THE IMPACT OF EXPLORATION ACTIVITIES FOR OIL AND GAS ON THE LIVES OF PEOPLE IN THE ALBERTINE GRABEN REGION IN WESTERN UGANDA : AN ANALYSIS OF THE HOIMA DISTRICT

MOSES ARTHUR KABONGE

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UGANDA CHRISTIAN UNIVERSITY

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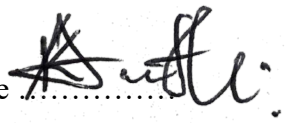
DECLARATION

I, Kabonge Arthur Moses declare to the best of my knowledge that this research report is truly my original and has not been submitted in fulfillment for any award of a degree in any other Institution of Higher Learning or University, so it is entirely out of my own efforts.

Signature  Date……

Kabonge Arthur Moses

SUPERVISOR'S APPROVAL

This is to certify that this report is compiled under my supervision. It is now ready for submission to the University.

Signature …… Date: 03/04/2025

MR. JAMES ABBEY MUGERWA

DEDICATION

This piece of work is dedicated to my beloved father Mr. Samuel Richard Mutebi for the love holistic moral, financial and social support throughout my education and life in general and also my siblings for their endless prayers for me.

ACKNOWLEDGMENT

With a grateful heart I thank the Almighty God for the gift of life, good health and the grace for better days.

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I also extend my thanks to my brothers and sisters who stood by my side, offering a listening ear, a shoulder to lean on, and countless moments of delight.

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SPSS	Statistical packages for social scientists
PSAS	Production sharing agreements
UBS	Uganda bureau of statistics
GDP	Gross domestic production
PEPD	Petroleum exploration production and development
CVI	Content validity index
PAU	Petroleum authority of Uganda
MEMD	Ministry of energy and mineral development
NOGP	National oil and gas policy
BDLG	Buliisa district local government

ABSTRACT

The study examined the impact of exploration activities for oil and gas on the lives of people in the albertine graben region in western uganda. an analysis of the Hoima District. With a growing focus on natural resource extraction in the region, understanding the implications of exploration activities on local communities' livelihoods is imperative for sustainable development. This was guided by the following objectives;- *to find out the main exploration activities taking place and to establish the impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County, Hoima District*. The Oil and Gas industry everywhere faces problems and challenges. However, in the developing countries, these difficulties and challenges are present alongside a general situation of socio-economic stress, chronic resource shortages, institutional weaknesses and a general inability to deal with the key issues.

The study adopted an economic theory by Adam Smith (1776) the theory states that wealth is created via labor, and self-interest spurs people to use their resources to earn money. This was relevant since it is an influential figure of the Industrial Revolution in Uganda. Oil and gas exploration activities are an indication to the revolution of the sector. The Oil and Gas industry everywhere faces problems and challenges. However, in the developing countries, these difficulties and challenges are present alongside a general situation of socio-economic stress, chronic resource shortages, institutional weaknesses and a general inability to deal with the key issues. The researcher adopted a descriptive research design. This is done to identify and obtain information on the characteristics of a particular issue (Kothari, 2008). The sample involved 33 respondents and determined by Slovene's formula.

Findings indicate that the males were the most at 23(69.7%) with the females being the least at 10(30.3%). Results also indicates that government has conducted surveying of the land with mean 3.36 std.54 surveying is one of the oil and gas exploration activity taking place in Butiaba Sub country, 3.39 mean indicates that there is site clearance including the surrounding areas of communities in Butiaba sub county and it is what guided for the establishment of the oil and gas plant. The study also found out that livelihood sources were engaged in before and after commissioning of oil and gas exploration activities. Mean 3.48 indicated that people access to safe water for domestic use in the community.

In summary, the exploration activities undertaken in Butiaba sub county have provided helpful insights into the region's geological composition and potential resource reserves. This entails strengthening oversight mechanisms to enforce compliance with environmental regulations and best practices, including rigorous environmental impact assessments (EIAs) throughout the exploration process.

CHAPTER ONE

INTRODUCTION

1.0 Introduction

The study examined the impact of exploration activities on people's livelihoods in the Hoima District. With increasing oil and gas prices worldwide, regions endowed with this finite and nonrenewable resource continue to reap the benefits of the profitable businesses associated with the resource development.

1.1 Background of the study

1.1.1 Historical Background

The Albertine Graben, situated in the western part of Uganda, has long been acknowledged for its geological potential. Historically, this region has held agricultural and cultural significance, with farming and fishing serving as the main livelihoods for local communities. The discovery of oil in the Albertine Graben dates back to the 1920s, when exploration activities were first initiated by foreign companies. However, it wasn't until the early 2000s that commercial oil exploration began to develop, marking a significant shift in the region's economic trajectory.

The commercial viability of Uganda's oil reserves has been confirmed by significant discoveries made by Tullow Oil and other international oil companies in the Hoima District, located at the heart of the Albertine Graben. After the oil discovery, the Ugandan government-initiated negotiations with international oil companies, leading to the establishment of a formal development plan for oil extraction. Over the past two decades, Hoima has experienced an influx of exploration and production activities, including the construction of oil-related infrastructure such as roads, pipelines, and refineries, which have transformed the local economy and the livelihoods of its people.

Historically, the impacts of these changes on local communities have been mixed. While oil exploration has created new job opportunities and the potential for economic growth, it has also raised concerns about land rights, environmental sustainability, and social dynamics. Local

communities, primarily dependent on agriculture, have had to adjust to new realities, including displacement from their ancestral lands and shifts in their traditional ways of life.

1.1.2 Contextual Background

The contextual background of this study is framed within the larger context of Uganda's oil and gas sector, which has been characterized by both optimism and controversy. Uganda's oil exploration has the potential to greatly contribute to the country's economy, with estimates indicating that the nation could produce up to 230,000 barrels of oil per day in the coming years. However, the shift from exploration to production has encountered several challenges, especially regarding the social and environmental impacts on the local communities in the Albertine Graben region.

Hoima District has become a focal point of these developments, with its population increasingly affected by the physical, economic, and social changes brought about by oil and gas exploration. Many communities have faced displacement due to land acquisitions for oil projects, and agricultural activities once the primary source of livelihood have been disrupted by the influx of workers, environmental degradation, and shifts in land use patterns. Additionally, there is growing concern about the effects of oil exploration on the environment, particularly regarding the risk of pollution to water sources, deforestation, and the degradation of land that is critical for subsistence farming.

