed for useful purposes.

**Resettlement:** is the process of moving people to a different place to live, because they are no longer allowed to stay in the area where they used to live.

Displacement: is the situation in which people are forced to leave the place where they normally live. Downing (2002) indicated that the term displacement is used most often in the context of relocation related to deprivation of access to existing land and its resources, unaccompanied by adequate support mechanisms for the affected people and involves physical eviction from a dwelling and the expropriation of productive assets to make possible an alternative use. The phenomenon of displacement is thus not limited to physical dislocation from the current residence but is mainly associated with the loss of existing economic and social facilities and of access to the relevant resources, with no benefits gained in return. Cernea (1996) further explained that displacement is mostly applied to the situation of individuals, tribes and communities that have been cut off from their current socio-economic base and as a result have seen their standard of functioning deteriorate significantly. Cernea (2000) showed that displacement can be experienced in many forms including the people who realize less benefit as a result of development process and those who face severe consequences and for those individuals and communities who involuntarily move leaving behind homes, networks, jobs, social capital and emotional ties to place.

**Relocation:** refers to the physical shift of individuals or groups from their usual home (place of origin) to another location (place of relocation). According to Robinson (2003) relocation may be voluntary or involuntary as with case of migration of people from places of origin in the search of better economic opportunities in other places or involuntary as happen with forced displacement of people due to violent conflicts, may be temporary or permanent. He added that voluntary movement can also contain the elements of coercion just as involuntary movement is not without rational decision making strategic choice.

**Livelihood:** a set of activities, involving securing water, food, medicine, shelter, clothing and the capacity to acquire the above necessities working either individually or as a group by using

endowments (both human and material) for meeting the requirements of the self and his/her household on a sustainable basis with dignity. The activities are usually carried out repeatedly.

The Displaced Persons (DP's): are those who are forced to flee or move out of their land when the dam development project requires the acquisition of their homesteads.

**Development-induced Displacement and Resettlement (DIDR):** the forcing of communities and individuals out of their homes, often also their homelands, for economic development. It is a subset of forced migration.

Dam-Induced Displacement and Resettlement (DIDR): resettlement occurred due to dam

The Project Affected Persons (PAP's): are those who sacrifice their livelihood fully or partially after being displaced. In some cases, their land is acquired and in others, the common property resources like forests and fishing ground, affecting their livelihoods.

**Community:** Social groups of any size whose members reside in a specific locality, share government, and often have a common cultural and historical heritage.

**Landlessness:** If people are removed from their land they are also removed from the main productive resource. Both people's commercial activities and subsistence livelihoods are removed. In this case, the people lose both their natural resources and their human-made capital.

**Joblessness:** The risk of losing employment is very high in displacements and to create newly job opportunities in the new established communities is very difficult and requires substantial capital.

**Food insecurity:** The forced removal of communities often increases the risk that people will temporarily or chronically be undernourished. Defined by Cernea as, "calorie-protein intake levels below the minimum necessary for normal growth and work"

Loss of access to common property and services: For poor people, particularly for the landless and asset less, loss of access to the common property assets that belonged to relocated communities (pastures, forested lands, water bodies, burial grounds, quarries, etc.) results in a significant deterioration in income and livelihood levels. Typically, losses of common property

assets are not compensated by governments. These losses are compounded by the loss of access to some public services, such as school, losses that can be grouped within this category of risks.

#### CHAPTER TWO: REVIEW OF RELATED LITERATURE

#### 2.1 Introduction

This chapter deals with the review of literature from different sources which are relevant to the study on the effects of Gilgel Gibe I Hydroelectric Dam Development and Resettlement on the Livelihood of households in Bulbul Village. It reviews the available works of literature on the topic to see how other researchers /scholars have investigated the issue under the study. To this end, this chapter presents some empirical research conducted on the issue in the Ethiopian context.

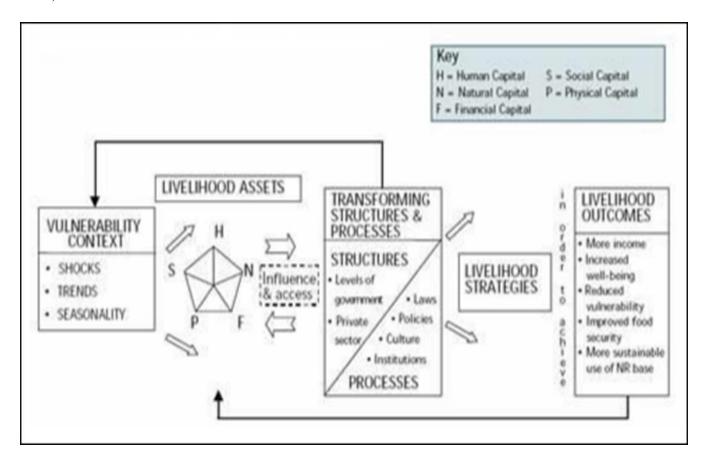
#### 2.2 Conceptual and Theoretical Framework

Here the research discusses the theoretical framework of sustainable livelihood approach and the key concepts in it. After Chambers and Conway (1992) forwarded the definition of sustainable livelihoods, broadly differing models and frameworks for analysis of livelihood have been formed by a range of organizations and authors. These models and frameworks have been adapted to satisfy variety of purposes. This research employed the sustainable livelihood framework made by the British Department for International Development (DFID) near the end of 1990s. This framework is considered as broadly utilized one intended to analyze the framework so as deemed at analyzing livelihoods and it is believed to enhance understanding of livelihoods, mainly of the poor people (DFID 1999). It adapts the livelihoods definition given by Chambers and Conway. According to them "a livelihood comprises the capabilities, assets and activities required for a means of living. A livelihood is sustainable when it can cope with and recover from stresses and shocks and maintains or enhances its capabilities and assets both now and in the future, while not undermining the natural resource base." (Chambers and Conway 1992 cited in DFID 1999)

According to Ellis (2000), the very important thing to be addressed in livelihoods analyses is the context and what combination of livelihood assets result in the ability to follow what combination of livelihood strategies to obtain what livelihood outcomes?

Sustainable Livelihoods Framework is one of the most widely used livelihood frameworks perhaps for it adequately answers the above question. The framework summarizes the main

components of livelihoods and complex relationships among the components such as transforming structures and processes, vulnerability contexts, livelihood assets, livelihood strategies and livelihood outcomes. The framework is used not only to present the main factors that affect people's livelihoods, and typical relationships among them but also it can be used in assessing the contribution to livelihood sustainability made by the existing activities (DFID 1999).



Source: DFID Sustainable livelihood guidance Sheet (1999)

#### 2.3 Overview and trends of hydropower dams and resettlement

#### 2.3.1 Global trends of hydropower dams and resettlement

Rivers have played a major role in shaping the earth's physical and ecological landscapes through their unique hydrologic characteristics, as well as shaping cultural landscapes by providing food, water, and other ecosystem services. With the rise of ancient civilizations came a

rise in building dams and diversions for water storage, irrigation, transportation, and flood control. As early as 6500 BC, the Sumerians constructed dams across the Tigris and Euphrates rivers to provide flood control and irrigation for crops (McCully 2001). By the first millennium BC, stone and earthen dams were erected on nearly every continent, enabling the acquisition of water and food to sustain population growth. Dam technology advanced slowly until the Industrial Revolution when larger dams were built in less time and from man-made materials (DiFrancesco and Woodruff 2007). Today, more than 45,000 large dams (greater than 15 m in height) exist worldwide (DiFrancesco and Woodruff 2007), that provide water supply, flood control, waterpower for mills, hydroelectric power, improved navigation, recreation, and waste disposal (Graf 2002).

The rapid increase in dam projects during the early and middle twentieth century was driven by socio-economic and political pressure to increase the quality and quantity of water for production while simultaneously minimizing its destructive potential (Born et al. 1998, Johnson and Graber 2002).

The World Commission on Dams (2001), in its report mentioned that dams in the last century were seen as a symbol of industrial progress of man's ability to tame rivers and harness nature. They symbolized various kinds of power-political, economic, social and electrical. For many governments, building large dams was perceived as a demonstration of their nations' strength. Before 1970s, dams were considered as a symbol of human achievement and progress, economic potential and power. According to Orr (2001), construction of large dams was largely unchallenged as a means of achieving development and economic progress between the 1930s and the 1970s. In the last quarter of the twentieth century, developing countries assumed them as a fashion in which over 90% of dam constructions carried out under this period.

The World Commission on Dams (WCD 2000) also indicated that one-third of the countries in the world rely on hydropower for more than half of their electricity supply. By the late of 20th century, there were over 45,000 hydroelectric dams (those with the normal water rise level from 5 to 15 m height and water reserves for more than 3 million m3) built in over 140 countries, which has displaced about 4080 million people (World Bank 2004). Since 2004, the number of hydroelectric dams and displaced people has increased rapidly. These dams often bring loss of agricultural lands, forests and grasslands in the upstream watershed areas due to inundation of

the reservoir area (WCD 2000), alteration of traditional resource management practices (Rooder 1994), displacement and impoverishment of people, and the inequitable sharing of environmental costs and benefits (WCD 2000). Conversely; these hydroelectric dams development can bring many benefits such as: providing a clean energy source; using water for multiple industries; developing infrastructure; and improving social justice, but at the same time it also creates negative impacts on environment and society, especially for those people directly affected (World Bank 2004).

Countries have thus different histories of dam development and resettlement. China for instance has a history of ambitious water dam development projecs. The country has built 87,000 dams since 1949 which made the country a home to about half of the world's 50,000 dams. Having a storage capacity greater than 3 million cubic meters (Tilt and Gerkey (2010)).

According to Manila (1997), the official Chinese government declared that dams have displaced 10.2 million people in china which is 32% of all development related displacement in the country between 1950 and 1990. Similarly, Pune (1996), indicated large dams in India displaced an estimated 16 to 38 million people in the same time period. Among projects funded by the World Bank, large dams accounts for 63% of displacement worldwide (The World Bank (1996)).

Hydropower development was first considered in SE Asia by the Mekong Committee, an intergovernmental agency established in 1957 to represent the interests of Thailand, Laos, Vietnam, and Cambodia. The Mekong Committee was backed by the United Nations with considerable financial and technical support from the USA (McCully 2001, Molle et al. 2009).

The number of people affected by Development-Induced Displacement (DID) have been rising steadily, and Dam-Induced Displacement is an important part of this, with effects that have long been studied, particularly in Africa with the Kariba dam (Colson 1971; Scudder 1996; Cernia 2000). In Ethiopia, people are internally displaced regularly for various reasons but the literature has been dominated by studies dealing with resettlement and villagization. In Ethiopia, emphasis given to the study of development-induced displacement in general and dam-induced displacement in particular has been too little. It is on drought and famine initiated resettlement and villagization programs that many works can be found. It is regarding this coerced and improperly handled resettlement and villagization programs that several works on the literature of displacement in Ethiopia are available (Pankhurst and Piguet, 2009).

#### 2.3.2 Effect of hydropower dams and resettlement on livelihood

It is crucially important to consider the economic and social effects of dams equally with the social, cultural and environmental (physical impacts). Therefore, all these should be seen as interrelated due to the reason that they have cumulative effect after dam construction has taken place though don't seem to be initially. However; planners responsible in predicting all effects of such dams mostly have not considered any reason to link or foresee such link to each other rather see environmental impacts as mutually exclusive from the socio-economic one (Dixon et al. 1989).

Chernea (1997) showed that displacement due to development project has profound socioeconomic and cultural disruption for those evicted as it breaks up living patterns and social continuity. He further added forced displacement dismantles existing modes of production, disrupts social networks, causes the impoverishment of many of those uprooted, threatens their Cultural identity, and increases the risks of epidemics and health problems. So Robinson et al, (2003) pointed out that the livelihoods of many involuntarily displaced households are affected as they are not properly resettled and rehabilitated. Notwithstanding their significances, dam construction projects have also adverse or negative effects on social, economic and physical environments (Dixon et al. 1989).

The social effects of a dam include the involuntary resettlement of people, disruption of their production systems and lifestyles and the impact of the relocation on the population inhabiting the new host areas (Dixon et al. 1989). Besides, problems such as lower amounts and delays of payment and lack of participation in the resettlement process cause dissatisfaction in resettlements and hence affect the sustainability of the projects (WCD 2000). At this juncture; Cernea (1997) indicated that many governments in developing countries have policies of compensation which mainly depend on cash compensation in dealing with population displacement caused by development projects to the displaced households as stipulated by their proclamations and legal frameworks. However; Fernandez and Jayewardene (cited in Cernea, 2000) amongst others refer to the fact that the cash compensation is inadequate and has limited capacity to re-establish livelihoods and other social losses. They argued remedy to compensate for the loss due to forced acquisition is to pay monetary compensation without consideration of other social consequences and cash is inadequate to regain lost livelihood and social stability.

In recent years, many hydroelectric power projects have been built in Vietnam such as Son La, Tuyen Quang, Hoa Binh, and Ban Ve hydroelectric plants. Most of the hydroelectric dam projects in Vietnam have been constructed in mountainous environments and areas of high rural poverty, thus having a disproportionate effect on those people living in these isolated areas. With the construction of hydroelectric plants, it first requires the establishment of water reservoirs and dams. With such activities, the establishment of water reservoirs and dams will directly affect people and landscape at the local area, by flooding land they previously occupied and cause them to be moved elsewhere. In Vietnam, construction of a hydroelectric dam has significant benefits for the country by ensuring national energy security; it also contributes considerably to socioeconomic development, and recent simulation studies indicate dam operation can decrease discharge during the rainy season by 35% and increase the release of water in the dry season by 226% (Le.etal. 2014).

Concurrently, dam development for hydroelectric power also negatively affected local environment (water quality and quantity), degradation or alteration of river flows, cultural and economic effects of people at the locality (Cernea 1997 and Tilt 2009). These types of short-term effects along with long-term changes, especially to the type of rural livelihoods undertaken by displaced people, has only been investigated in a small number of local studies in central Vietnam (Obour et.al. 2015). Despite the growing reliance on hydropower in Vietnam, there have not been many successful lessons established to ensure that affected people will be able to maintain a sustainable livelihood into the future. Therefore; large hydropower dams make an important contribution to the economic growth of many mountainous countries, but such dams are also observed to create an adverse impact on local communities displaced by dams and reservoirs (Kevin, Longyi, & Mark 2016; Singer, Pham, & Hoang 2014). These types of displacements are followed by resettlement.

Resettlement, on the other hand, induces fundamental changes to people's lives and livelihoods such as landlessness, homelessness, joblessness, marginalization, and loss of access to common property (Cernea 1997) and some of these effects can be long-lasting (Webber & McDonald 2004). Resettled people often have to reconstruct their livelihoods under conditions of resource scarcity and some have failed to create sustainable livelihoods leading to long- term hardship and impoverishment (Cernea 2008; Scudder 2001). Scudder (2005) identified that only 7 per cent of

the large dam projects (three out of 44 cases surveyed) improved the living standards of the resettled people while living conditions worsened in 82 per cent of projects (Ofoezie 2002; Ogbeide and Uyigue 2004). The construction and operation of these dams have yielded many benefits; nevertheless, they have lots of negative social, health and human impacts (Webbe 1981; Williams and Wolman 1984; McCartney and King 2011).