Furthermore, Hoima has experienced rapid infrastructural development in anticipation of the expansion of the oil industry. New roads, housing projects, and social services have been constructed, yet questions persist about how these improvements benefit local residents and whether they are sustainable in the long run. The shifting socio-economic conditions in Hoima necessitate a closer examination of how local communities are impacted by the exploration process.

1.1.3 Conceptual Background

This study explores several key concepts to analyze the impacts of oil exploration activities on the lives of people in Hoima District. Central to the study is the notion of sustainable

development, which emphasizes the need to balance economic growth with social equity and environmental protection. As Uganda's oil exploration and extraction activities intensify, the questions of how to develop the industry in a manner that benefits local communities without undermining their livelihoods or the surrounding environment have become crucial.

The concept of the resource curse, also known as the paradox of plenty, is pertinent to this research. It indicates that even though resource-rich countries like Uganda may possess considerable wealth from oil, the benefits of this wealth are not always distributed fairly and can frequently lead to increased inequality, corruption, and social tensions. This concept is especially significant in the context of the Albertine Graben, where oil exploration has introduced both opportunities and challenges for local communities.

Additionally, community displacement and land rights are important concepts in understanding the socio-economic impact of oil exploration. People displaced from their land due to oil and gas extraction have led to conflicts over compensation, land ownership, and the erosion of traditional livelihoods. Land is a significant cultural and economic asset for local communities in Hoima, and any disruption to its use can have profound effects on their social structures and overall well-being.

Finally, environmental justice is another crucial concept explored in this study. It focuses on the equitable distribution of environmental burdens and benefits, ensuring that the communities most affected by environmental degradation such as those living near oil exploration sites can voice their concerns and are compensated for any harm they may face.

1.2 Statement of the problem

The Albertine Graben region, situated in Western Uganda, possesses substantial oil and gas reserves that have drawn significant exploration activities over the past two decades. Hoima District, at the center of this region, has undergone rapid transformations due to these activities. While the oil industry promises economic growth, increased employment, and infrastructure development, it also presents considerable challenges that impact the local communities.

One of the main concerns is the effect of oil exploration on the livelihoods of local communities. For many years, the residents of Hoima have relied on agriculture, fishing, and other traditional economic activities. However, the influx of oil-related development has caused disruptions in these activities, including land loss, displacement, and environmental degradation. These changes have created uncertainties regarding the future economic well-being and social stability of these communities. Furthermore, the rapid transformation has strained local resources, changed traditional community structures, and raised questions about the sustainability of the benefits gained from the oil sector.

Additionally, the oil exploration process has raised concerns about the sufficiency of compensation for displaced individuals, the preservation of cultural heritage, and the long-term environmental impact on the region's ecosystems. Local communities often feel sidelined in decision-making processes, with minimal involvement in the planning and execution of oil-related projects. The lack of a thorough understanding of how these changes affect the daily lives of individuals and communities creates an information gap that must be addressed to ensure equitable and sustainable development.

Therefore, this study aims to address the need for a comprehensive analysis of the impacts of oil exploration activities on the lives of the people in Hoima District. This research will examine the socio-economic, environmental, and cultural consequences of oil exploration, seeking to provide an evidence-based understanding of both its positive and negative effects. The study will also investigate how these impacts are managed and whether the benefits of oil exploration reach local communities or primarily benefit external stakeholders. By exploring these issues, the study seeks to provide valuable insights that can influence policy decisions, encourage community involvement, and assist in shaping the development of the oil and gas sector to enhance the well-being of local populations while ensuring sustainable development in the region.

1.3 Purpose of the study

This study aims to examine the impact of oil and gas exploration activities on the lives of people in Hoima District, which is located in the Albertine Graben region of Western Uganda.

1.3.1 Research Objectives

i. To find out the main exploration activities taking place in Hoima District, which is located in the Albertine Graben region of Western Uganda

ii. To establish the impact of oil and gas exploration activities on people's livelihoods in Hoima District, which is located in the Albertine Graben region of Western Uganda.

1.4 Research questions

i. What are the main exploration activities taking place in Hoima District, which is located in the Albertine Graben region of Western Uganda?
ii. What is the impact of oil and gas exploration activities on people's livelihoods in Hoima District, which is located in the Albertine Graben region of Western Uganda?

1.5 Justification of the study

The Oil and Gas industry everywhere faces problems and challenges. However, in the developing countries, these difficulties and challenges are present alongside a general situation of socio-economic stress, chronic resource shortages, institutional weaknesses and a general inability to deal with the key issues. However, regarding EACOP, it is estimated that Uganda will realize between US$350 and US$400 million from the 15% equity shareholding. Production Sharing Agreements (PSAs) between the Government and international oil companies guide the sharing of proceeds from the crude oil. However, revenue from EACOP is linked to the total Upstream projects revenue because the pipeline is an enabler. It will also create employment, contracts for goods and services and generate tax for both Governments (Uganda and Tanzania).

The impoverished and underdeveloped countries and regions experience the worst and extended periods a there is a lack of management approach, response strategy and policy enforcement. This oil spills have affected the environment. With the petroleum exploitation activities have affected the environment and ecosystem-based services and have raised poverty and physical, mental and occupational mobility. The impact is that people have suffered and loss livelihood, which generates a significant case of unemployment.

Many topical issues which have implications for the Oil and Gas industry have, so far, only been discussed to a significant extent in the general context of what has been or what happened in Oil cursed nations like Nigeria and Chad rather than what should have been done differently. This therefore has caused concern in understanding the basis of petroleum exploration activities to effect people living around the Butiaba Sub County.

The study will therefore empirically study the impact of exploration on people's livelihoods in Butiaba, while also citing ways in which Uganda is to normalize Oil & Gas availability.

1.6 Significance of the Study

Insights into the common exploration activities of oil and gas companies in Butiaba Sub County and the measures taken to reduce the negative impacts of these activities will enable ministries to improve the legal and policy framework for the oil and gas sector. The study will be able to determine compliance or non-compliance. This will enable the review and introduction of new policies and regulations to reduce the sector's negative impact on people's lives.

The results of this study will provide exploration companies operating in the Butiaba sub-county with insight into the benefits that the local community expects from their companies.

This will encourage companies in the future to develop regions with the necessary resources to escape the oil curse, just as some parts of Africa, the archenemy of the oil curse, are suffering from its effects. The study will be incorporated into the company's social responsibility policy. The results of the current study will contribute to the existing body of knowledge on the livelihood impacts of the oil and gas sector in Uganda, where this field is relatively new. Therefore, this result can serve as a reference for future researchers in oil-rich regions.

1.7 Scope of the study

1.7.1 Geographical Scope

The study was conducted from Hoima District, which is located in the Albertine Graben region of Western Uganda. The Sub County has physical presence of oil and gas exploration infrastructure and with limited information of how the activities have affected people's livelihoods.

1.7.2 Content Scope

The study assessed impact of exploration on people's livelihoods in Hoima District, which is located in the Albertine Graben region of Western Uganda. This was guided by two variables independent variable (exploration) and the dependent variable (people's livelihoods). It specifically focused on the oil and gas exploration activities in the area, the livelihoods before and after commissioning of oil and gas exploration.

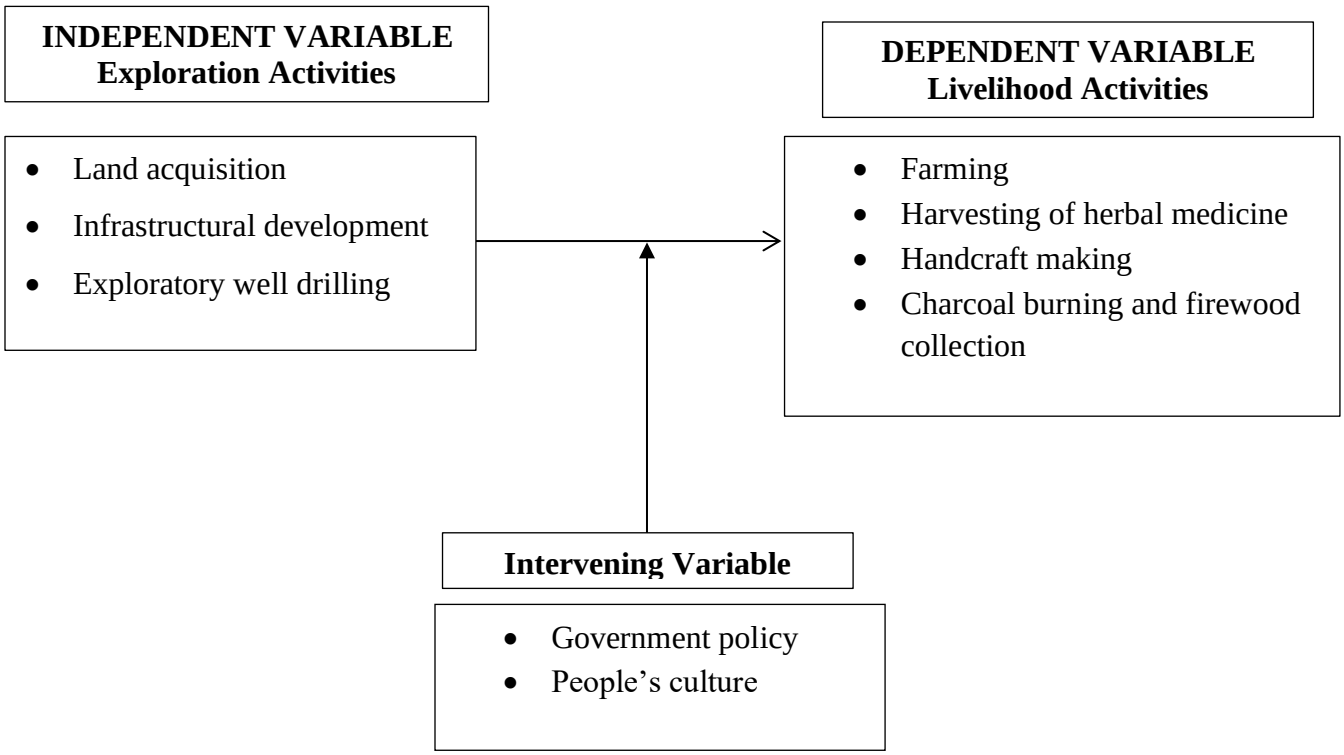
1.7.4 Theory of the study

The study adopted an economic theory by Adam Smith (1776) the theory states that wealth is created via labor, and self-interest spurs people to use their resources to earn money. This was relevant since it is an influential figure of the Industrial Revolution in Uganda. Oil and gas exploration activities are an indication to the revolution of the sector.

1.7.3 Time Scope

The study covers a period between 2015 and 2025; this period was selected because it was within the time-frame within which Hoima District experienced increased oil and gas exploration activities. However, field data collection was conducted within a period of 6 months gathering information and arrangement within the duration that is September 2024- April, 2025.

1.8 Conceptual Framework



Description of Conceptual Framework

Components of people's livelihoods as the dependent variable include activities such as farming and wood fuel harvesting. Oil and gas exploration and related activities is conceptualized as the independent variable that affects people's livelihoods in the community of Hoima District (dependent variable). It is hypothesized that undertaking oil and gas exploration activities such as infrastructural development and exploratory well drilling, is associated with both negative and positive effects on people's livelihoods.

However, without mitigation measures, the effects on livelihoods are largely negative since oil and gas exploration takes place on the land from which the community undertakes livelihood activities. The mitigation measures can be undertaken by companies involved in oil and gas explorations, government, local community or non-government organization.

CHAPTER TWO

LITERATURE REVIEW

2.0 Introduction

The chapter provided literature by scholars in areas related to the current study. This was presented in accordance to the impact of exploration on people's livelihoods in Butiaba. Literature inclined to the above guidelines and was searched from published documents, journals, conference papers and the internet.

2.1 Theoretical Review

The adopted the Economic Theory by Adam Smith (1776) the theory states that wealth is created via labor, and self-interest spurs people to use their resources to earn money (Smith, 1779). Smith published his first notable body of work, *The Theory of Moral Sentiments*, in 1759. In it, Smith discussed the idea that self-interested people naturally end up working toward an outcome that benefits everyone. He described this idea as an "invisible hand" that guided individuals toward paths that simultaneously improve their lives and the lives of the people on the other side of a trade. This concept of natural liberty leading to optimal outcomes is perhaps the most significant contribution to what we now call economic theory.

In 1776, Smith published an *Inquiry into the Nature and Causes of the Wealth of Nations*. Smith's ideas in these works and others helped develop the foundation of political economics, inspired policies that shifted away from mercantilism, established the concepts of specialization and the division of labor, and laid the groundwork for macroeconomic theory.

Before the Industrial Revolution, most of the population lived and worked on farms. Skilled artisans handcrafted most of the products that people used. These craftsmen were often part of a guild, which controlled the manufacturing and sale of products. Smith critiqued the monopoly power of the guild system, as well as the protectionist policies in which the government intervened to direct commerce (Adam Smith, 2001). He pointed out that allowing individuals to decide how to use their money, land, equipment, and labor how they saw fit would generate the most benefit

for the nation. His work suggested that allowing people to pursue their self-interest would result in a self-organizing system that was better for everyone.