Even though estimated number of 15 million people displaced by development projects worldwide, there is no figure for Africa specifically. When African countries began gaining independence in the 20th century, the implementation of development projects was considered a significant step in improving people's economic status. A vigorous drive towards economic development led to the construction of several large-scale dams and are likely to have caused the displacement of millions of people, though dam-specific displacement figures are not available for the continent as a whole (IDMC, 2016). In many African countries with relatively small populations, the number of displaced people may be lower, but the proportion of the population affected by development-induced activities is nevertheless significant, sometimes it is even higher than that of the Asian cases (Koenig 2001).

Construction of the Aswan High dam in Egypt in the 1950s displaced 100,000 people belonging to the Nubian tribe. According to Stanley, (2004) for example, the Akosombo Dam in Ghana which displaced 80,000 people, approximately 1% of the country's population.

In Mozambique, 42,000 people were displaced by the Cahora Bassa dam in the 1970s. In the 1980s, 26,000 people were displaced to make way for the Dadin Kowa dam along the Gongola River in Nigeria. In the 1990s, the construction of the Katse and Muela dams as part of the Lesotho highland water project affected close to 20,000 people. The Inga dam III, construction for which has been planned for decades, is set to displace more than 10,000 people in the Democratic Republic of Congo.

#### 2.3.3 National trends of hydropower dams and resettlement

Water dam-induced displacement and relocation has a history in Ethiopia. A prominent case is the first Gilgel Gibe dam, that between 1985 and 1996, resulted in the dis-placement of "some 10.000" people (Kebede 2009: 50). In the Awash Valley, pastoralists were severely affected by the Koka dam and irrigation scheme (Gebre and Kassa 2009). Uncontrolled inundation of the

Fincha'a reservoir in the Blue Nile basin constructed during the 1960s-70s and extended in 1987 forced around 3.100 farm households to move to former grazing land as well as to the steeper slopes after their houses were flooded. Others migrated to urban areas (Tefera 2006; Tefera and Sterk 2008).

Ethiopian Ministry of Mines and Energy (MoME) (2007), in its annual report, indicated that hydropower accounts for over 85 percent of Ethiopia's 767 MW of existing generating capacity, and comes from eight dams (see Table 1). Ethiopia's hydropower potential is estimated to be one of the highest in Africa (between 30.000 and 45,000 MW) and comes from eight major dams (see Table 1). Except the Ethiopian Renaissance Dam, the power sector was supported by five main donors, mainly, the World Bank, the European In-vestment Bank, the African Development Bank, the Chinese and the Italian government. Their contribution to the ongoing generation projects is summarized.

Table 1: Operational hydropower plants, their reservoir coverage and people dislocated

S.no	Name of hydropower dams in Ethiopia	Total reservoir coverage (area) by the dam project	No of farming households dislocated	No of people dislocated
1	Awash I HPP (Koka)	236 km2	500	3,100
2	Finchaa HPP	439 km2	3,100	15,500
3	Tekeze dam	2,005.91 ha	1,549	NA
4	Gilgel Gibe I	48 km2	738	> 5,000
5	Gilgel Gibe III	211 km2	710	3,400
6	Tana Beles Hydro-Electric	1,500 KM2	320	1,600
	Power ( Dam on lake)			
7	Grand Renaissance Dam	1,874 km2	5,391	20,000
	(GRD)			

Source: Compiled data

In the case of Ethiopia, Gilgel Gibe I Dam construction has caused the displacement of more than a hundred households and the villagization of 1964 households making up about 10,000 people displaced.

Studies indicated that after people are displaced due to development projects, they become dependent on family support, decrease their basic consumptions items including food and involve household members in low paying jobs like daily labor work, abandon social solidarity

and related institutions (Iddir, Ekub and Zikir) which have significant value for their livelihood and existed for years (Tesfa 2014).

In general, World Bank's review on its project involving involuntary resettlement from 1986 to 1993 (WB, 1996) and the survey on 50 large dam projects around the world (Scudder 2005b; Scudder 2005a) concluded that the outcomes for most resettled people related to livelihood were unsatisfactory.

#### CHAPTER THREE: RESEARCH AREA AND METHODOLOGY

#### 3.1 The Study Area and Gibe Dam

Kersa is one among the districts in Jimma Zone of Oromia Regional State. Kersa is located at 320 km South West of Addis Ababa. Its altitude ranges between 1740 and 2660 meters above sea level and consists of 10 percent highlands) and 90 percent mid-altitude areas. The district lies between latitudes 7° 42′50′′N and 07°53′50′′N and between longitudes 37° 11′22′′E and 37°20′36′′E. The area has a sub-humid, warm to hot climate which receive an average annual rainfall of 900-1300 mm. The main rainy season in the district is from March to September. Temperature is moderate, from 20- 28°C, with variations across altitudes. The district is bordered on the South by Dedo, on the Southwest by Seka Chekorsa, on the west by Mana, on the North by Limmu Kosa, on the northeast by Tiro Afeta and on the Southwest by Omo Nada (Wikipedia 2020).

According to population project report of CSA (2013), the total human population of kersa district at 2021 is projected to be 234,855 of which 50% is reported to be male. The main language spoken in the area is Afan Oromo, and almost 99 percent of the households are Muslim. The average family size in the areas is seven persons per household. The main socioeconomic activities of the local communities in the district are mixed farming involving the cultivation of staple crops (maize, teff and sorghum), and cattle and small stock raising. About 58.6% of the total land of the district is arable of which 37.5% is under annual crops, 17.3% is pasture, 6.0% is forest, and the remaining 18.9% is considered swampy, degraded or otherwise unusable. The livestock resource of the study district comprises of 184,551 cattle, 12,364 sheep, 7,032 goats, 3,138 horses, 2,440 mules, 112 donkeys, 79,582 poultry, and 12,770 bee colonies. Livelihoods within the catchment are very much linked to the sustainability of local ecosystems. Agriculture is by far the dominant activity. People in the area generally produce more than half of their annual food requirement in their own fields. The principal crops grown are maize, sorghum, teff and coffee, with maize both the most important household food source and the largest cash earner. The main livestock kept are cattle, goats, sheep, donkeys and chickens. Market access is considered good due to the number of all-weather roads in the area and its

proximity to urban market centers. Land area cultivated, livestock ownership (especially oxen) and household size are the chief determinants of wealth in area households.

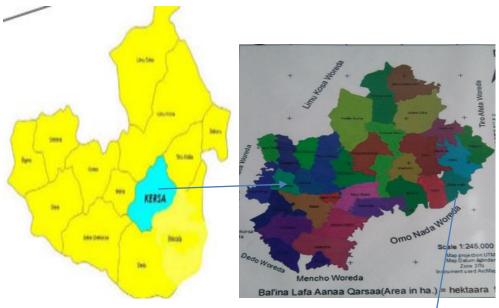


Figure 1: Map of Jimma ZoneFigure 2: Map of Kersa District

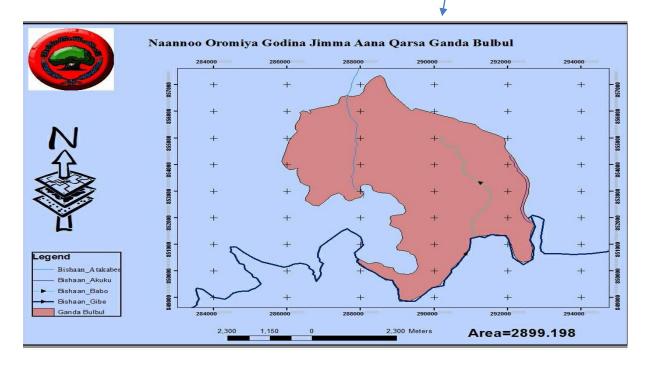


Figure 3: Location of the study area, Bulbul kebele

Source: Land Administration Office of Kersa District

The Gilgel Gibe dam is located on the Gilgel Gibe river, a small tributary of the main Gibe river situated approximately 260 kilometers southeast of Addis Ababa. The project was financed by the World Bank (USD 200 million), the European Investment Bank (EUR 41 million), the Austrian Development Cooperation and the Government of Ethiopia. The total cost of the project has been approximately 280 million of Euro. The construction work has been provided by Salini Construction involving more than 15 international companies.

The project dates back to 1985 but it was effectively built between 1997 and 2003. It has been operational since February 2004 and generates 183 MW. The project consists of a 40 metre high dam which created a reservoir of 48 square kilometers, with an underground power house with three turbines. The creation of the reservoir resulted in the displacement of 738 households totaling 5.000 people. Nine resettlement sites have been formed due to the dam construction of which two of them (site 8 and 9) were located at "Tiro-Afeta" district of Jimma Zone and the remaining 7 of them at Kersa district. In addition; these 7 sites are further located at 5 different kebeles of the district, Kersa, of which Site-1 resettled at "Siba kebele", Site-2 at "Bola Waja kebele", Sites 3 & 4 at "Gello kebele" and Site-7 at "Titimbile kebele". The study area, Bulbul village, is located at Bulbul kebele having two resettlement sites (5 and 6) in it which is named after Bulbul. It is located in Kersa district, Jimma Zone of Oromia National Regional State. The village is found at 30 kms North-East of Jimma town on the way Jimma to Addis Abeba main road and 320 kms from south west of main capital Addis Ababa. Bulbul is also found few kms from GG I hydropower dam which is one of the World Bank projects initiated in 1994 to enhance industrial development and increase its national income (Hydroelectric Power Dam 2011).

The dam was completed in 2004. The plant includes a reservoir of about 0.917 cubic kilometers created by a dam about 40 meters high. Out of the 738 households in 9 resettlement villaged, 179 of them dislocated due to the dam construction have been resettled to the so called Sites 5 and 6 which are named after Bulbul. These households were displaced from five localities located in three districts. Among the 179 households, 42 of the them came from Tiro of Kersa district, 120HHs from Dimtu, Kotich Keesa & Kotich Maru kebeles of Tiro Afeta district and 17HHs from Degoso kebele of Omo Nadda district. As part of the resettlement program, 2.5 hectares of

land have been provided to each household at the new site-Bulbul village (Ethiopian Electric Light Power Generation Authority of South-West Region.

#### 3.2 Research Approach

To achieve its objectives, this study uses qualitative research approach due to the reason that the researcher needs to explore the problem or issues under the research question. This exploration was needed, in turn, because of a need to study a group or population, identify variables that can then be measured, or hear silenced voices. Besides, we use the qualitative approach as it allows to give complex and detailed understanding of the issues under the study. This detail can only be established by talking directly with the people, going to their homes or work place and allowing the to tell their stories that they encountered. Here the approach also allows to study setting or contexts in which the research participants experienced problems and address issues. The approach was deemed at yielding detailed and comprehensive accounts of different social phenomenon through the collection of observations, interviews and documentary data, which are triangulated (i.e. compared and contrasted with one another). It was thus suggested that the effect of Gilgel Gibe I dam development and resettlement on the livelihood of households' in Bulbul village be studied utilizing qualitative approach where the researcher planned to participate and observe within the society. The study was conducted during four weeks from June to July 2020 in Bulbul village.

Through my presence, I was able to witness and sought to make sense of the surroundings, giving priority to and accepting as "truth" the explanations provided by the inhabitants and the confirmation of such by the context.

#### 3.3 Study design

Research design stands for planning of the methods to be adopted for collecting the relevant data and the techniques to be used in their analysis, keeping in view the objectives of the research, time and money. This study employed a descriptive narration design whereby the researcher focuses on experiences as expressed in lived and told stories of individuals or research participants. Thus, it was designed accordingly and the required data collected and analyzed using the research techniques within the domain of qualitative methodology. Here the researcher also

collected information about contexts of those participants in which their stories were written and the individuals' stories were situated within padticipants' experiences pertinent to their jobs, homes, social conditions or relations, resettlement time and place. Above all, it identified, explored and linked the existing societal circumstances, on the surface, have connection with one another.

#### 3.4 Sample Size Determination and Sampling Technique

The study employed purposive sampling. According to Creswell (2003), purposive sampling aims to select participants that best answers the research question so that no attempt will be made to randomly select research participant. During this study, empirical data was collected from 2 resettlement sites, Sites 5 and 6. These two sites were selected due to the reason that they are in easily accessible location for the researcher whereas the rest sites are found very far from the main road whereby transportation access towards them was found difficult. Since the study had limited resources (time, money and human power), targetting on sites 5 and 6 was economical and resource wise. Besides, all the sites have similar socio-demographic characteristics so that taking data from the two sites represented the rest.

Sampling was done as an important aspect for framing the data collection and analysis activities. Here, sampling was undertaken taking the 'trade off' between cases (settings, individuals and activities) selected resources (time and financial capacity) of the researcher, breadth and scope of the study and the number of sites into consideration. Participants were sampled more preferably on a purposeful basis to generate a more comprehensive picture of the studied phenomena and more thoughts were obtained. Four weeks period was allocated for observation to sample common activities that occur in the study setting. In doing so, a description of the social setting was generated.

Therefore, the selected one to one interview participants were individuals which were affected by the dam-induced resettlement program. In addition, focus group discussions were held in two groups, one group with men households and the other with female ones. The participants were selected based on specific traits such as their availability before and after resettlement, participation and knowledge in the resettlement process (elders were given priority), sex (women were given equal chance), etc. Availability before and after resettlement denoted that the

resettlement program carried out long years before so that those who were present before, during and after the resettlement were given priority to participate in the participants selection. In this regard, elders were most likely eligible for this selection. Within the displaced community there were public figures or community leaders who could explain the effects of the dam development project. Within the village, the communities have representatives who were following the implementation of the project, and after live in the community. The FGD also addressed issues of those even couldn't have know how about the project.

Participants who engaged in Focus Group Discussion were also been selected based on their prior participation and detail knowledge of the GG I dam development and resettlement program, for instance, their participation in compensation committee member. Therefore, in this thesis participants were selected based on their detail knowledge of the area and the development project targeted in the study. Hence the selected participants were supposed to be a better source of information about the issue at hand. Participants for interviews were informed of the purpose of the study participating in the study.

#### 3.5 Data collection methods

This research employed considerable use of participant observation, supported by in-depth interviews, key informant interviews and Focus Group Discussion (FGD). Issues considered on the observation encompassed looking the degraded agricultural land resettles, grazing lands, availability of agricultural productions, means of livelihood activities, household assets and conditions of their home. Here the researcher watched events, situation and activities from inside the community through taking part in it but not as an outsider. Thus the researcher observed on the events such as funerals, activities for instance interaction during market days, situations like community meetings.

#### 3.5.1 In-Depth Individual Interview

This study was intended to explore the livelihood situation of displaced households; their experience of the effects of the resettlement, the adverse effect of the dam development and resettlement on the living condition of the affected peoples. In-depth interviews are those interviews that are designed to discover underlying motives and desires (Kothari, 1990).

Kothari (1990) added that such interviews are held to explore the needs, desires and feelings of participants. For successful implementation of the interview method, interviewers should be carefully selected, trained and briefed (Limb & Dwyer, 2001). Qualitative data was collected using interview guides. Interviews are most useful when you need to know about people's experiences or views in some depth. Patton (2002) characterizes the research interview as a strategy to elicit meaning from the participants that a researcher cannot directly observe.

A total of 12 participants from resettled households affected by the dam-induced resettlement have participated for the interview. This numbe was determined following data saturation method whereby purposively selected participants were interviewed one after the other until redundant responses were obtained. This shown that saturation is reached so that conducting additional interviews would be redundancy. Thus we stoped there. Using this; the number 12 was determined. The participants selected in the study site were the affected or resettled people in one way or another and interviews were made using reports of how the resettlement and compensation process has been implemented. Special attention was paid in selecting representative participants through involving local leaders and influential persons during the selection and cases that represented vulnerable people.

#### 3.5.2 Key informant interview

Key informant interview has been used to generate data concerning the issue under study. In this regard, by allowing the researcher to generate data concerning the effects of the dam associated with the human, social, financial, physical and natural capitals of the community. This method contributes to presenting a better picture of the effects of the dam-induced resettlement.

Four key informants of this study were selected on the bases of their specialized knowledge of the issue under investigation. Accordingly, informants from the previous kebele adminstration, influential persons, government representatives and Development Agent (DA) were selected. The rationale behind selecting the DAs was because of their better data based knowledge regarding the households' livelihood activities (especially agriculture) than anyone in the area.

# 3.5.3 Here, the basic assumption behind selecting key-informants from the previous compensation committee was for they would be more knowledgeable about the effects of the dam and resettlement due to their long stay and better knowledge than others. Focus Group Discussion

Focus group discussion helps the researcher to obtain rich data from the participants owns words and it can receive a wide range of responses during one meeting. Participants can also be asked questions of each other, lessoning impact of researcher bias and helps people to remember issues they might otherwise have forgotten. It helps participants to overcome inhibitions, especially if they know other people in the group (Dawson 2007).

In this study, the FGDs comprised of 8 members each were conducted in two groups i.e. men and women groups. Women FGD was organized just to give equal room for their participation so that their concerns properly reflected. Whereas elders' FGD was organized as per the reason mentioned beforehand. The group discussions were facilitated by two persons in which one person facilitates and the other took notes.

#### 3.5.4 Document Analysis

Document analysis is a form of qualitative research in which documents are interpreted by the researcher to give voice and meaning around a study topic. Analyzing documents incorporates coding content into themes similar to how focus group or interview transcripts are analyzed (Bowen, 2009). It is invaluable for triangulation which provides a confluence of evidence that breeds credibility. O'Leary (2014), elaborated that the document analysis involved gathering relevant texts about the study, assessing authenticity of documents, asking questions about the document to be analyzed (e.g., Who produced it? Why? When? Type of data?) and finally exploring contents under the analysis. The researcher treats the document like a respondent or informant that provides the researcher with relevant information.

In selecting the literatures, credibility and recentness of the sources were taken into account. Therefore; regarding credibility, those published sources were selected with first priority whereas the unpublished were taken in areas where literatures are scarce.

In this study, documentary review/analyses were used to understand the trends of dam-induced resettlement as current social issue in context of worldwide in general and in Ethiopia in particular. It helps to give an insight about policies and strategies of development induced displacement; and problems with its applications. Any documents and literature that adds value in answering the research objectives were assessed and analyzed. Therefore; the document analysis used by this study supported and strengthened its findings through providing supplementary research data.

#### 3.6 Data Source

The pertinent data to be gathered for the study was primary data obtained from using the above method and secondary data such as reports, policy documents, published journals, newspapers, world wide web pages, topographic sheets: scale from EMA (Ethiopian Mapping Authority), Demographic Data from Central Statistical Agency and Digital Photograph from Study area from their respective sources to conduct this study.

## 3.7 Method of data analysis

According to Cressewel (2003), the process of data analysis involves making sense out of the text and image data. It involves preparing the data for analysis, moving deeper and deeper into understanding the data, representing the data, and making an interpretation of the larger meaning of the data.

In this study, the researcher first organized the paper and prepared the data for analysis. This involved transcribing in-depth interviews, typing up field notes, or sorting and arranging the data into different types depending on the sources of information. Then the ethnographer read through all the data and obtained a general sense of the information which helped to reflect on its overall meaning by getting general ideas of what the participants said.

According to Rossman & Rallis (1998); the researcher will use open coding and organize the material into "chunks" before bringing meaning to those called "Chunks" (Rossman & Rallis 1998: 171). Therefore, thirdly, the researcher also opens coding. The researcher then made a list of all topics based on the codes and observation made on the qualitative data then clustered

together with similar topics and then identified major topics, unique topics, and leftovers. Then based on the connection between different topics the researcher reduced total list of categories by grouping topics that related to each other. Therefore, based on the emerged relationships between the categories; themes were developed and thematically analyzed and interpreted so that the stage of the findings of the study was reached.

Thus; by employing the aforementioned method, the study undertook a thematic analysis of changes in the households' livelihood status (including main access to different resources such as land and other socioeconomic aspects) before and after their resettlement and identified the similarities and differences in their livelihood status. Moreover; it analyzed how these changes came about and how people perceived them, from the perspective of dam development and resettlement. At this juncture, the ethnographer made content analysis: which are more interpretive analysis of the response of the research participants as well as what may have been inferred or implied was made by relating the responses with theories and previous research findings in the literature review. Moreover; desk review of secondary documents such as EIA report, project completion report, Disaster Prevention and Preparedness Bureau (DPPB) documents, etc. were utilized for the analysis.

The analysis was done by taking the data through a qualitative method based on the objectives and research questions set beforehand.

## 3.8 Ethical considerations

The consents and official arrangements of all the government offices and study participants were properly communicated by the researcher. The interviews were conducted if and only if the participants were willing to respond. Before commencing the data collection, the researcher explained the purpose of the study, how the information collected will be utilized and the procedure of the data collection process. The respondents were assured that the information they provide would be kept confidential.

## CHAPTER FOUR: RESULTS AND DISCUSSION

This chapter deals with the analysis and presentation of data obtained from primary sources of information and desk review gathered using different techniques employed in the process of data collection. The study attempts to answer the research questions concerned with the effects of development-induced resettlement in line with the livelihoods of displaced households. The following sections also describes the challenges the resettled households have faced in the resettlement process and the strategies they designed to cope up the adverse effect of the resettlement.

## 4.1 . Background information of the study participants

Ages of the study participants ranged from 43-73 having average family size of 4 persons. Concerning their educational level, all are under elementary school. Fifteen participants (7 female and 8 male) took part in the in-depth interview. Among these participants interviewed, 12 of them were from the resettled community and the remaining 3 from the host community. Two FGDs, each containing 8 members, were conducted with female and male groups separately. The participants were from those people who have been resettled due to GGI Hydroelectric Dam Construction. 4 key informants from kebele administration, influential persons and government representatives were also interviewed.

## 4.2. The process involved in resettling the displaced households to Bulbul village

## 4.2.1 Participation of the resettled households in resettlement process

The resettlement process of GG I dam project was planned to be led by Resettlement Action Plan (RAP). In order to execute the plan, Gilgel Gibe HEPP completion report on environment and resettlement (2006) stated that a resettlement office under EEPCo was set up as a component of the Gilgel Gibe Hydroelectric Power Project. A committee comprising of staffs from EEPCo, the Jimma Zone Administration and representatives of woreda administration undertook a full inventory of private and public property including selection of the arrival sites. The committee was responsible to coordinate the whole aspect of the process. Different parties were involved in the committee.

Participants were asked about the overall participation involved in the resettlement process. According to 9 respondents' view, successive meetings were held since the inception of the project. Among other things they discussed on the meetings were how to identify households, whose land would be taken for GG I dam development; make compensation for those households who lost their land and property; types and amount of compensation payments; and selection of the new resettlement sites.

The interviewee were asked on how they had been informed that they should be dislocated from their village and resettle to another place. A participant in an in-depth interview described the following

All the residents were called for a meeting organized by zonal and district administration. During the meeting, government officials informed us that our villages were targeted for hydroelectric dam construction on Gilgel Ghibe River. The discussion pointed out that the dam needs large hectares of land which would dislocate residences around the area. We could not know which part of our land was particularly identified. Meanwhile, we became acquainted with the information in the next meeting that the project needs all of our farming and residential areas for the dam construction so that we were told to leave the area and resettle at Bulbul village.

The woreda government officials required the resettles to participate on the resettlement process mainly targeted to report as if they fulfilled standard resettlement procedures and modalilties. In line with this, focus group participant one said that the local government officials called the resettled people for frequent meetings which seemed discussion on their resettlement program. The officials' intention was not targeted for participating them on their own issues rather to execute government agendas i.e urging them to leave their land within short period of time."

A key informant complemented on the above ideas as follows

"We were aware of the area where we would resettle. Only informing was not sufficient. Because, we have not been given options for alternative resettlement areas."

A participant in an in-depth interview also mentioned the process in the following way:

"Frequent meetings held with the district government officials were not successful due to the fact that both parties could not reach at mutual agreement. There was one way communication in which we were listeners of what had been ordered."

One of the key informants explained about the level of participation in the resettlement process. He declared even poor participation of local government stakeholders. The informant described:

"Not only the residents were denied with their right of proper participation on the program rather the local government officials were not given sufficient room to involve in critical issues especially on the selection of new resettlement site and the amount of compensation to be paid for the displaced households. Just only instruction came from the highest government authorities and we were only expected to implement that. Unless and otherwise we will be categorized as anti-development group."

Similar to the aforementioned idea was also described during most participants of an in-depth interview as hereunder:

"...when the officials were pressurizing us to leave our home and land right away, at least, they did not explain for us the criteria used to select the resettlement site. They were merely telling us that we would resettle in a place where the basic infrastructures are expected to fulfill so that we must fill the prepared form and took our compensation. In the end, most of us were fading up in the meetings and ceased attending it."

The above findings revealed that the community members who were affected by the dam project has participated in public consultation at the initial stage of the project. Though they participated in discussion with concerned stakeholders, they could not be given full consideration in decision-making on matters affecting their livelihood. They were simply deprived of their rights to participate on the issues related to resettlement. This implies that there was an inadequate consultation process which limited the ability of affected people to influence the resettlement processes. Their low participation would increase their chances to be negatively affected by the process.

The finding is also in line with the one found in the literature review which mentioned a study conducted in Ghana on dam-induced resettlement. Tema Manhean (1966) confirmed that there was a lack of consultation with the local population displaced due to the dam thereby creating resistance and administrative problems. On the other hand, a finding on analysis of the Gilgel Gibe hydroelectric project (2008) undertaken by an independent investigation of the joint factfinding mission also supported the above finding. It mentioned an indicator for resettles' poor participation. The report stated that the affected households had limited ability to influence the resettlement process beforehand and there was no evidence that appropriate public consultations were carried out. Nevertheless, the right to participation is one of a major component in the process of development and must be in line with the national development requirements. Such absence of meaningful participation in Gibe I resettlement and relocation program was not abided to the Ethiopian constitution, Article 92 of Chapter 10, which states that people have the right to full consultation and to the expression of their views in the planning and implementation of environmental policies and projects affecting them directly. With this regard, the 1986 UN Declaration on the Right to Development also confirmed about the realization of "all human rights and fundamental freedoms" (Mello.S 2003).

Above all, the study carried out by the government to identify the resettlement location was totally wrong. Because they selected the area Bulbul taking only its closeness to their previous living area, idleness of the land and their cost minimization into consideration while knowing that the land was unproductive. So, the resettles became pushed to resettle in the area due to the government's wrong assumption and negligence. In this case; at least two things should have been taken into account before the selection was made. First, the suitability of the area for the construction of dwellings and second is the fertility of the farmland in the new sites. But, this settlement did not fulfill both the requirements due to the rationale that the land is moist (produce water) and also cracked easily which made it even unfit for construction of houses. The area seemed standardized resettlement site but it is only from outward looking which looked nice.

## 4.2.2 Compensation and grievance mechanism

Families were resettled on swampland of poor agricultural quality which was dissimilar from their previous land. These marshy areas also make excellent breeding grounds for mosquitoes. In many places, those resettled were placed onto lands which were used by

the host communities for grazing animals. Both those resettled and the host communities lost their grazing lands without compensation and the resettlement produced a conflict in land management with the hosting community due to the lack of pasture land. The elders' focus group was asked about the available complaints the resettles had submitted and how they were handled or responded by the relevant government officials who are in charge of responding. Focus group participant 4, in elders FGD mentioned about the complaint process and procedures followed when the resettles have raised. The major complaint was regarding the issues of compensation. Their grievances allied with unfair compensations in terms of change of residential area was not satisfactory. They were envied with irresponsiveness of the committee who was in charge of addressing their resentment. In prior to the resettlement period, these people were living in productive land with many assets in their farmland such as trees (avocado, banana, coniferous tees, wanza, coffee, etc.) and beekeeping practice in it. The compensation given for these assets were very insufficient and unfair. In a nutshell, the study argued that the compensations and other provisions effected for lost assets did not satisfy even basic needs of the resettled households at the existing site. Even though they put forwarded this claim for the resettlement committee; they responded as if the amount of compensation money allotted was limited and already predetermined so that the local government bodies were told to give only such amount by higher authorities. Farm properties such as beekeeping, trees, coffee and fruits available were found to be underestimated. But they were the households' major income sources which they relied on.

### Similarly, a respondent described how compensation was unfair by stating:

"I was complaining even long after I started to live at Bulbul village since I have lots of trees which I had planted and were given small amount of money in compensation...Even though I tried my best to get compensation for those trees. But the government officials repeatedly told me that they could not entertain my compliance for I have already received the predetermined amount of money which was considered as agreement on the compensation. What was amazing in compensation was effecting different amount of compensation for resettles owing the same type and quantity of crop."

According to the World Bank's (2006) assessment report, the resettlement cost was estimated at USD 4,600 per household which is minimum for a dam generating 180 MB (GG I).

Study participants in an in-depth interview were asked about how the local government officials responded to the complaints made about the resettlement and issues of compensation. A respondent then narrated about a complaint he made to local officials and their responses in the following way:

"I submitted my complaint through our locally organized compliance committee to the government representatives in the area about unfair compensation I have been given. I told them that I had 4 hectares of land taken by the project but got only 2 hectares of land as a replacement. Thus I urged to provide me the difference. But they respond: land is property of the government and the community was not entitled to own it beyond the prescribed 2 hectares already set by the highest government authorities."

Households mostly followed traditional way of making complaints by establishing local committee. According to their response, they did not use any formal way of making complaints. According to the Gilgel Gibe Affair (2008), findings of an independent Fact-Finding Mission for analysis of the Gilbel Gibe hydroelectric projects in Ethiopia revealed that the resettlement in Gibe I dam is far from being good practice. The Fact-Finding Mission found in its study titled "Investigating the Impact of the Gilgel Gibe dam" on two selected resettled villages located at "Kersa" and "Tiro Afeta" districts, disclosed that no effective means were available to resettled families for submitting and seeking resolution of grievances related to their dislocation and resettlement.