At the same time, the Industrial Revolution turned manufacturing into a centralized process with the help of machinery and steam power. Factories could make products faster and cheaper than individuals could. Consequently, a significant portion of the population transitioned from cottage industries into new urban factories (Robbins, 1952).

Smith studied the motivations and natural tendencies of human beings. He observed that people were primarily driven by self-interest committing their resources to those things that most benefited them. He argued that all trade was mutually beneficial (Sen's, 2011). If one person in the exchange didn't come out better off, they would simply decline the deal. Therefore, Smith observed, all voluntary trade resulted in increased wealth, and therefore regulating trade was unnecessary and potentially damaging.

There are several indications in the text of the Wealth of Nations that Smith would indeed attach greater weight to the losses of the poor than to the gains of the rich. A reasonable interpretation of his postulate that competition works in the interests of society is that in the long run, everyone would benefit from living in a wealthy society. This interpretation receives support from another use that Smith makes of the metaphor of the invisible hand. Therefore, the theory is relevant in the way that it's an important role for government was to design an economic system that as far as possible discouraged the creation of private cartels and monopolies. With exploration activities going on in Butiaba District can be able to help improve on the livelihoods of people since they support society gains in the long run.

2.2 Related literature

2.2.1 Exploration activities taking place in Butiaba

According to (Ukoli, 2001), Oil and gas exploration activities include surveying, exploratory drilling, and seismically resilient land acquisition. Its purpose is to identify areas with oil and gas reserves by measuring and mapping surface and underground geological features. Seismic data collection is used to assess the amount of oil and gas that can be economically

recovered, determine the best locations to drill exploratory wells, and test geological formations. In these global activities, engineers determine access to oil and its quality. When determining oil and gas reserves, drilling and delineation operations are always performed to measure the area and thickness of the deposits containing the oil and gas.

The (OIIE&PF, 1997) According to the report, the oil and gas industry consists of an upstream segment that deals with exploration and production, and a downstream segment that deals with refining, processing, distribution and marketing of crude oil and gas products. The text also shows that in order to understand the causes of impacts that oil production may have on the environment, it is important to understand the activities involved. Identify exploration activities, including exploration surveying. Exploration drilling Evaluation; Development and Production and discharging and restoration.

Activities related to exploration include site preparation, clearing a large area the size of a soccer field for an oil rig. Oil rigs are always fenced to prevent trespassing, protect expensive equipment and people, and safely transport livestock distance (Byakagaba, 2019). There are also other processes and activities that involve the movement of drilling rigs and equipment, which require the construction of access roads and the transport of 100 to 150 trucks or truckloads, which are typically less convenient for local communities. It's inconvenient is recommended to raise awareness about road safety in the local community.

According to (Omorede, 2014) Exploration is assumed to be an advanced technique, including gravity surveys, passive seismic surveys, or area seismic reflection surveys, based on the principle of how long it takes for reflected sound waves to pass through materials (rocks) of different densities doing. Profile the substructure using the process of depth conversion. To (Cordaid, 2016), Aerial photography is used in oil and gas exploration. This involves flying planes or helicopters equipped with specialized equipment over areas where mineral deposits may be located and gathering information about the type of rock beneath the surface. This includes seismic data collection, which uses a technique called seismology to understand what's happening underground. Exploration drilling also includes drilling exploration wells after a seismic survey. Well drilling procedures require government approval, which assesses whether the drilling activity is likely to impact the environment, and local communities must also be informed.

In the past, surface features such as tar seeps or gas pockmarks provided initial clues to the location of shallow hydrocarbon deposits, but today, a series of surveys, starting with broad geological mapping through increasingly advanced methods such as passive seismic, reflective seismic, magnetic and gravity surveys give data to sophisticated analysis tools that identify potential hydrocarbon bearing rock as "prospects" (Ablo, 2015). Ablo states that logging and coring wells to measure the permeability, porosity and other properties of the geologic formation (s) are carried out during gas and oil exploration. He further asserts that well completion is sometimes considered first stage of drilling or development phase that normally affect the environment and terrestrial lives.

The studies cited above indicate that oil and gas exploration involve varying activities which depend on the geographic location, the level of technology and technical expertise available, the time frame among other factors. Explorations for oil and gas resources in Butiaba Sub County were officially commissioned over two decades ago and since then, the activities have been ongoing. However, limited documentation of the information on the specific exploration activities is available and yet understanding these would help to understand the likely effects on the environment and thus prescribe apt mitigation measures. The present study was therefore undertaken to profile the major oil and exploration activities that oil and gas companies are undertaking in Butiaba Sub County.

2.2.2 The impact of oil and gas exploration activities on people's livelihoods in Butiaba Sub County.

Vocation alludes to a set of exercises that include securing water, nourishment, medication, shield; and the capacity to procure the over necessities by people, a gather or community utilizing blessings for assembly prerequisites of people's family units on a feasible premise with respect (Batool, 2016). The exercises are ordinarily carried out over and over to maximize an angler's vocation that depends on the angling and accessibility of angle in waters and a agriculturist accessible on arrive.

Employments are necessarily to the texture of social orders around the world, reflecting the differing ways in which individuals secure their fundamental needs and seek after their desire.

Analysts such as Amartya Sen have emphasized the multidimensionality of employments, enveloping not as it were financial viewpoints but moreover social, social, and natural measurements. This point of view underscores the association of vocations with broader socio-economic structures and forms. Within the field of improvement considers, job approaches have picked up unmistakable quality, with analysts like Robert Chambers supporting for participatory strategies that center on nearby information and strengthening. Besides, the concept of economical vocations, popularized by the United Nations and organizations just like the Worldwide Labor Organization, underscores the significance of guaranteeing that job techniques are naturally sound, financially reasonable, and socially evenhanded. (Chambers, 2015). The address on jobs helps the complex transaction between people, communities, and bigger socio-political settings in forming people's well-being and openings for progression.

In (Cordaid, 2016) notes that arrive and water are among the foremost imperative assets for communities, which do not as it were give a put to live and source of job, but for numerous communities, they are too specifically related to their culture and personality. It encourage shows that oil and gas or mining ventures will continuously require get to to arrive and water for case, for boring locales, mine, camps for lodging laborers and hardware as well as get to streets.

Agreeing to the 20 a long time of NAPE's natural promotion in Uganda (2016) document, arrive constitutes the most resource from which individuals or communities are able to derive their job which arrive speaks to an awfully important financial resource source of personality and culture. The archive advance states that in Uganda, numerous ventures have come about in dispossession, duplicity, infringement of human rights, and annihilation of vocations. It proceeds to note that arrive in rustic ranges comes beneath different weight since of large-scale commercial cultivating, and mineral asset extraction.