One of the risk associated with the resettlement, mentioned by participant 6 of elders' focus group discussion, elaborated: there were few people who came to settle in the area before short period of time. These people bought land from another farmers and build home but they did not get necessary legaldocuments from the government for the purchase. As a result when the displacement occurred they did not get any benefit...these people were complaining a lot but did not get any response yet. This imply indicates that there were also displaces which did not get compensation at all for lost assets due to lack of legal documents.

Responses of the above participant also denotes lack of awareness about the legal procedures to claim for fair compensation was one of the challenges of the displaced households. The legal procedure for complaining against unfair compensation requires not receiving the determined amount which was claimed to be unfair by the compliant until the final decision is made by concerned bodies regarding the complaint. However, even if the displaced people knew this procedure, the financial challenge they faced during the displacement could not allow them to refrain from receiving the pre-determined amount since they knew that waiting until a final decision reached would expose them to further challenges.



Figure 4: Snapshot of Bulbul village (Image taken: 14/06/2020 at 09:30 AM)

# 4.3. Effects of the dam induced resettlement on livelihoods of households on Bulbul village

This study describes what the livelihoods of the affected people look like before and after resettlement. For the purpose of this description the study tried to look atthe assets and livelihood activities of the households affected by dam induced displacement. This part largely focuses on exploring how the dam development and resettlement affected the livelihood of the resettled households.

## 4.3.1 Effects on natural assets of the resettled households at Bulbul village

In their previous villages, the displaced community had practiced agricultural farming and animal rearing such as cattle, goats and sheep as an ancillary job. Whereas after the resettlement program carried out, the households have been provided with poor productive land which required large amount of fertilizer. According to interview with key informants, they described the following:

"Agricultural production was the mainstay of the resettled community in villages they had lived before. Whereas in the resettled village, Bulbul, agricultural production became very low as a result of poor productivity of the land they owned. To improve the land and enhance its agricultural productivity, households could not afford and get access to high yield variety seeds, chemical fertilizers, irrigation, agricultural mechanization, etc. and remained less productive so that they couldn't met the ever growing and ever pressing food demand for household consumption. Moreover; the community couldn't provide forage for their animals."

Most respondents described that the community might get some maize and sorghum production if it is sown in precaution, on right time and proper application of fertilizers. This could be done before the onset of the rainy season otherwise all that were sown including fertilizers would be washed away by rain. One key informant also explained the situation as below.

"The land gave good production for the first two years since resettlement started. This production, which was due to the soil's fertility enhancement as a result of the cattle's deification, lasted temporarily. The top soil was then fully utilized and depleted. Since then; the soil remained unproductive. This soil would be cracked during the dry season and logged water during the winter season so that it became sticky that will not be suitable for farming. However, we were not capable enough to cope up with the problem and made the soil productive. The government promised to bring grader and drained the water outside the farm but did not t keep the promise and performed the corrective measure."

Therefore; the aforementioned finding implies that one of their natural assets of livelihood, land, has been negatively affected. The effects were inflicted in terms of reduced land size that would be utilized for farm and grazing and decrease in its productivity as compared to their villages before resettlement which were reliant on natural resources there existed so long before.



Figure 5: Degradation and erosion of the resettled community's land at Bulbul village. sold (Image taken: 23/06/2020 at 04:31 PM)

This finding is in line with the fact mentioned by MoA (1989), which stated "the resettled villages are at the bottom between 1700 and 1750 masl, typically referred to as the Gilgel Gibe plain comprising virtually flat land, located along the middle reaches of the river, and characterized by clay and dominantly swampy vertisols. This land is water logged during the rainy season and cracks when the rain tapers off." Furthermore; joint analysis of Gilgel Gibe Dam (2008), disclosed in its report "dislocated families were resettled on swampland of poor agricultural quality which was dissimilar from their previous land." World Bank's project completion report (2006) also confirmed for "a reduction in farming productivity" at resettled village. The study depicted that the replaced 2.5 ha land at Bulbul is highly eroded and unproductive with big gorges created. These gorges are gradually expanding while making the people to lose even their available small size land. According to Ayalew (2017), big gorges have been created at most part of lands at Bulbul village due to its exposure to land sliding and erosion. He further mentioned that the different conservation and land restoration activities rendered the community to restore their lost lands which could not been successful as the big gorges and degraded area by themselves would not support to grew the different plantation trees and grasses deemed at rehabilitating the land. Bikila (2014) also point out that one of the most common livelihood risks faced by displaced households because of development projects was lack of proper land replacement and seriousness of flood eroding farmers land." Beside, Hull (2009) explained development projects with its structure resulted in numerous negative impacts. He depicted loss of land and environmental degradations resulted in people losing their agricultural and homestead land.

Livestock assets of households also exhibited a decline in number and quality. The primary reason attributed to such a decline was attributed to insufficient availability of pasture lands. The other rationale was due to the sale of livestock by the households in time of food shortage and absence of enough financial income which they couldn't earn from another alternative source of livelihoods. An FGD discussant also described the situation as fattening of domestic animals such as sheep; goat and cattle became trouble for them as there were insufficient grazing lands and fodder. So some of them sold their animals and gradually stopped animal fattening. In a nutshell, the households confirmed that resettles that lost their productive and fertile agricultural land were vulnerable to livelihood risks.

(Terminisk 2013 and Chernea 1997) supported the above findings which disclosed that forced development-induced displacement negatively affects people's livelihood assets causing loss of farm lands and livestock, dismantling existing modes of production and impoverishment of many of those uprooted. In general, the small land size coined with seasonal occurrence of run of and barren nature of the land, cumulatively reduced both agricultural and livestock productivity. This significantly contributed and led to decreased households' food production. In the effect, community has thus been transformed from market based production to aid recipients. This part of the study discusses the effects of the GGI dam-induced resettlement project on the resettled livelihood assets. According to Chambers & Conway (1992), livelihood assets comprised of material and social components that people owns to lead their livelihood. Implementation completion report of the GG dam project undertaken by the World Bank (2006) also supported the above findings and noted: livelihood assets were duly replaced; however, the claim was based on compensations and other physical structures, natural resources and services provided for them in the new settlement. They particularly complained about certain tangible assets for being unsatisfied. The findings of the study generally argued that the compensations and other provisions did not fulfill even basic needs of the resettled households at the current site. The compensated farmlands which produce nothing, could never replace the kind of land households owned in their pre-resettlement villages. The findings found that the resettled households at Bulbul village lost their productive lands suitable for cultivation of crops and livestock rearing to Gilgel-Ghibe I dam- development project.

## 4.3.2 Effects on physical assets of the resettled households

The current findings explored that the government constructed homes and made them ready for the resettled households before they dislocated from their previous resident area. However; immediately after resettlement commenced Bulbul village, the constructed homes started to crack down due to the bad nature of the soil. Moreover; some households dig up and sold doors and corrugated iron sheets of the roofs as coping mechanism to escape from food shortages. Their physical assets were also negatively affected in such a way that they sold fixed assets of the household such as beds and other furniture.



Figure 6: Relocates home collapsed due to bad soil type and window and door sold (Image taken: 15/06/2020 at 04:29 PM)



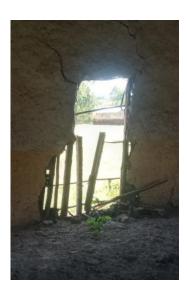


Figure 7: Relocates' poor housing condition and corrugated iron sheet sold (Image taken: 17/06/2020 at 09:15 AM)

Regarding the communal assets of the people, the infrastructures such as schools and health center built were under poor condition and no maintenance work was done by the concerned body. These infrastructures were built following the resettlement by thinking that they lost all these facilities after displacement.. But they were constructed on bad land at Bulbul..

## 4.3.3 Effects on social capital and relation of the resettled households

Another effect of resettlement was the disruption of the social capital of the displaced people. It has partly destroyed the existing institutions and organization whereby members of the community relate to and interact with each other to govern their way of life. With this regard, one of the in-depth-interview participants how the social relationships and access to different social services in the new area of resettlement look like. She put it as follows:

"...it took me very long time to build good relationship with the people here (relocation site)...my relationship with the people in my former place was very strong. We had strong 'Ekub' and' Idder'. I was paying for transportation and participating in the Ekub and Eder I had in my former place for about a year. However, after I slowly came to develop good relationship with the people here I changed my Eder to this place."

In line with the effects caused, individual interviewees also explored the following:

"The resettlement program deteriorated our communities living condition such as its social organizations and neighborhood ties. We have lost cooperative organizations, such as Dabo and Edir, in which our forefathers developed and used for many years. In the resettled village, we were let to live distantly from our former neighbors. This situation compelled us to establish new way of life which is painful, time taking and needed high temptation.

FGD discussants also declared other aspects of the consequences due to the dam-induced resettlement. As a female discussant elucidated, most of the resettles were self-reliant before resettlement. But now they are changed to aid recipient. All the resettled community became beneficiary of safety net program in which they are provided with food items such as oil, wheat and pea on every three months. Besides, some parents couldn't send their children to school. The worst situation was that even mothers could not be able to change their clothes. A respondent in an individual interview also reported the severity of the effect of the resettlement and described the following situation:

"The land in the current village is not conducive even for giving a decent burial service for the reason that it easily logged water while dug. Therefore; we are now compelled to take a dead person to a burial site located too far from here."

The response of the above participants indicates that the displacement and relocation program had also negatively affected the social capital of the displaces. The response of the participant also indicates the effort made by the displaces to maintain their former social relationship had exposed them to additional costs. Similarly, FGD participants have indicated experience of similar problem, with in depth interview participants, with regard to disruption of social capital.

Therefore; findings of the study as indicated in the response of the participants, revealed that the displacement and relocation program has negatively affected the actual and potential social capital of the displaced households. The potential social capital of the displaced households was negatively affected due to the conflict occurred between the households and the host community.

The construction of the Gilgel Gibe I Hydroelectric Dam Development and Resettlement has also affected the social capitals of resettled communities. The findings of the study indicated that before their resettlement households at Bulbul village had been engaged in various social activities such as Equb, Iddir and Debo. They have developed these organizations for many years since their forefathers. Disruption of these social organizations due to the resettlement program cost the community a lot for instance in terms of mutual cooperation at times of deaths, weddings, emergency situations and other major social events. However; their former social ties get distorted here after resettlement. The resettlement program gave minimal or under consideration to these social assets and values. It also created social distress on some aspects. For instance; a respondent described the community's trouble with regards to graveyards. He said, with big disappointment, ".....I used to visit graves of my forefathers in the nearby residence." He used to visit the graves while missing them. He was assuming as if they were on his side. Now, leaving them aside usually irritated all the family." On another aspect the communities at Bulbul village didn't have any suitable place to carryout funerals when deaths happened. This is due to the fact that their lands are not well suited to dug a grave. Because, their lands would collapse while dug. The government did not responded their appeal to provide them a suitable land at a fairly near distance from the village. Therefore; they have been obliged for burying their people very far apart from their residence. However; the residents whom they went to go for undertaking burial were not happy thereby creating rough social relationship.

On top of this, rough relationship and even conflict (to the worst situation) was created between the resettled and host communities. The root cause for the conflict was due to a scarce resource, such as grazing lands. The land in which the households resettled was serving as a communal grazing area of the host community. They had been utilized before the resettlement happened. The host community would not allow the displaced households keeping their livestock on the grazing area. Confronting between the host and the resettled communities sometimes has led to

conflicts. This inferred that the resettlement program was not undertaken in a well-planned manner in such a way that all concerned parties who would be associated with implementation of the program in one way or another were not been incorporated and consulted as to the required level. In order to resolve homelessness, marginalization, food insecurity and loss of basic resources which then minimize onset of conflicts among people, "involuntary resettlement programs implemented successfully" (African development bank involuntary resettlement policy, 2003). From this perspective, when people move to a new place in a planned and controlled manner, for the purpose of development they faced with various challenges in adapting to the altered circumstances (Asrat 2009). A study by Frehiwot (2013) also revealed similar associated risk with this regard which stated that "Minimal consideration was given for the social capital or social aspect of the relocated people in the relocation process which was manifested in the post relocation situation of their social life.

Another associated risk the participants mentioned was the development of negative relationship between the local government officials and the displaced households on the other side. With regard to this issue one of the participants of the study described the negative relationships and his anger towards the local officials in the following way:

I do not believe my land was taken for development purpose. I believe my land was robbed by the local government officials. I am telling you this because if my land was taken for development purpose they would not snitch our land and our trees without fairly compensating us...years have passed since we are displaced but I did not stop blaming the government officials for their wrong doings. Whenever there is a meeting and I got an opportunity to speak I speak about this mistake committed by them.

The response of the participant indicates that the displaces have reached at a generalization that the government officials were considered to exploit the displaces' assets. This perception had resulted in the negative relationships between the displaces and the government officials. Similarly another participant also expressed his anger towards the government officials who were responsible for undertaking the displacement and relocation program by mentioning violation of rights they committed as stated below:

"Even though it is your right to ask for fair compensation when there is unfair compensation, the government officials would label you as promoter of anti-development ideology for doing so. ...For your surprise, there were displaces detained for days simply for complaining against unfair compensation. ... It is very irritating to be mistreated for simply asking for your rights"

The above response of the participant indicates that one of the factor for the development of negative relationship between displaces and the local government official was the wrong methods the officials followed to handle displaces' complain against the unfair compensation. The officials were intimidating displaces as if they were anti-development when displaces claimed for fair compensations.

Therefore, what the findings of the study, based on the response of the participants, revealed is that occurrence of negative relationship between displaces and the government officials was another problem in the process of resettlement and relocation program. Even though, unfair compensation practice was the major reason for the negative relationships between displaces and the local officials, the way the officials handled displaces' complains was also a contributing factor.

### 4.4 The effects of resettlement on livelihood activities and sources of household income

The study revealed that people were displaced involuntarily from their homes and basic livelihood activities. The involuntary resettlement of these households in the matter of Gilgel Gibe I dam development rendered their situations to be changed during the post-resettlement period. This condition affected their livelihood activities to be altered.

Farming and cattle rearing were the main sources of income gaining activity for residents before they moved to Bulbul. Before they were displaced, most households were largely involved in the production of livestock such as, cattle, sheep, goats, donkeys, horses and mules, as well as poultry. Farming households depend on oxen for animal traction. Donkeys, mules and horses were used for transportation. Agricultural activities were common among many households since most of them depend on farming as their main livelihood activities. On this aspect, the study participants were asked how their livelihood activities and source of income has been affected due to their dislocation and

resettlement to bulbul village. A participant in an in-depth interview explored the following:

"Due to dislocation from our previous agricultural lands, some agro ecological practices have been lost. For instance, I used to practice beekeeping on my family's' farm. My family and I used to harvest large volume of honey. But, since we have moved to the Bulbul village, there has no longer works with bees. I do not expect that there would be a possibility for practicing beekeeping here in the garden. Here, my plot is dedicated to cultivate insufficient amount of crops, vegetables and fruits. Whereas thinking beekeeping became unthinkable. However; my family's connection to the agricultural practices have been halted and our livelihood activities with the bee are severed."

Another participant from individual interview also forwarded his opinion as follows.

"All things decrease with place. After I moved, my income highly decreased. Effect of this dam development project make dramatic change after displacement on my livelihood. Before I moved here, I was a farmer. I used to grow maize on large and fertile farmland. I already lost that land and the land which I currently hold is not fertile enough to grow crops. This forced me to become a daily laborer. The income I am generating from this labor work is very small when compared to the previous one. Due to this, I am currently experiencing lots of problem even when it comes to getting basic needs. Thus, I considered as if the land were taken without compensation."



Figure 8: Poor sorghum production (*Image taken: 17/06/2020 at 03:40 PM*)

Similar to this, participant 1 during FGD explicated the situation as: his households' livelihood was mainly based on animal husbandry. He had also additional sources of income from small scale farming and poultry. The former living was very suitable for cattle to have grazing but now; the substitute living land he received has no grazing land and pasture. He could not gain a possibility even to develop sufficient forage. Thus, he could no longer perform the previous income-generating activities. Therefore, the source of income he had is totally lost now and made him reliant on supports of others such as safety net, relatives and other governmental non-governmental organizations' aid.

The response of the above participant indicates that due to the displacement he had lost a significant portion of crops that he used to gain from the farm before resettlement carried out. This would obviously cause a substantial reduction in the amount of income. Therefore, this participant did not come to be landless but had lost significant amount of income as a result of poor productivity of the farmland in the new resettled site, which would have a direct and negative effect on other aspects of the life of the affected households. The above response of the participant indicates that the displacement and relocation program had exposed the displaced families to the problem of joblessness, due to which, they became forced to engage in daily labor work. The responses also indicated the amount of income resettles were generating became less than the income they had been getting from the farming work before. As a result of the decreased income the resettled community and families experienced a problem to the extent of being unable to fulfill their basic needs in life. Thus, the finding of this study identified that one of the

negative effects of the Gilgel Gibe I dam-induced resettlement was poor productivity of agricultural lands causing reduced household income.

A response from an individual interview also strengthened the above in the following saying:

"I have been embarked in agriculture and animal rearing during the first time after the resettlement. However; after a decrease in agricultural productivity and fertility of the land to give the product, I decided to engage in off-farm activity, like daily labor wok. That means I started to work as a daily laborer with farmers in his former area. Besides, I also collect river sand on a river and sold it construction and use the money for daily consumption."

The above findings generally inferred that the households' occupational activities were attributed to the accessibility and availability of the natural resource assets on which they relied for their livelihoods. Pertinent to this, significant alterations made on these livelihood base assets (especially land) of the resettled community caused major changes to their livelihood activities.

The type of activities resettled households engaged and the basic sources of income they relied on prior to resettlement made the effects of the dam-induced resettlement vary across households after relocation. This means resettles lost their previous source of income /job due to the daminduced resettlement in accordance with their types of economic activities before resettlement. One of the negative effects on livelihood activities of the relocates at Bulbul village was loss of previous source of income and joblessness. Most of the resettled people who engaged in activities, which were directly related to natural resource bases such as farming, sheep, goat & cattle fattening and poultry production during pre-resettlement period, faced a significant loss in their jobs and income after resettlement. This inferred that the farmland at the destination site, Bulbul, is inconvenient for farming activities. This was attributed to the very limited capacity of their new farmlands to support food crops, fruits, coffee and vegetables, which were the cornerstone in the old settlements. Moreover, within the previous settlements, farmers were not limited by way of land and anybody could farm on any available land as long as that was not already being used. The situation in the new area could not support such freedom because farmlands given were limited in size, worsened by their infertility, as respondents expressed their sorrow. In line with this, the resettled community's capacity is limited to employ different

mechanisms to improve fertility of their land. The simplest thing they are expected to improve fertility of their land is crop rotation but it could not be adopted due to the small size of their land i.e. 2.5 hectares, including their residential areas.

Besides, few households whose income sources were non-farm activities still persisted on it to some extent and became less affected. Those who were jobless before resettlement are still idle. Another section of the community members previously embarked on animal fattening, poultry and cattle rearing can't be maintained such means of livelihood activities rather their cattle and other domestic animals reduced significantly both in quantity and quality. Such tapered engagement has been attributed to scarce availability of animal forage and pasture land (especially absence of communal grazing land) with diminishing number of domestic animals in which households sold them in time of food scarcity. Therefore; all the aforesaid high jobless situation denoted the differential effect of the dam-induced resettlement across the varied livelihood sources and livelihood activities of the relocates.

## 4.5 Coping mechanisms of households to the negative effects of the dam-induced resettlement

The aforementioned findings shown that landlessness, poor agricultural productivity, disruption in income source of the resettles and their social networks were found to be the major negative effects the resettled community confronted. These threatened way of life necessitated them to be strived for changing the scenario and restore their negatively affected livelihoods. The resettled people then employed a range of coping strategies as a way-out from adverse situations they encountered as a consequence of Gilgel Gibe I dam-induced resettlement. Accordingly, the study participants were asked on how they mitigated it. A participant mentioned the following:

"In order to escape from low income and its consequences, men usually engaged in construction daily labor in the nearby towns, driving, wood and metal works, painting and carpentry jobs. Here we have withdrawn our children from school to make them look for and engaged in any easily accessible income earning opportunities. Similarly, women are also involved in domestic jobs in the neighboring cities."

"Since resettlement carried out here, we made various attempts to boost a decrease in the amount of maize and sorghum produced in our current land. Intercropping, shifting cultivation and crop rotation were the means the resettled attempted to practice to improve agricultural production and productivity. But we end up with failure. Finally; many resettles, especially men and young ones, have started to be embarked in daily labor work and gained some sort of income though it was unsatisfactory and unable to replace what had been lost from the pre-resettlement area."

Focus group discussants also explored other means of the community's coping mechanisms to mitigate the livelihood risks they encountered as a result of the resettlement program and the dam development project. A female discussant mentioned that certain households, at times of stress and food shortage, sold household materials and usually sent their children to nearby city especially to Jimma to make them employed for domestic jobs. Another discussant expressed the mitigation mechanism in such a way that parents choose to let their daughters for marriage at their early age assuming they might live a better life and even would help them later on. This assumption was based on a situation that the husbands chosen were considered to be the one with good income. But; this early marriage made the girls to be school dropouts.

On the other hand, most of the participants in the in-depth individual interview mentioned foreign remittances as the most widely and commonly known coping strategy followed by majority of households. They explained this situation in this manner.

"Our girls are our key human assets which we mostly relied on their support not only to tackle the negative effects of GGI dam development project resettlement program imposed on us but also during other normal periods of our living conditions. Most of us usually sent the girls to the Middle-East to be employed as servants for domestic woks by hoping that the will send us foreign remittances thereafter. Of course they helped us a lot more than our agricultural farmland and cattle did. Some of sale our fixed assets and others sale cattle just to send one among our girls abroad. Then the already sent one would pull the remaining girls one after the other. But the worst thing here was that most of us wouldn't waited

the girls even to complete their primary education. We just made them to drop from the school for sending abroad. Even majority of them were not physical capable enough for domestic wok thee and they were not at the recommended age level. Some of them were exposed to vulnerable and life-threatening jobs. We all knew that our practices were not good but the pool living situation we encountered here compelled us to do so."

The above findings implied experiences and affiliation of male resettles towards labor intensive activities. Besides, child labor became a common practice employed in the study area whereby the children usually sent to towns for domestic jobs.

One of the female participants in the in-depth interview responded on how she dealt with the negative effects caused as described below:

In prior to displacement from our former village, livelihood of the household was mainly dependent on farming activities. We were producing sufficiently i.e. not only for the household's domestic consumption but also for market. Meanwhile, after resettlement carried out, we started to worry about our daily consumption let alone for market production. Survival became our question. This was due to unsuitability of the land for farming. Thus, I started to work pottery work and gained some amount of income to support my family. But this pottery job is considered as shameful act in the society. But I became considered deviant. Even though my engagement in such socially neglected job treated my morality, I persisted working just by giving priority for our survival.

Most resettles are neither skilled to earn incomes other than agriculture and cattle rearing nor have enough financial capitals which could enable them to be engaged in activities under formal business sectors. Thus, they have narrow alternatives of coping mechanisms to deal with the aforementioned problems. One of easily available option was to engage in activities which demanded low skill and few financial capital. Accordingly, labor intensive jobs and pity trading were mostly practiced by the resettles as coping mechanism. Of course, they used range of similar strategies at different times as deemed

necessary. On this stand, interview with a participant expressed his views and opinion in the following way:-

"At times of adverse situations, some resettles are mostly involved in the informal labor markets such as daily labor and construction works and pity trade activities such as selling firewood and charcoal selling, petty retailing of items, handicrafts, etc. handicrafts and charcoal selling is especially women's engagement options to address negative effects of the dam project and resettlement."

The above responses denoted that the loss in the household's source of income which had been based on farming made them vulnerable to food shortage. In order to deal with the problem the participant made a shift in livelihood activity i.e. engagement in off-farm activity, pottery making, which has been considered ragged by the community. As a result the household faced societal neglect. The above findings is supported by the one found by Bikila (2014). He described that one of the strategies used by resettles to cope up with socio-economic challenges of displacement is diversifying income sources which made them to be engaged in different income earning activities such as small business activities, daily worker moving between rural and urban areas and agricultural intensification activities. Similarly, McCabe (2003), identifies livelihood diversification as vital strategy, utilized by household at the face of crisis. On the other hand, Chambers & Conway (1992) typically pointed out agricultural intensification and migration as core strategies. Such strategies are associated with people with regards to how they withstand changes in situations affecting their livelihoods. Thus, in the study area, there was diversification to some extent as the households strayed into new area made possible by new opportunities. For instance, there existed an increase in trading activities because of the existence of a larger market due to closeness to district town (Serbo) and the zone capital (Jimma). This shows a positive effect of the resettlements, though still negative in terms of perceived livelihood effect from respondents' side. The study points out another positive impact created by the resettlement, mirrored through the improved transportation in the area.

Besides, the study also revealed that strength of shocks people experienced after resettlement depends on the capacity and status of households so that their coping mechanisms were also found to be varied. Here those whose means of livelihood relied on agricultural production and livestock rearing before the resettlement, recovered better from the adverse situation (less productivity) than the one whose livelihood depends solely on agriculture. This implied that the better households whose means of livelihood was based on diverse (non-farm) activities were recovered easily from adverse situations better than the one not.

Likewise an old man in key informant interview who was asked about his coping strategy employed to recover from the shock his household encountered as a consequence of disruption in the source of family's livelihood following the resettlement explored the coping mechanism in the following manner:

"My family and I started to live in misery since the forced resettlement has carried out. A question of food was not our concern before. The compensation money we received was not sufficient to restore our livelihood we lost during displacement rather we consumed it to cope with the problem of food shortage we encountered here due to poor farmland replaced in place of the fertile land we lost. But, this money could not save my family from food shortage sustainably rather we became nil a year after resettlement. Even we don't have any special income gaining skill we acquired after coming here. So, I remained dependent on my relatives and the government. Here waiting for someone else's help consistently made me unhappy and hopeless......I just waiting a miracle to come out of such notorious life......."

This shows that the people could not utilize the small amount of compensation money to restore the assets they have lost. And they were not empowered on how to diversify their livelihood activities and earn better. The worst thing is that the resettles developed social distress. As the finding indicates, except paying land compensation and limited cash for some households, no other sufficient assistances were made for the resettlement affected households. But, according to Africa Development Bank (1998), project affected people should be offered with multiple options from which to choose so as to restore their livelihood. In another literature, World Bank (2016) stated that economically displaced persons should be provided with opportunities to improve, or at least restore their means of livelihood through enhancing income-earning capacity, production levels and

standards of living. Because these people have the right to seek employment on an equal basis with others having the freedom.

An elder in FGD also described that households would restrict their expenses as their copying strategy so as to enable them to fulfill for their basic needs which would help them in mitigating their impoverished livelihood situation and recovering from the adverse effect as hereunder. He stated most smallholder farmer households for adopting a shift on the kind of food item they utilized by preferring less expensive food items for their daily consumption when they encountered difficulty for purchasing and even producing highly preferred and nutritious crops and vegetables needed for domestic consumption.

Similarly; a female respondent also mentioned other means of resilience and coping mechanism employed by other segments of the community. The mechanisms or strategies were found to be consumption-based, alteration of meal time and rate of household expenditures as described below.

"During periods of worst situations such as extreme reduction in agricultural crop productions followed by severe food scarcity and inflation of food prices, we mostly depend on consuming less preferred and cheap price food items, reducing the amount of expenditure spent for non-food items, minimizing amount of food consumption by missing some meal periods and even to the extent of skipping the whole day without food. Some of the people used chat chewing as their own means and stayed the whole day without food consumption by assuming that it leads to loss of appetite."

Most relocates were not capable enough to be prepared for periods of food shortage ahead of time. There were no grain banks and buyers' cooperative unions at the community and food storage warehouses at most household levels which would avail food items at reasonable price. So, the resettles followed wise utilization of the limited food items as a coping strategy. This time, they set their own internal criteria to distribute the few available food items among household members. In such circumstance; elders,

children and patients were given priority for getting foods more frequently, at relatively higher amount and quality than the rest.

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Due to their physical disability and other marginalization cases, some of the resettles were incapable to regain their previous income lost resulted from poor productivity of the land they have resettled. These households couldn't restore their previously lost livelihoods and even their future economic situation will be at risk which then made them vulnerable to future livelihood risk due to the rationale that they have lost their productive like productive land, physical assets and social network. Therefore; the government arranged credit facilities by a rehabilitation fund program for the most affected and marginalized sections of the resettled community. The credit will be returned within 3 years period. They are organized in 14 groups or associations each consisting of 5 members. Each group received credit ranging from 100,000 to 250,000 based on a proposal they have submitted. These groups are engaged in cattle fattening, goat rearing and poultry production. 70 household heads became beneficiaries from the program. One of the interview participants with physical disability declared:

"My means of income previously were fattening of sheep and cattle. I also let my land for rent and gained some income from it because of my physical limitations to plough. After coming here, I have abandoned this activity as there were no sufficient grazing land and fodder here. Therefore; I sold my sheep and cattle which gradually left with none. The available 2 hectares land I obtained as compensation here couldn't be rented as before. Besides, I can't be engaged in daily labor work as some others did due to my physical disability. Thus, the only

option left was waiting for government aids and support of others such as non-government organizations and relatives."

Above all; the Federal Government made the resettled households beneficiaries of Productive Safety Net Program (PSNP). Here, all relocates (household heads) are selected as the PSNP beneficiaries in which food items such as oil, wheat and pea have been distributed to them on 3 months' basis. But sometimes this food aid did not arrived constantly within 3 months rather it would last even up to 5 months. The problem connected with this aid was that the people developed dependency syndrome and considered themselves as unproductive citizens. Once they experienced gaining food without working, most people felt comfortable to be idle and wouldn't been eager to work. Even though such aid existed; it was found too far below to fill out the gap in their food shortage. Yet the problem remained unsolved.