Significant prove from oil creating countries such as Nigeria, Gabon, Angola, Sudan, Chad and others in Africa clearly demonstrate that oil could be a asset of both extraordinary opportunity and danger (Ericson, 2014). It is an opportunity since it brings gigantic income for the country's economic development demonstrated by social administrations such as schools, healing centers and streets. On the other hand, it may be a issue when the income is abused subsequently causing clashes. Uganda is one of the African nations that have been plagued with degenerate officers;

however concurring to Ericson shows that nations whose officers are degenerate cannot get anticipated benefits from oil and gas investigation. This is often due to the fact that multinational companies which might have driven to advancement gotten to be wiped out to serve the interest of the business entrepreneurs so grassroots individuals stay destitute.

Ofuoku et al (Ofuoku, 2014) examined the social affect of oil generation on smallholder agriculturists in oil-producing communities of the Central zone of Delta State, Nigeria. In any case, they were or maybe curious about natural issues experienced within the communities. Utilizing information collected from a test of 120 respondents with the utilize of surveys, they identified soil disintegration, commotion contamination, bush burning, land degradation/pollution, water contamination, discuss contamination, enormous deforestation and corrosive rain as the major natural issues experienced within the ponder range.

Thinks about conducted from West African nations by (Olaniyi, 2011) appear that one of the social-economic impacts of oil investigation to the adjacent communities are on cultural practices, particularly ways in which social hones are rendered risky within the face of changes coming about from the revelation of oil. For case, Jike (2010) found that most men in Mali and Ghana did not wish the intercut between nonnatives and the African ladies. Be that as it may, the African ladies from both nations found sexual intercut with the company laborers lucrative because African men may not give such sum of cash.

Other than, it was found out that oil and gas exploration lead to the pulverization of structures that once given jobs for ladies in oil- creating communities, which puts an undue burden on ladies in these communities constraining them to turn to commercial sex.

2.3 Gap of the literature

In (Plumptre, 2016) report “Documentation of existing and potential oil/geothermal ventures, mapping their likely unfavorable negative impacts on the biodiversity preservation and community jobs within the More prominent Virunga Landscape” centers on Species likely to be influenced by oil/gas and geothermal exercises which is does not show the potential impact on well evolved creatures and their living spaces. The same consider fair archives and maps the existing and potential oil ventures but does not measure the degree of the impacts.

In (Plumptre A. J., 2015) he highlights issues and records the potential impacts of investigation on species, destinations and territories as per perception and where conceivable utilize quantitative representation to highlight the size of the problem which may be a bit common and ignores creature territories. Within the same report he highlights potential and resultant impacts of endorsing the advancement of the golf course in Chobe division which isn't sufficient to show the impacts of oil and gas investigation on creatures and their living spaces. The consider is wide covering the full Albertine Fracture hence giving less center to Murchison Falls National Stop.

Andren (1994) surveyed the impacts of environment fracture centering on fowls and well evolved creatures in scenes with diverse extents of reasonable environment. The consider looked at the scale of territory fracture and populace reactions to territory fracture whereas distinguishing the components affecting the plenitude and distribution of species in scenes with diverse degrees of living space fracture but the consider does not indicate the causes of well evolved creature living space fracture in connection to the oil industry.

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CHAPTER THREE

RESEARCH METHODOLOGY

3.0 Introduction

This chapter contained the research design, sampling design and type, different methods that the researcher collected data from various sources and also to interpret the data so as to come up with a conclusion on this topic of impact of exploration on people's livelihoods in Hoima District.

3.1 The Research Design

The researcher adopted a *descriptive research design*. This is done to identify and obtain information on the characteristics of a particular issue (Kothari, 2008). A descriptive design is applied on grounds that the researcher wants to describe and understand the current nature and extent of impact of exploration on people's livelihoods under study. The plan was regarded suitable since the most intrigued of the analyst investigated the reasonable relationship and portraying how the components bolster the two factors that are beneath examination. The consider utilized expressive since it permits the analyst to find designs in respondents considering and portray issues from their possess point of see.

The quantitative approach was advocated on grounds that a few impacts of oil and gas investigation are quantifiable and displayed measurably whereas subjective information is since the ponder collected respondents' sees, conclusions and comments whose elucidation and introduction suits bests utilizing stories. Subjective information included examination of information in shape of explanations as gotten from key witnesses whereas quantitative information included the use of measurable technics to gather, analyze and communicate think about discoveries in shape of frequencies and rates. This permitted for triangulation of comes about, which was upgraded the legitimacy, and unwavering quality of the study.

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3.3 Study Population

The study considered Hoima District since it has a number of PAPs of oil and gas activities. The EACOP project affects approximately 13,161 PAPs along its route and Buseruka Sub-County, the refinery project has identified 2,670 PAPs.

3.3.1 Target Population

This study comprised of oil and gas company workers, District officials and local leaders, as well household heads in Hoima District. All house households in Buseruka Sub-County were form the main target population since exploration activities in the area affect their livelihoods either positively and/ or negatively. The other target respondents involved in making decisions on development activities in the area including oil and gas exploration. Generally, 25 household heads, 5 oil and gas company workers, and 5 local leaders.

3.4 Sample Size

The sample involved 33 respondents and determined by Slovene's formula. The sample was selected by the researcher to be the representative of the entire population. This particular sample size was selected because it was easier to manage and it was enough to generate findings as well as to generalize the findings to a bigger population. The table for sample determination was adopted because it presents a sample size in line with a certain degree of reliability and population size based on confidence level of 95% and 5% margin of error.

The sample size was determined using Slovene's formula as expressed below;

$$\boldsymbol{n = \frac{35}{1 + N\,(0.05)2}}$$

$$\frac{\mathbf{35}}{\mathbf{1 + 35(0.0025)}}$$

$$\frac{\mathbf{35}}{\mathbf{1 + 0.0875}}$$

$$\frac{\mathbf{35}}{\mathbf{1.0875}}$$

33 Respondents

Table 1: Sample size distribution for respondents/key informants

Category	Target Population	Sample Size	Sampling Techniques
Local Leaders	5	4	Purposive sampling
Oil & Gas company workers	5	5	Purposive sampling
Household Heads	25	25	Simple Random
Total	35	**33**	

Source: *Primary Data, 2025*

3.6 Sampling Techniques

Sampling Simple random sampling was used to select household heads in each of the villages in the four parishes of Hoima District. The category of respondents was targeted because they are the inhabitants of Buseruka Sub-County at the grass root level who have faced the effects of oil and gas. The sampling technique was preferred because of being cost effective in terms of money and time saving in terms of collecting data, high level of flexibility, accurate and free of bias.