The study also examined ressettled coping mechanisms to cope with the negative effectects imposed on social relations with the host communities. Accordingly, Project Completion Report on Environment and Resettlement of Gilgel Gibe Hydroelectric Dam Project (2006) revealed that the resettled communities share a number of resources with host communities living in their surroundings. The shared resources include grazing land, burial place, clinic, school, agricultural development agent, water resources, mosques, church, etc. Certain resources or infrastructures, even though, were constructed or allocated for the benefit of the resettled household, the host communities have also become one of the beneficiaries of the services. Besides Intermarriages between PAPs and host communities were reported at each resettlement site, the first marriages took place already, within the first year of the relocation. The PAPs and the host population worship together in the mosques and church, respectively. On the other hand Kebede (2011) described in his study of social impact assessment of the dam, revealed the resettles' various attempts to recover their social association ties lost. In the effect, the community established their own mutual help associations for welfare "Abba Jiga" which consisted of 3-5 neighboring villages of up to 200 households each of which among other things, arranged marriages, pooled money and administered sanctions. Other associations established were for cattle rearing "Abba Ulee" with turn-taking in herding and mutual assistance in the case of death of cattle.

In general, the above findings revealed that the negative effects on livelihood situations of the resettled community due to the dam-induced resettlement were significant in such a way that they couldn't restore it easily rather get worsened time after time. Even though most resettled households at Bulbul village pursued short-term coping strategies to overcome the problem of food shortages, these coping strategies were not found to be effective in reducing their food insecurity. The income they earn did not cover what was required for their food and clothing and also would not deliver long-term solution to the problem the resettled poor households faced.

## CHAPTER FIVE: CONCLUSION AND RECOMMENDATIONS

## 5.1. Conclusion

The study revealed that in resettlement processes, the concerned government bodies t did not let the targeted households participate sufficiently. They were not allowed to decide what would be best for them mainly with regard to compensation criteria and identification of suitable resettlement sites. They were merely invited by the government for several meetings. Nevertheless the resettlement committee was not willing to hear and accept their voice and had denied their claims to enough compensation.

The consultation meetings held were not productive in terms of ensuring the required participation of resettles. The meetings were rather designed to pass through a a pre-. The so called consultation meeting was also intended for determined official procedure. reporting purpose so as to please and satisfy the interest of multilateral donor agencies, such the World Bank. This inferred that the communities were avoided to participate in the resettlement planning process and government followed conventional approach to participate the resettled community and decisions and instructions came from the high level government authority downwards and were in the best interest of donors. The 1994 Constitution of the Federal Democratic Republic of Ethiopia stipulated under Article 43:1-4 that "The Peoples of Ethiopia as a whole, and each Nation, Nationality and People in the country in particular have the right to improved living standards and to sustainable development, the right to participate in national development and, in particular, to be consulted with respect to policies and projects affecting their community and the basic aim of development activities shall be to enhance the capacity of citizens for development and to meet their basic needs." But, the resettles in the study area were denied of their constitutional right to participate on the decisions and maters which concerned them. Therefore; the resettlement program was not in line with both EFDRE Constitution and the international resettlement guidelines and it could be taken as involuntary as the people couldn't have the right to refuse accusation of their lands and not fairly compensated. Besides they were not given the required supports to mitigate and minimize the social and economic effects that would be helpful to restore or enhance accesses to their livelihood assets.

The dam project, coined with the resettlement program, induced negative effects on the means of resettled community's livelihood. Agriculture and livestock rearing were the main livelihood activities of the community in their pre-resettlement period which relied basically on the available fertile land and other natural assets. During that time, beyond fulfilling their domestic consumption needs, the households had sufficient amount of market-oriented agricultural production. The produced cash crop production and livestock targeting market. They had also good saving habits. On top of these; the members of community have relied on extensive social networks or ties and traditional associations such as Eddir, Iqub and Debo, which had been established since their forefathers. Such associations were beneficial for the community for mutual cooperation in times of death, weddings and emergency response to sudden shocks and disasters. However; after then resettlement took place, changes have occurred in the households' livelihood mainly on the agricultural land. The study revealed that the displaced households were moved to a resettled barren land. It had subject to overgrazing for long time. It has tin soil and sand. It is typically known for its cracking feature during the autumn followed by water lodging character during the summer which made it unfit for agricultural production. Among the crops sowed in the area, it relatively gave better production for maize, even though it was minimum and insufficient. The resettled community faded up on looking for various mechanisms to make the land suitable for other crops, fruits, coffee, and vegetables maize production but the land could not produce the expected products. Rather they were exposed to fertilizer and chemicals costs, labor and time wastage. The cultural assets and values of the community deteriorated after the resettlement. They lost strong social networks and their cooperative works and collaboration have declined.

The households devised different strategies to cope up with the shocks created as a result of diminished resources especially pertinent to agricultural production. Different households pursued different strategies to enhance their resilience capacity against the adverse situation they encountered. Resorting to foods with cheap price having low nutritional value and skipping meals time was observed by the study as a major coping strategy followed by most. Engagement in off-farm activities was also considered as another means the people employed. Some households also became coerced to sell their personal property and assets such as a corrugated iron sheet of their houses and cattle, whereas certain of them embarked in daily labor work. Majority of them were reliant on aid and relief provided by the government and other agencies

like Ethiopian Red Cross Society. Foreign was also another typical coping mechanisms of the community whereby women migrated to the Middle-East Arab countries and men to Sudan to get employment opportunity and support their families and themselves from the remittance obtained.

The study revealed that the coping mechanisms and way-out the people followed inflicted detrimental effect on the physical, human and cultural assets of the community. Selling household property and even their land imposed negative effect on their physical assets. On the other hand, migration to abroad is connected with reducing human capital which means that girls' school dropout so that it negatively affected the level of literacy. The other thing the resettled households designed as coping strategies were engagement in shameful acts which are considered norm by the society. It is to mean that communities considered and have shared expectations towards some societal practices internally categorized as bad actions and misconducts. In case of the resettled community, in the study area, some resettled community members were engaged in dishonorable and unacceptable practices such as women's engagement in commercial sex and working in "Shisha" houses just for the sake of earning income due to lack of job opportunities. Similarly, some men were also engaged in blacksmith related workers in which the community locally named it "Fuga". These people were thus discriminated and secluded by the community which caused negative psychological effects on them.

## 5.2. Recommendations

In this sub section of the chapter, the researcher gives some recommendations based on the findings of this study.

- Resettles should be properly participated on the course of resettlement process
- Resettlement sites should be checked for their suitability for relocates before they resettled
- During the compensation process the resettles were not given compensations for some plantations. Therefore; rights of the resettles for compensation of lost assets such as plantations should be recognized and valued.

- This resettlement caused both physical relocation of residences and changes in livelihood
  activities and strategies. However, main priority was given for loss of land and resident
  houses. But the resettlement should encompass the changes from cultural, socioeconomic and environmental perspectives.
- Government should commit promises it had for resettles.
- Resettles should be supported on various ways such as trainings so as to make them capable enough to cope with shocks
- Further researches should be carried out on the area of dam-induced resettlement and livelihoods

#### References

- Asrat Tadesse. 2009. "The Dynamics of Resettlement with the Reference to Ethiopian Experience." *Development Studies Centre*, Kimmage Manor, Irela.
- Azhar, R. 2016. "Resettlement in New Environment and Its Impacts on Socio-Cultural Values of the Affecters: A Case Study of Tarbela Dam, Pakistan." J Geogr Nat Disast S6: 009. doi: 10.4172/2167-0587.S6-009
- Bikila Ayele. 2014. The Impacts of Development-Induced Displacement and Relocation on The Livelihoods of Households in Dukem Area (unpublished MA thesis), Addis Ababa University, Addis Ababa. 4:93
- Bird, J., Wallace, P. 2001. "Dams and Development- An insight to the report of the World Commission on Dams." *Irrigation and Drainage* 50: 53-64.
- Born, S.M., et al., 1998. Socioeconomic and institutional dimensions of dam removals: the Wisconsin experience. Environmental Management, 22 (3), 359–370.
- Bowen, G. A. 2009. Document analysis as a qualitative research method. Qualitative Research Journal, 9(2), 27-40. doi:10.3316/QRJ0902027
- Cernea, M. 1997. "The Risks and Reconstruction Model for Resettling Displaced Populations. Washington, DC, USA." The World Bank Environment Department. Retrieved October 09, 2020 (https://ideas.repec.org/a/eee/wdevel/v25y1997i10p1569-1587.html).
- Cernea, M. 1997. "The risks and reconstruction model for resettling displaced populations". *World Dev.* 1997, 25, 1569–1587.
- Cernea, M. 2008. "Compensation and benefit sharing. Why resettlement policies and practices must be reformed." *Water Science and Engineering*, 1, 89e120.
- Cernea, Michael M. & Christopher McDo (2000). Risk and reconstruction. Experiences of resettlers and refugees. Washington, D.C.: The World Bank.
- Chambers, R. & Conway.G. 1991. Sustainable Rural Livelihoods: Practical Concepts for the 21stCentury', IDS Discussion Paper, No.296
- Chambers, R., & Conway, G. 1992. Sustainable rural livelihoods: practical concepts for the 21st century. Institute of Development Studies: Sussex-UK.
- Creswell, J. W. 1998. Qualitative inquiry and research design: Choosing among five traditions.

  Thousand Oaks, CA: Sage Publications.
- Dao, N. T. V. 2012. "Resettlement, displacement and agrarian change in northern uplands of

- Vietnam." NR92814 Ph.D., York University (Canada).
- Desalegn, Keba. (2011).The Socio-Economic and Environmental Impacts of Large Scale (Agricultural) Land Acquisition on Local Livelihoods: A Case Study in BakoTibeWoredaof Oromia Region, Ethiopia; MA Thesis, Centre for Development and the Environment University of Oslo Blindern, Norway
- DiFrancesco, K. and Woodruff, K., 2007. Global perspectives on large dams: report on a conference held November 3 –5, 2006. New Haven, CT: Yale School of Forestry and Environmental Studies Publication Series
- Dixon, J.A., Talbot, L.M., Le Moigne, G.J.M. 1989. "Dams and their environment Considerations in World Bank Projects". World Bank Technical Paper no.110, Washington. Earth Observation and Geoinformation 7: 299-309. CSA
- EEPCO, Universal Electricity Access Programme (UEAP), Resettlement/Rehabilitation Policy Framework (RPF), (2006).
- Eguavoen, Irit and Weyni, T. 2011. "Rebuilding livelihoods after dam-induced relocation in Koga, Blue Nile basin, Ethiopia." ZEF Working Paper 83. Bonn.
- Endeshaw G. 2016. "Impacts of Urban Renewal Induced Displacement and Resettlement on The Economic and Social Life of Displaced People: The Case of Yeka Ayat 2 Condominium (Unpublished MA thesis)." Addis Ababa University, Addis Ababa.
- Endeshaw Gebrie. 2016. "Impacts of Urban Renewal Induced Displacement and Resettlement on The Economic and Social Life of Displaced People: The Case of Yeka Ayat 2 Condominium (Unpublished MA thesis)." Addis Ababa University, Addis Ababa.
- Frank, V. & Deanna, K. 2017. "Displacement, resettlement and livelihoods." Impact Assessment and Project Appraisal, 35:1, 2-2, DOI:10.1080/14615517.2016.1272212.
- Friehiwot, Tarekegn. 2013. The Impact of Development Induced Displacement on Social Capital inAddis Ababa: An Implication for Rebuilding Social Capital, Unpublished MA
  Thesis, Addis Ababa University
- Gebre, Ayalew. (2009). Stakeholder Analysis of the Koga Irrigation and Watershed Management Project. A study report submitted to the IWMI. Addis Ababa.
- Gebre, Y. 2008. "Urban development and displacement in Addis Ababa. The impact of resettlement projects on low income households, in: Eastern Africa Social Science Research Review, 24, 2: 53-77.

- Gebre, Yntiso (2008), Urban development and displacement in Addis Ababa. The impact of resettlement projects on low income households, in: Eastern Africa Social Science Research Review, 24, 2: 53-77.
- Gerkey D, Dams and Population Displacement on China's Upper Mekong River: Implications for Social Capital and Socio-Ecological Resilience, Global Environmental Change 36, 2016, p.153; Li X with Dong S, Zhao Q and Liu S, Impacts of Manwan Dam Construction on Aquatic Habitat and Community in Middle Reach of Lancang River, Procedia Environmental Sciences 2, 2010, p.709-711
- Graf, W.L., 2002. Dam removal: science and decision making. Washington, DC: The H. John Heinz III Center for Science, Economics, and the Environment.
- Jhonson, P. and Graber, L. 2007.Rights and Development-Induced Displacement: Is it a case of Risk Management or Social Protection? Bradford Center for International Development BCTD Research paper no.16
- Haregewoin, W. 2007. "Integrated Housing Development Programs for Urban Poverty Alleviation and Sustainable Urbanization: The Case of Addis Ababa', *Proceedings of European Network for Housing Research on Sustainable Urban Areas*, Rotterdam, (25-28 June).
- Heidi Hull. 2009. Large Dams: Human and Environmental Benefits and Costs. Retrieved October 12, 2020 (http://digitalcommons.colby. edu/honors theses/786).
- Hydropower for Sustainable Development. 2011. "Gilgel Gibe Hydroelectric Project Environmental Management Plan." Retrieved October 03, 2020 (https://www.researchgate.net/profile/Eugenio\_Zoppis/publication/271512710\_Gilgel\_G ibe\_Hydroelectric\_Project\_in\_Ethiopia).
- International Finance Corporation. 2019. Good Practice Handbook: Preliminary Draft for Review and Consultation. "Land Acquisition and Resettlement". March 2019.
- Kebede, Kassahun. 2009. "Social dimensions of development- induced resettlement. The case of Gilgel Gibe hydro-electric dam, in: Alula Pankhurst and François Piguet (eds.) Moving people in Ethiopia. Development, Displacement and the State. New York: James Currey, pp.49-65.
- Kevin, L., Longyi, X., & Mark, W. 2016. "Spatial restructuring through poverty alleviation resettlement in rural China. Journal of Rural Studies, 47, 496e505.

- Koenig, D. (2001). Toward local development and mitigating impoverishment in development-induced displacement and resettlement. Final Report Prepared for ESCOR R7644 and the Research Program on Development-Induced Displacement and Resettlement Organized by the Refugee Studies Centre, University of Oxford
- Le, T.; Al-Juaidi, F.; Sharif, H. "Hydrologic simulations driven by satellite rainfall to study the hydroelectric development impacts on river flow. Water 2014, 6, 3631. [CrossRef]
- Luthans, F., Luthans, K. W. & Luthans, B. C. 2004. "Positive psychological capital: beyond human and social capital. Business Horizons, 47, 45-50.
- McCabe, J. T. 2003. Sustainability and livelihood diversification among the Maasai of northern Tanzania. *Human Organization*, 62(2): 100-111.
- McCully, P., 2001. Silenced rivers: the ecology and politics of large dams. London: Zed Books.
- Mcdowell, C. & Morell, G. 2010. "Displacement beyond conflict: challenges for the 21st century, Berghahn Books.
- Mello.S. 2003. *Guiding Principles on Internal Displacement*, International Review of the RedCross,1-10. Retrieved September 29, 2020 (https://www.icrc.org/eng/resources/documents/misc/57jpgl.htm).
- MoME (Ministry of Mines and Energy). 2007. The Ethiopian Energy Sector Status and Strategic Plan, ethiopian.
- Morse, J. M. 1994. Designing funded qualitative research. In Denizin, N. K. & Lincoln, Y. S., Handbook of qualitative research (2nd Ed). Thousand Oaks, CA: Sage.
- Nguyen, H. T., Lobry De Bruyn, L. & Koech, R. 2016. "Impact of hydropower dam development on agriculturally based livelihoods of resettled communities: a case study of Duong Hoa Commune in central Vietnam. International Journal of Water Resources Development, 1-19.
- O'Leary, Z. 2014. The essential guide to doing your research project (2nd ed.). Thousand Oaks, CA: SAGE Publications, Inc.
- Obour, P.B.; Owusu, K.; Agyeman, E.A.; Ahenkan, A.; Madrid, À.N. 2004. "The impacts of dams on local livelihoods: A study of the Bui hydroelectric project in Ghana." *Int. J. Water Resour. Dev.* 2015, 32, 267–285. [CrossRef]
- Ofoezie, I. E.: Human health and sustainable water resources development in Nigeria: schistosomiasis in artificial lakes, Natural Resources Forum, 26, 150–160,

- https://doi.org/10.1111/1477-8947.00015, 2002.
- Ogbeide, H. E. and Uyigue, E.: Access to safe drinking water and schistosomiasis, in: Nigeria: survey on Ipogun Community, Ondo State of Nigeria, submitted to the Society for Water and Public Health Protection (SWAPHEP), 2004.
- Orr, B. (2001), Obour, P.B.; Owusu, K.; Agyeman, E.A.; Ahenkan, A.; Madrid, A.N. The impacts of dams on local livelihoods: A study of the Bui hydroelectric project in Ghana. Int. J. Water Resour. Dev. **2015**, 32, 267–285.
- Pankhurst A, Piguet F 2009. Foreword. In Pankhurst and Piguet (Ed.), Moving People in Ethiopia: Development, Displacement and the State. UK; Eastern Africa Series, Boydell and Brewer Ltd. pp. xxxi-xi
- Pankhurst A, Piguet F. 2009. Foreword. In Pankhurst and Piguet (Ed.), Moving People in Ethiopia: Development, Displacement and the State. UK; Eastern Africa Series, Boydell and Brewer Ltd. pp. xxxi-xiThe Ethiopian Energy Sector Status and Strategic Plan, ethiopian Ministry of Mines and Energy, May 2007
- Pankhurst, Alula and François P. 2009. "Displacement, migration and relocation." Alula Pankhurst and François Piguet (eds.) Moving people in Ethiopia. Development, Displacement and the State. New York: James Currey, pp.246-264.
- Rooder, W. 1994. "Human adjustments to Kainji Reservoir in Nigeria." New York/London: Solomon, S. 1998. Hydropower of Ethiopia: Status, potential and prospects. Ethiopian Association of Civil Engineers (EACE) Bulletin Vol 1, No 1 Addis Ababa, Ethiopia
- Rossman, G.B. & Rallis, S.F. (1998), Learning in the Field: An Introduction to QualitativeResearch, Sage, London.
- Scudder, T. 2001. "The World Commission on Dams and the need for a new development paradigm. International Journal of Water Resources Development, 17, 329e341.
- Scudder, T. 2005. "The future of large dams: Dealing with social, environmental, institutional and political costs. London, UK: Earthscan.
- Scudder, T. 2005a. "A Comparative Survey of Dam-induced Resettlement in 50 Cases. Thayer Scudder with the Statistical Assistance of John Gay.
- Scudder, T. 2005b. The future of large dams: dealing with social, environmental, institutional and political costs, edited by: Scudder, T. (ed.). Earthscan, London, 2005.
- Scudder, T. 2012. "Resettlement outcomes of large dams. In: altinbilek, D., Tortajada, C. &

- biswas, A. K. (eds.) Impacts of Large Dams: A Global Assessment. Springer Berlin Heidelberg.
- Tadele, Feleke. 2009, "Urban development and displacement of rural communities around Addis Ababa, in: Alula Pankhurst and François Piguet (eds.) Moving people in Ethiopia. Development, Displacement and the State. New York: James Currey, pp.102-118.
- Tadese Beerisso,. 2009. "Planning resettlement in Ethiopia. The experience of the Guji Oromo and the Nech Sar National Park.", in: Alula Pankhurst and François Piguet (eds.) *Moving people in Ethiopia. Development, Displacement and the State*. New York: James Currey, pp. 93-101.
- Tefera, Bezuayehu and Geert, S. 2008. "Hydropower-induced land use change in Fincha'a watershed, western Ethiopia: Analysis and impacts in: Mountain Research and Development, 28,1: 72-80.
- Tefera, Bezuayehu. 2006, "People and Dams. Environmental and socio-economic changes induced by a reservoir in Fincha'a watershed, western Ethiopia, Wageningen: UP.
- Terminski, B. 2013. "Development Induced Displacement and Resettlement: Theoretical Frameworks and Current Challenges." Geneva. Retrieved September 23, 2020 (https://dlc.dlib.indiana.edu/.../Bogumil%20Terminski,%20development-Induced%20).
- Terri, H. 2008. "International Rivers, People, Water and Life What Cost Ethiopia's Dam Boom? February 2008.
- Tesfa Teferi, 2014: *The Effect of Development Induced Displacement onRelocated Household:*The Case of Addis Ababa, unpublished M.A thesis, The Hague, the Netherlands
- Tesfa Teferi. 2014. "The Effect of Development Induced Displacement on Relocated Household: The Case of Addis Ababa (unpublished MA thesis), Addis Ababa University.
- Tesfa, T.G. 2014. "The Effect of Development Induced Displacement onRelocated Household: The Case of Addis Ababa, unpublished M.A thesis, The Hague, the Netherlands
- The gilgel gibe affair. 2008. "An analysis of the Gilbel Gibe hydroelectric projects in Ethiopia."
- Tilt, B.; Braun, Y.; He, D. 2008. "Social impacts of large dam projects: A comparison of international case studies and implications for best practice." J. Environ. Manag. 2009, 90 (Suppl. 3), S249–S257. [CrossRef] [PubMed]
- WCD (World Commission on Dams). 2000. "Dams and development: a new framework for decision-making." Earthscan: London.

- WCD (World Commission on Dams). 2000. Dams and development: a new framework for decision-making. Earthscan: London
- WCD (World Commission on Dams). 2000a. "Dams and Development: A New Framework for Decision-making." The Report of the World Commission on Dams, November 2000. Earthscan.
- Webbe, G. 1981. "Schistosomiasis: Some Advances." British Medical Journal (Clinical Research Edition), 283, 1104–1106, 1981.
- Wikipedia, 2011. "Gilgel Gibe I Dam." Retrieved October 09, 2020. (https://en.m.wikipedia.org/wiki/Gilgel\_Gibe\_I\_Dam).
- Williams, G. P. and Wolman, M. G. (1984). "Downstream effects of dams on alluvial rivers U.S." Geological Survey Professional Paper 1286, Denver, Colorado, USA, 1984.
- World Bank. 2004. "Ethiopia The Gilgel Gibe Resettlement Project." Retrieved September 21, 2020 (https://openknowledge.worldbank.org/handle/10986/9860?show=full).
- World Bank. 2004. "Planning and Implementation in Development Projects." Involuntary Resettlement Sources Book. The International Bank for Reconstruction and Development: Washington, DC, USA, 2004.
- World Bank. 2016. Environmental and Social Framework Setting Environmental and Social Standards for Investment Project Financing.
- World Bank. 2016. Environmental and Social Framework Setting Environmental and Social Standards for Investment Project Financing.
- World Commission on Dams(WCD). 2000. "Dams and Development, a New Framework for Decision-Making." Earthscan Publications Ltd.: London, UK, 2000.

# **Annexes:**

**Annex I: Time schedule** 

<b>Detailed Description of</b>	Timeframe								
Research Activities	2019		2020						
	Oct,	Nov.	Dec.	Jan	Feb	Mar	Apr	May	June
Identification of the research									
problem	X								
Reviewing literature	X								
Select topic	X								
Topic submitted to the	X								
department									
Preparing concept paper	X	X							
Proposal preparation			X	X					
Questionnaire development					X				
Pre-testing and Finalization of					X				
instruments									
Identification of Study site	X					X			
Field work (data collection)									
									X
Transcription of data from tape to									X
paper and translation into English									
Data Editing and Data Entry									X
Data Analysis and Reporting									X
Writing									
First draft (preliminarily									X
findings), Corrections									
Finalization of Report and									X
Submission									

# Annexes II: Questionnaire administered to individuals, key informants and focus groups

Section one: In-depth interview guiding questions for resettles

I. Demographic information

2.2.1	Name of the research par	rticipant(optional)
2.2.2	Place of residence	
Ι	District	
ŀ	Kebele	
2.2.3	Sex:	
a. l	Male	b. Female
2.2.4	Age	
2.2.5	Marital status:	
a. \$	Single	c. Divorced
<b>b.</b> ]	Married	d. Widowed
2.2.6	Family size:	
2.2.7	Educational level:	
2.	Read and write only	
3.	Elementary school	
4.	Secondary school	
5.	Tertiary and above	
2.2.8	How much is your curren	nt annual income?

# II. Livelihood situation of the resettles during pre-resettlement period

2.2.9 What were the main sources of your household income and employment situation your area before resettlement?

- 2.2.10 What type of agricultural products you produced or animal husbandry reared in your area before?
- 2.2.11 Among your sources of income, which one was better for your family? How?
- 2.2.12 How many family members were in the household before resettlement?
- 2.2.13 Please describe/rate the communities' access to the following services before resettlement
  - 1 Schools
  - 2 Health center
  - 3 Electricity
  - 4 Water supply
  - 5 Road
  - 6 Market place
  - 7 Financial institutions such as banking services, microfinance
  - 8 Access to agricultural input services like fertilizers, provision of improved seed varieties, animal husbandry
- 2.2.14 How much was your annual income before?

#### III. Livelihood situation of the resettles at post-resettlement period

- 2.2.15 What is the main source of income for the household at your current residence (agriculture, trade, both)?
- 2.2.16 What type of agricultural products produced and animal husbandry reared in your present locality now?
- 2.2.17 Are there any significant engagement shift in the household activities with regard to income generating activities such as change from on farm to off-farm activities, large scale to small scale agricultural activities, from employment to unemployment or viceversa as a result of the project? How?
- 2.2.18 How do you realized the opportunities and challenges the communities faced as a result of the dam project in terms of income, agricultural productivity, school, religious institutions, housing, electricity, clean water, social ties, microfinance services, etc

- 2.2.19 Are there any of your family members who dropped out of school in the new area? How do you think and why did this happened?
- 2.2.20 Can you explain about the current household's employment situation and income? How is affected?
- 2.2.21 Please describe about any additional costs you incurred on your family or saved due to the change in your place of residence?
- 2.2.22 Did you like the resettlement location or not? Why?
- 2.2.23 What did you lose as a result of constructing Gilgel Ghibe I Hydroelectric Dam Development and Resettlement (GGIHDR) project? How?
- 2.2.24 How did your social conditions affected due to the resettlement in terms of social relationship/ties, culture, crime, demographic change, social institutions such as religion, edir, activities?
- 2.2.25 Whom do you think is most affected among the household or community members due to the dam development and resettlement by the displacement? Why?
- 2.2.26 How did access to various services such as social services (like schools, health care, electricity, water supply,....etc) were affected? What did they look like before and after resettlement?
- 2.2.27 What coping strategies you and your family members used to deal with the challenges of resettlement?
- 2.2.28 How is your relationship with the host community?

#### IV. Community consultation during pre-resettlement period

- 2.2.29 In what way or how have you been acquainted with an information for the first time that your land was going to be given for Gilgel Gibe I Hydroelectric Dam project? What was your response?
- 2.2.30 Have you been consulted or discussed about the resettlement process before it carried out? How were you consulted and who participated in it?
- 2.2.31 What were the discussion agendas (if there were discussions ahead)? And who were responsible to organize it?

2.2.32 Was the displacement and resettlement process took place according to the discussion? Why?

# V. Compensation and benefit packages

- 2.2.33 What benefit packages were promised (if any) by government or others? How did you see their implementation?
- 2.2.34 Were you satisfied of the packages? If not, how did you complained or what were your appeal mechanism (individually, by forming group, by hiring a lawyer)?
- 2.2.35 In addition to monitory compensation, what kinds of support did you receive from the government or other concerned bodies before, during and after displacement in relation to the displacement process (trainings, follow-ups, and facilitating conditions for new life startup)?

#### VI. Recommendations

- 2.2.36 If displacement in this case was not avoidable what additional compensation do you think would help you to improve your life after displacement?
- 2.2.37 How do you evaluate your situation before and after displacements?

## Section two: In-depth interview guiding questions for key informants

1. Name of respondent	
-	
2. Position of the respondent	

- 3. In what ways do you think the displacement has affected the livelihoods of the households?
- 4. Did the resettled people participated in the planning process of their future life?
- 5. What was the compensation given for the displaces before, during and after resettlement and who decides the amount and types of compensation?
- 6. Do compensation paid for affected properties and lost land was adequate and immediately? How?
- 7. Was there any kind of arrangement for the affected people dissatisfied of the compensation?
- 8. Can you please describe the process which was undertaken to remove people from their original residence?
- 9. Which items were involved in compensation payment to the resettled households?
- 10. Has the program affected the previous social organization and neighbor ties of displaced people?
- 11. Could the people continue their previous activities or did they need new livelihood strategies?
- 12. Can you explain the criteria to displace the households from their home?
- 13. Do you think the compensation paid to the people achieved the goal of improving and /or restoring their livelihoods?
- 14. Who paid for the displaces' lose due to displacement from their original place?
- 15. What are the challenges you face when dealing with the issues of resettlement?
- 16. What are your recommendations to lessen or overcome the challenges?

# Section three: Interview guide for Focus Group Discussion (FGD)

. Name of respondent	
. Position of the respondent	

- A. Can you explain the advantage and disadvantage of the project to the local community?
- C. Did the government disseminate information to the affected people before actual resettlement took place?
- D. Did the project affect the livelihood of the community? How?
- E. Did you feel the displacement/relocation /compensation was carried out according to the existing policy, legal and institutional frameworks?
- F. Did the compensation paid for dislocated land was satisfying?
- G. What where government assistance and re-establishment conditions after displacement?
- H. What kind of support was provided to the relocates?
- I. Was the compensation paid adequate and immediately?
- G. What were the criteria to displace the households from their home?
- L. Has the program affected the previous social organization and neighbor ties of displaced people?

# Thank you!

# Annexes III: Questionnaire translated in Oromic language Qaleelcha gaffii fi deebii dhunfaa qophayee kan dhiyaate hawwasaa Bulbulaa buqqa'eef.