Purposive sampling was used to select the 10 oil and gas sector workers, 4 District officials and 5 local leaders using purposive sampling. The targeted oil and gas sector workers included the human resources officer, field supervisors and exploration sites engineers. Whereas the District officials targeted included, the district environmental officer, District Agriculture officer, District fisheries officer, District planner and the district natural resources officer. These were considered knowledgeable in oil and gas exploration activities and how the activities have affected people's livelihoods in Hoima District.

3.7 Data Collection Methods

Data was collected from both primary and secondary sources. Primary data was collected from households in Buseruka Sub-County officials in natural resources management and planning offices, local leaders (local council/opinion leaders). To these, questionnaires were presented and interviews were conducted.

In addition, direct observation and photography of the exploration activities, livelihood activities and infrastructural developments in the study area was undertaken. Secondary data was collected from review of existing documents in line with the objectives of the study. Key documents were reviewed including oil and gas sector policies and sector performance reports available in online repositories, Hoima public library, Buseruka Sub-County archives and newspapers. It was also involve reviewing recent Journals publications and oil sector bulletins.

3.8 Data collection instruments

3.8.1 Questionnaire

The questionnaire was used to collect both quantitative and qualitative data from household heads on the oil and gas exploration activities taking place in their areas, the effect of oil and gas exploration activities on their livelihoods and the mitigations measures being put in place in Buseruka Sub-County. The questionnaire was non-structured with mainly pen-ended questions requiring respondents to give responses by writing short notes (*Appendix II*).

The open-ended things within the questionnaires empowered respondents to precise their conclusions unreservedly and in detail almost the subject beneath think about without biasing them with pre-determined answers by the analyst. Be that as it may, a few close-ended survey things were too utilized since of the ease with which they can be coded hence encouraging simple measurable investigations.

3.8.2 Interview guide

During the study, interviews were conducted with district officials, oil and gas sector employees and local leaders using interview guides (*Appendix III*). Interview were used to collect data on oil and gas exploration activities, their effects on people's livelihoods and the mitigation measures put in place to overcome the adverse effects.

Interview method were used in this study because it provides an opportunity to interact with the respondents who may not be in position to fill the questionnaire because of lack of time and yet they have very critical information in relation subject of investigation. Interviews helped

to create a link with data collected using questionnaire by clarifying the details that would not be offered using questionnaires.

3.9 Validity of the Instruments

3.9.1 Validity

This indicates the degree to which results obtained from the analysis of the data actually represent the phenomena under study (Mugenda & Mugenda, 2003). Data validity was tested by using the Content Valid Index (CVI). To achieve this, a copy of the questionnaire was distributed to the supervisors and field experts to rate the relevant items/questions in relation to the research objectives, the relevant questions will be then divided by the total number of items. Validity was tested as follows:

$$\text{CVI} = \frac{\text{valid Items}}{Total\ Number\ of\ Items}$$

The acceptable rate that researcher preferred is 0.5 that resulted from the division of the corrected questions out of the total questions.

3.9.2 Reliability

According to Kasomo (2006), reliability refers to how consistent a research procedure or instrument is. It therefore means the measure of degree to which research instruments yields consistent results or data after repeated trials. The test re-test method was used to assess the reliability of the instruments. This involves administering the same questionnaires twice to 25 respondents in region and correlating their responses independently. After administering the questionnaires, a correlation co-efficient was calculated using appropriate formula to establish the relationship between the two set of scores. Spearman's Brown Prophecy formula was applied as shown below:

Reliability of the entire test = (Reliability of 0.5 test) (r)

1+ (Reliability of 0.5 test) (r)

Where r, is Coefficient of correlation

The mean of the reliability is established at 0.79 therefore the internal consistency (Reliability) of the instrument is confirmed. A coefficient of 0.7 and above would mean that the research instruments are reliable hence a display consistence in the research finding. The reliability test produces a coefficient of correlation of 0.79, this meant that the data collection instruments was reliable enough to give consistent findings.

3.10 Data Analysis

3.10.1 Quantitative data analysis

Data collected using questionnaires was coded and analyses using statistical techniques. With the help of a computer program, Statistical Packages for Social Scientists (SPSS) version 23.0. Data coding involved transformation of responses into numeric data that is, 1, 2 …etc. Relative percentage enabled comparison between and among the study variables.

To characterize the dominant oil and gas exploration activities taking place in Butiaba Sub County in terms of procedures undertaken, intensity, and spatial coverage was used in SPSS. MCA is applicable where the responses obtained from the study variables are measured on a nominal scale or as categorical, like "Yes" and "No" (Johnson & Wichern, 2006) just like it was in the current study. The results were shown as percentage of variance in a tubular form and visualized on a 'scree' plot.

3.10.2 Qualitative data analysis

Information collected from the field in form of verbal response from the crucial informer were mainly qualitative in nature thus analyzed accordingly. The responses were transcribed, organized and categorized under themes objectives of the study. This identified common responses in line with the objectives of study. Qualitative data analysis involved the use of descriptions as either direct quotations or narratives of the responses from the interviews

The Spearman rank correlation co-efficient was used to test the direction and the magnitude of the relationships, this was because the researcher used ordinal scale of measurement; the 5-

Likert Scale. The findings were presented in tables and narrations. Qualitative data from the open-ended items were analyzed through content analysis; organizing based on the emerging themes.

Table 2: Mean range of five level Likert scale

Scale	Mean range	Interpretation
Strongly agree	4.20-5.00	Very high
Agree	3.40-4.19	High
Not sure	2.60-3.39	Moderate
Disagree	1.80-2.59	Low
Strongly Disagree	1.00-1.79	Very low

Adopted from Renis Likert (1932)

3.11 Ethical Considerations

The study was conducted following ethical procedures governing social research studies. An introductory letter was obtained from Uganda Christian University, introducing the researcher to the respondents as seeking assistance in conducting the survey. Consent was sought from respondents before questionnaire is handed to them or before interviews is conducted. Attention was also given to the rules governing photography in the area of study for the observable elements of the study.

The questionnaire contained an introductory statement requesting for the respondent's cooperation in providing the required information for the study. The respondents were further assured of the confidentiality of the information provided and that the study findings are meant for academics' research purposes only. Plagiarism was avoided by acknowledging secondary information sources through referencing.