1.	Raga waliigalaa	
1.1	Maqaa nama gaffii gafaatamu	
1.2	2 Iddoo jireenya	
	Aanaa	
	Ganda	
1.3	B. a Saala A. dhiira B. a	lubaraa
1.4	l Umrii	
1.5	5 Haala ga'iilaa	
	A. Kan hin fudhiin ( kan hin herumnee)	
	B. Kan fuudhe( hureemte)	
	C. Haftee	
	D. Heruumtee( fuudhee) kan hiikee ( hik	tee)
1.6	5 Baayinaa maatii	
1.7	<sup>7</sup> Sadarkaa barnoota	
	A. Dubbisuu fi barreessu qofa.	
B. Barnoota sadarkaa tokkoffaa		
	C. Barnootaa sadarkaa lammaffaa.	
	D. Yuniiversity (kolleejjii) fi isaa oll	
1.8	3 Galiin waggaa kessaan hagaam gaha (qa	rshii)?

# II. Hawwasni Buqqa'uun Duraatti Haala Jireenyaa Isaani.

- 1.9. iddoo kana oso hin qubatiinin dura iddoo jiraacha turtani burqaan galii kessani maal ture?
- 1.10. qubannaan duraatti wantii omishtaan omishaa qonnaa fi horsisaa beeyladaa akkami faadha?
- 1.11. wantaa galii isiin argachisuu yookiin isaa kamtuu irraa foyya'a ture? Akkamitti?
- 1.12. qubannaan duraatti baayinni maati kessaani meeqa ture?

- 1.13. maaloo hawwasnii iddoo duraa jiraacha ture irraa gahee qabdan tajaajilaa armaan gadii ibsa.
- A. mana baruumsaa.
- B. gidduugalaa Fayyaa.
- C. Humnaa Ibsaa.
- D. Dhiyyessaa Bishaani.
- C. Dandii
- E. iddoo gabaa
- F dhabbataa Fayinaansii( tajaajilaa Bankii, mayikiiroo fayiinansii)
- G. galtee qonnaaf ( waan akka Xaa'oo, Sanyii filaatama jiran) wal'aansa beeylada fi gahee biro qabdan.
- 1.14. galiin waggaa duraan qabdan meeqa turee?

# III. Hawwaasni ergaa as qubataani booda haalli ittin bulmata fi jireenya irra iiraan.

- 1.15. ergaa as qubaattani booda maddii galii kessaani maalidha? ( qonnaa, daldalaa, lamanu, hojii guyyaa) kan biros yoo jiraatee ibsa.
- 1.16. yeroo amma kana wantii omishtaan omishaa qonnaa fi beeylaada horsiiftan maalidha? Ibsa.
- 1.17. piroojektii hidhaa waliin walqabate jireenya asiitti ergaa egaaltani booda sochii jijjiiraama gosaa akkami godhaa jirtu ( Fkn, qonnaa irra gara daldalaatti, makaniziimii irra gara qonnaa gada-aanatti, hojii irra gara hojii dhabaatti, qonnaa irra gara hojjetaa guyyaatti)? Ibsa
- 1.18. karoora ijaarsa piroojeektii hidhaa waliin wal qabate wantaa gaarii akkami fi rakkinaa umaamaan? Fakkeenyaf galii, omiishaa qonnaa, mana baruumsa, dhabbataa amaanta, mana jireenya, ibsaa, bishaan dhugaati, waliitti hidhaminsaa hawwasaa,dhabbataa faayinaansi maayikiroo k.k.f.
- 1.19. hallii hojii amma galiin maati kessaani maal fakkataa? Haala akkami fi maliidhan dhibbaa isiinirra gahe?
- 1.20. sababa as dhufuu kessaanin baasii akkamitif saxiilamtaani?
- 1.21. naannoo qubaanna kana jalaattani jirtu?
- 1.22. sababaa piroojeektin as qubbachuu kessanif wantii dhabdaan jira? Akkamitti?

- 1.23. hallii hawwasuummaa dhiibbaa akkami isinirraan gahe? Fakkenyaaf, waliitti hidhaaminsa hawwaasummaa, aadaa, amaanti, bartee k.k.f
- 1.24. piroojeektii waliin wal qabatee sababaa naannoo qubannaa umaameen irra caalaa midhaamee jettee yaddaa? Akkamitti?
- 1.25. hawwaasni fayidaa garagaraa ( social services) gahuumsa tajaajila jiru akkamitti ibsu? Fakkeenyaf, mana baruumsa, gidduugalaa fayyaa, ibsaa, dhiyyessaa bishaan?
- 1.26. hawwaasni haala akkami fi akkamitti rakkoota qubaannan booda dhabbatani furmaata kennaa jiru?
- 1.27. Ganda Bulbuul yoo safartan duraani hawassaa naannoo kana jiran waliin walitti dhufeenyaa qabdan maal fakkaataa? Rakkoo maliis issin qunamerra?

## IV. Marii hawwasaa Qubannaan Duraa

- 1.28. Iddoon kessaan durani ijaarsaa hidhaa Gilgal Gibee yeroo jalqabaatif wantii dubbataan akkam ture? Haala akkamin?
- 1.29. Wa'ee qubannaaf qamni isiin mariisise jira? Akkamitti isiin marisisaan? Enyuu kan isiin marisisee enyuutu hirmaate?
- 1.30. Mariin yoo jiraatee ajaanda maalii irratti mari'attaan?
- 1.31 Mariin yoo jiraate ture haala marii kessaan qubattaani turtaniree? Yoo ta'u baate maaliif? Ibsa.

## V. Beenya fi Fayidaale biroo.

- 1.32. Mootummaadhan yookin qaama birootin wantii waada isiini galaan maalinni? Hojii irra oole jira? Akkamitti?
- 1.33. Wantii isiinif taasifameen itti gammadaani jirtuu? Yoo ta'uu baate koomi kessaan akkamitti qaama ilaallatuf dhiyeessitan?
- 1.34. Beenya isiinif kennamee irratti dabalaan mootummaan waaqti qubaanna, qubaanna dura fi booda gargarsaa akkami isiini godhe?

#### VI. Yaaada

- 1.35. Qubaannan yeroo amma kana oso ta'e jiraate beenyan dabalata yookiin deggarsii oso jiraate jettuu?
- 1.36 Waluumagalaatti qubaannan duratti fi booda haala jiru akkamitti xinxaltu?

# Kutaa lama:-Gaaffii ragaa iccitii cimaan itti kennamuuf qophayee.

2.47 Hawwasaa iddoo dura turan irra kaasudhafi beenya kanfaluuf kallattiin ka'aame ture? Yoo ka'aame jiraate maaloo nuf ibsaame

2.46 Hawaasnu erga qubannaan booda hallii jireenyaa isa kan jalqaba moo haala jireenya

- 2.48 Kanfaltiin beenya tasifaame haala hawwasni dura itti jiraacha ture gara turetti deebisuuf( yoo danda'amee foyyeessun) tiin galmaa gahera jettanni yadduu? Yoo yaaddan akkamitti?
- 2.49 Kanfaalti beenya enyuudha kan rawwatee?

biro karoorfatera?

2.50 Wa'ee dhimmaa qubaanna irratti yeroo marii tasiftaan rakkoon isiin mudaate jira? Yoo jiraate maalidha?

- 2.51 Beenyan qubaanna seera yeroo sana ture, haala fi qajeelfamaan rawwaateraa jettani yadduu? Eyyee yoo jettan akkamitti?
- 2.52 Rakkoo kana itti fuufinsan rakkoo kessaa baasuuf yaada akkami qabdu?

# Kutaa sadii:- gaaffii garee xiyyeeffannoof qophaa'e ( Focus Group Discussion ) FGD

3.53 Maqaa nama gaaffii gaafatamu_	
3.54 Gahee hojii	

- A. Faayidaa fi miidhaa Piroojeektii Gilgal gibe 1 ibsa.
- B. Qubaannan oso hin rawwataminin duratti mootummaan karoorichaf ragaa gaha kenneraa?
- C. Piroojektiin haala jireenya hawwaasaa buqqaa'a irrati dhiibbaa godheera? Yoo gessisee akkamitti?
- D. Lafa isin jala fudhatamee fi qabeenya biro dhabdanif beenyan isinif kennamee gaha fi quubsadha? Akkamitti?
- E. Erga buqqaatani booda mootummaan isiin deebisuu dhaabuf gargarsii akkam ture? Gargarsaa akkamitituu isiinif ta'e?
- F. Hawwaasni iddoo jiraatuu yoo ka'uu fi qubannaa yoo ilaallu ulaaga qaba? Yoo qabatee ulaaganis maal ture?
- G. Sagaanta qubaanna kana dura qindoominaa fi olluumma hawwasaa irratti dhibbaa uumee? Yoo uume akkamitti?

## Galatooma!

# **Annex IV: Project documents**

World Bank Repot in December 2005: a socio-economic survey of those households resettled by the project.

Environmental Protection Authority Repot In February 2006: audit of the project impact assessment.

**EEPCO's Environmental Management Unit Repot:** In March 2006 completion report on Environment and resettlement was completed by

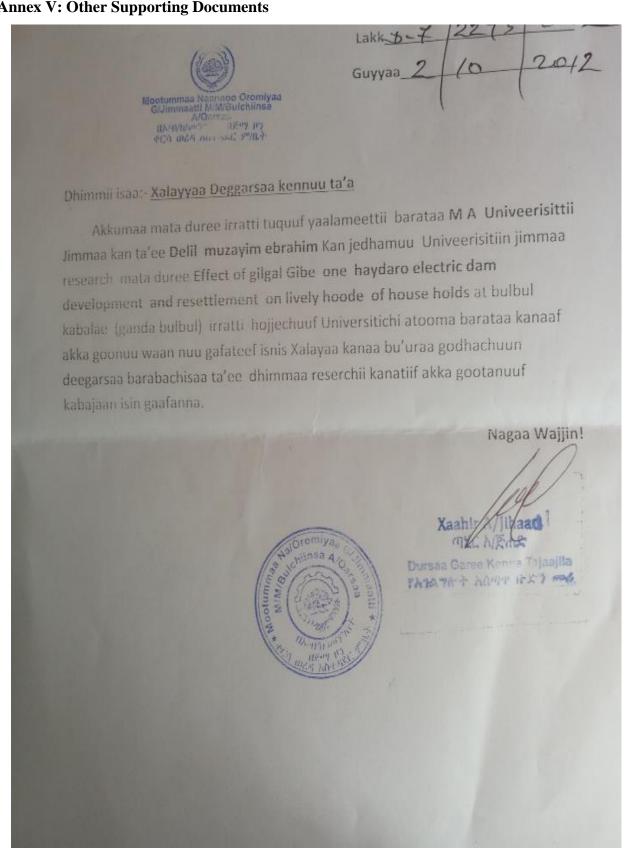
**The Gilgel Gibe Affair:** An analysis of the Gilgel Gibe hydroelectric projects in Ethiopia 2008 b the Wold Bank

Energy II Project Implementation Completion Report: Executive Summary March 2006

**Ethiopian Electric Power Corporation:** Gilgel Gibe Hydroelectric Project Completion Report on Environment and Resettlement March 2006

ADB (African Development Bank): 2003. "Involuntary Resettlement Policy 2003."

# **Annex V: Other Supporting Documents**



ስኢትዩጵያ ቀይ መስቀል ማሀበር ለጅማ ቀይ መስቀል ማሀበር ጽ/ቤት ጅማ

> ጉዳዩ፡- በቀርሳ ወረዳ ልዩ ስሙ ቡልቡል በተባለው ቀበሌ ዉስፕ ስለ ሰፌሩ ተልናቃዮች ይመለከታል፤፤

በግል**ን**ል ግቤ የሃይድሮ ኤሌክትሪክ ፖወር ግድብ ምክንያት ከቦታው እን**ድ**ነሱ የተደረጉ ገበሬዎች ከ1994 ጀምሮ ወደ ቡልቡል ቀበሌ እንዲ<mark>ሥፍ</mark>ሩ መደረጉ ይታወቃል፤፤

በወቅቱ እንዲሥፍሩ በተደረገ ለሁለት ዓመታት ጥሩ ምርት ማግኘት ከ**ታ**ሉ በኋላ በየጊዜው የምርት መቀነስ በተከታታይ በመከሰቱ ለረሃብ ችግር እንዲጋለጡ ሆነዋል፤፤

ይሁን እንጂ ችግሩ ከተከሰተ በኋላ በጥምር የዞን ከሚቴ በቦታው ተገኝቶ ለማጥናት ባደረገው ሥራ መስክ ፡-

- ተፈናቃቀይ ገበሬዎች እንዲሠፍሩበት የተደረገው መሬት ለብዙ ዓመታት ሰው ያልኖረበት ለእርሻም ያልዋለ ሲሆን ምርታማነት የሌለው አፈር መሆኑ፣
- የአፈሩ ባህርይ ጥቁር መሬት ፤ውሃ ጵጠሪ በመሆኑ የተዘራው ሰብል በቂ ንጥረ ነገር አግኝቶ ለማደግ ሰለማይችል በየጊዜው በቂ ምርት አለማግኘት ፣

- በመበራጥ ሬሃብን ለመዋዋም መታገላቻው፣
- ያላቸውን ከብት በየጊዜው በመሸጥ ለችግሮቻቸው በማዋ**ሳቸው ወደ** ከፋ ችግር መግባታቸው፣
- በአካባቢው እየኖሩ ያሉት እንኳ በጓራቸው ምንም አይነት ሰብልና ለገቢ እንኳ የሚሆን የሌላቸው መሆኑና መሬቱም የማያበቅል መሆኑ፣
- በቤታቸው ዉስተ መሬቱ ውሃ መቋጠርና በማመንጨቱ ምክንያት እንደፈለጉ በውስጡ ለመኖር መቸገራቸው? በተፈጠረው ቅዝቃዜ ምክንያት ለተለያዩ በሽታዎች መጋለጠቸዉ፣
  - በተለይ ሕጻናት፣ እናቶች የበለጠ የተጋለጡና በልጆች ላይ የዕብመትና ሌሎች በሽታዎች በመተየታቸዉ ምክንያት በቀበሌው ወስጥ ከሚኖሩት አባወራ 602 ቤተሰብ 4465 ውስጥ አባወራ 523 ቤተሰብ 2920 የችግሩ ሰለባ ሆነዋል፤፤ በዚሁ መሠረት፤-
    - 1. በአንደኛ ደረጃ ተጎጂዎች
      - **• ሕጻናት በቁጥር** 584
        - እናቶች በቁጥር 523
        - አዛውንቶች በቀጥር 100 በድምሩ 1207
    - 2. በሁለተኛ ደረጃ ተንጃዎች በቁጥር 2236 በድምሩ 3443 ሰዎች በአሁኑ ሰዓት ለምግብ እጥረት የተጋለሙ ስለሆነ በተለይ ለሕጻናት ፣ እናቶችና አዛመንቶች ተጨማሪ አልሚ ምግብ የሚያስፈልጋቸው በመሆኑ በእናንተ በኩል አስፈላጊው የሰብዓዊ እርዳታ እንዲደረግላቸው የአክብሮት ጥሬያችንን እያደረግን፣ ለመደፊቱም በዘላቂነት ለማስፈር በምናደረገው. ጥረት ድጋፌችሁ እንዳይለዮን