3.12 Limitation of the study

Our research faced limitations due to restricted access to primary data sources, hindering the depth of our analysis. However, we overcame this challenge by leveraging secondary data sources and collaborating with local institutions to gather supplementary information. Additionally, language barriers posed difficulties in communicating with certain stakeholders,

impeding data collection efforts. To address this, we solicited the help of translators and employed culturally sensitive approaches to ensure effective communication. These proactive measures enabled us to navigate the limitations and enhance the forcefulness of our research findings.

CHAPTER FOUR

DATA ANALYSIS, PRESENTATION, INTERPRETATION AND DISCUSSIONS

4.0 Introduction

This chapter analyzes the data collected from the respondents, presents and interprets and discusses it. The chapter comprises the questionnaire response rate and objective specific themes. The chapter found out results on impact of exploration on people's livelihoods in Butiaba, Uganda. The subsections here include: Demographic information, *to find out the main exploration activities taking place in Hoima District, Uganda, and to establish the impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County and other areas of Hoima.*

4.1 Demographic Information

This section analyses, presents and interprets the findings on the respondent's age in completed years, their gender, level of education, how long they have worked for the organization.

4.1.1 Age of the respondents

The respondents were asked to state their age in completed years. The results are as shown in table

Table 3:Age of respondents

Category	*Frequency*	*Percent*
25 years	5	15.2
26-35 years	16	48.5
36-45 years	3	9.1
46-55 years	7	21.2
55 and above	2	6.1
Total	33	100.0

Source: Primary Data, 2025

The average age of the respondents was 36-45; the oldest respondent had 55 years with the youngest respondent having 25 years. Most of the respondents at 16(48.5%), were between ages 26-35 years closely followed by 7(21%) falling between 46-55 years, 3(9.1%) falling between 36-45 years, 5(15.2%) between 25 years with the least number of respondents falling between the ages 55 years at 2(6.1%).

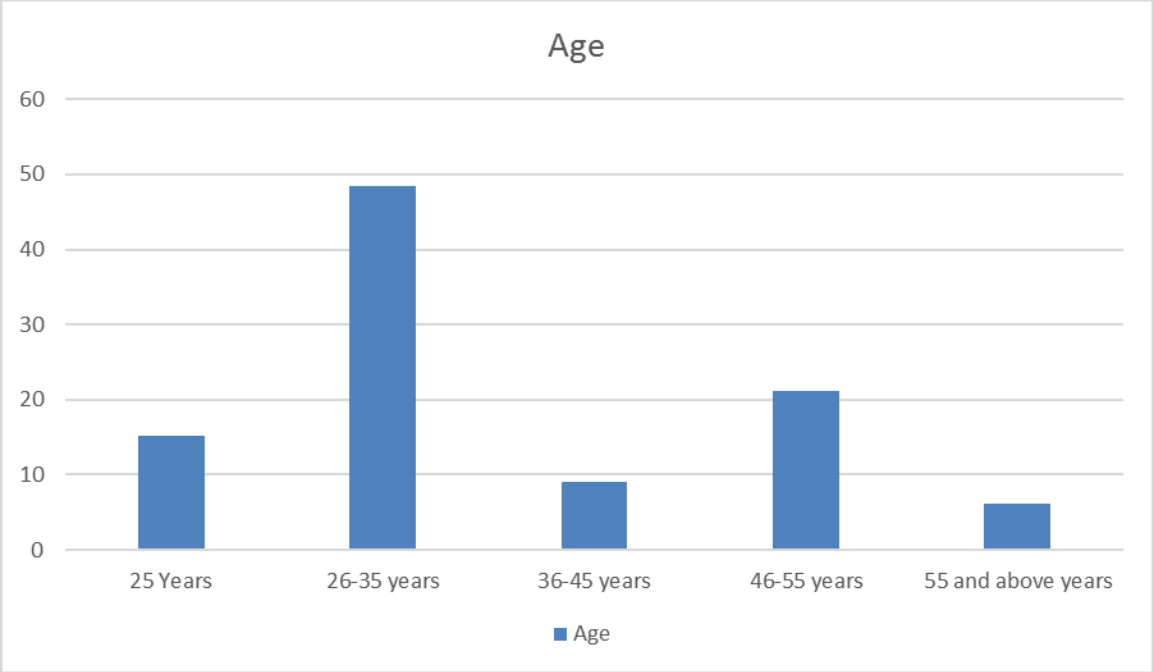

Figure 1: ***The respondent's age***

4.1.2 The respondents' gender

The respondents were asked to state their gender. The results are as shown in table

Table 4: Respondent's gender

Category	Frequency	Percent
Male	23	69.7
Female	10	30.3
Total	33	100.0

Source: *Primary Data, 2025*

The males were the most at 23(69.7%) with the females being the least at 10(30.3%).The respondents were selected randomly, this therefore implies that there were more male stakeholders than the female.

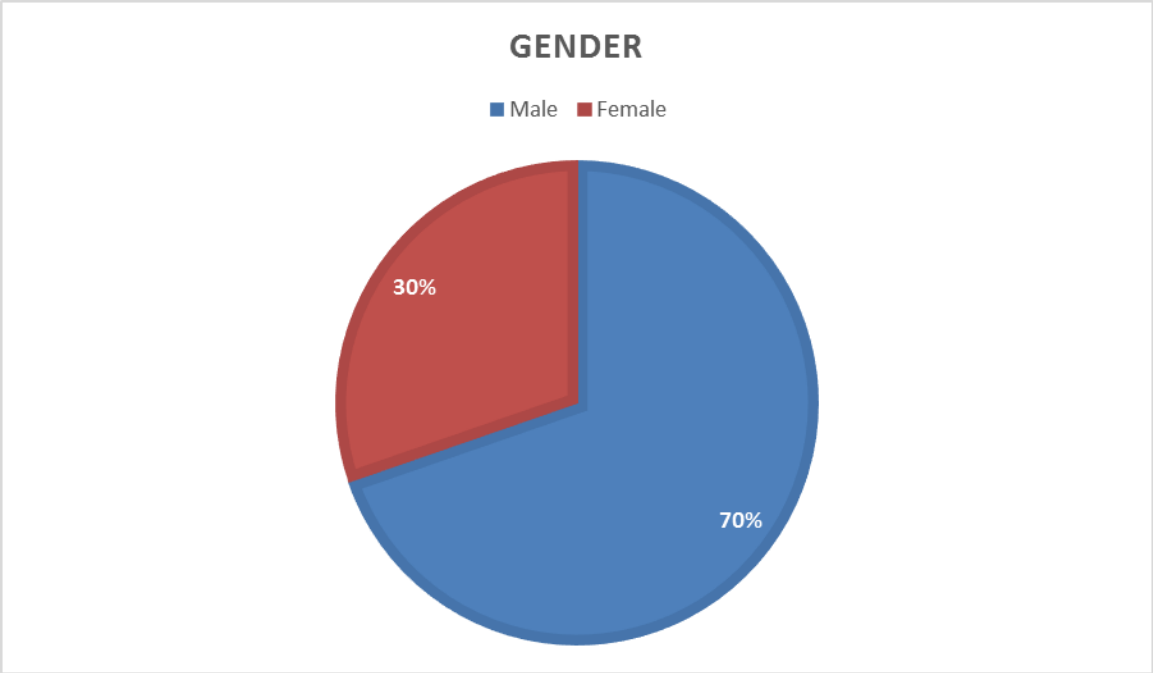

Figure 2: ***The respondent's gender***

4.1.3 Level of Education

The respondents were asked to state their level of education and the results are as shown in table

Table 5: Respondent's level of education

Category	*Frequency*	*Percent*
Diploma	9	27.3
Degree	11	33.3
Post graduate	7	21.2
Masters	6	18.2
Total	33	100.0

Source: *Primary Data, 2025*

The highest level of education for the most of the respondents was degree holders at 11(33.3%), followed by Diploma holders at 9(27.3%), post graduate at 7(21.2%) with the minority being masters holders at 6(18.2%).

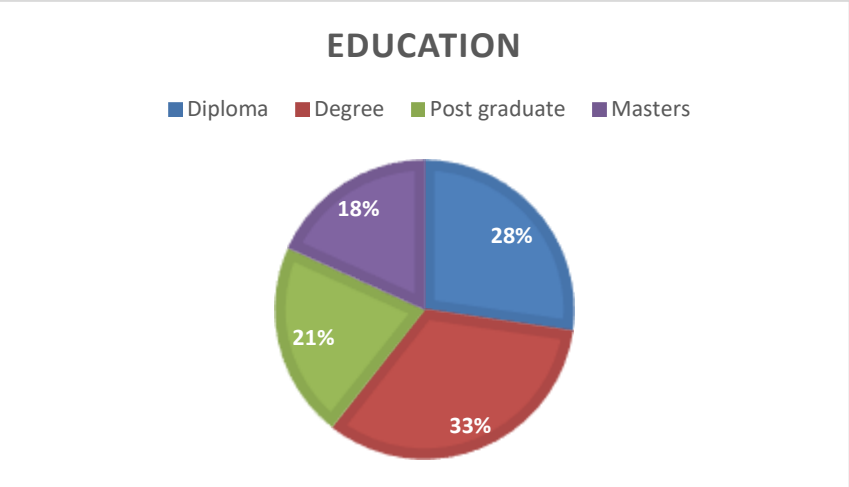

Figure 3: ***The respondents education***

4.2 The main exploration activities taking place in Buseruka Sub-County, Hoima District.

This section presents the opinions on main exploration activities taking place in Buseruka Sub-County, Hoima District.

Table 6: Descriptive statistics showing main exploration activities taking place in Buseruka Sub-County, Hoima District

	Mean	Std. Deviation
The government conducts surveying of the land	3.36	.54876
There is site clearance including the surrounding areas of communities	3.39	.70442
The government conducts mapping of the area	2.66	.98953
Government conducts land acquisition, construction and drilling for oil and gas	2.96	.88335
Average Mean	3.09	0.78

Source: ***Primary Data, 2025***

From the table above, results in the table indicates that government has conducted surveying of the land with mean 3.36 std.54 surveying is one of the oil and gas exploration activity taking place in Buseruka Sub-County, 3.39 mean indicates that there is site clearance including the surrounding areas of communities in Buseruka Sub-County, Hoima District and it is what guided for the establishment of the oil and gas plant. 2.66 mean of the respondent cited mapping of the oil fields as one of the activities oil and gas companies are involved in. In the course of finding the activities, there is land acquisition, construction and drilling activities with mean 2.69.

These results signify that oil and gas companies in Buseruka Sub-County, were more involved in surveying compared to other oil exploration activities. Apart from surveying, the respondents also identified mapping as another major exploration activity in the study area. This was followed by oil and gas sample drilling and testing followed by site clearance. Construction works and land acquisition are indicated as the least engaged-in activities by oil and gas companies.

4.3 People's livelihoods in Buseruka Sub-County, Hoima District

This section analyses, interprets, presents and discusses findings on People's livelihoods in Buseruka Sub-County, Hoima District

Table 7: Descriptive statistics showing people's livelihoods in Buseruka Sub-County, Hoima District

Category	*Mean*	*Std. Deviation*
There is crop farming conducted by the communities	3.06	1.14
There several livestock farming in the communities	3.00	1.00
Community members tend to conduct finishing while using ponds and lake albert	2.90	1.01
There is sand mining and stone quarrying	2.87	1.05
Members of the community conducts trade and commerce	2.93	1.02
Average	2.952	1.044

Source: *Primary Data, 2025*

From the table above, the data presented reflects community activities in areas like agriculture, fishing, trade, and mining within a certain region, with average responses indicating varying levels of engagement in these activities. Specifically, crop farming (mean = 3.06) and livestock farming (mean = 3.00) are relatively common, as indicated by moderate to slightly above-average responses. However, fishing activities, particularly those using ponds and Lake Albert (mean = 2.90), show a somewhat lower level of involvement compared to farming activities, though it remains a significant practice in the community. Similarly, sand mining and stone quarrying (mean = 2.87) as well as trade and commerce (mean = 2.93) are also part of the community's economic activities, though the relatively lower mean values suggest these activities may not be as widespread or predominant as farming.

The average mean of 2.952 with a standard deviation of 1.044 suggests that there is a moderate level of involvement across these activities, but also variability in how strongly these activities are perceived or practiced by the community members. This could indicate that while farming and some other economic activities are common, the extent of involvement in each of these activities may vary across individuals or subgroups within the community. The relatively high standard deviation also points to a diversity of opinions or experiences within the community on these activities.

4.4 The impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County, Hoima District.

This section analyses, presents and interprets and discusses the findings for the second objective of the study: To establish the impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County, Hoima District.

Table 8: Descriptive statistics showing the impact of oil and gas exploration activities on people's livelihoods

Category	*Mean*	*Std. Deviation*
People access to safe water for domestic use in the community	3.48	.56
There is access to health care extended to people in the community	2.90	.87
There is reduction of food crop farming	2.36	.96
There is low grazing land	3.48	.56
The place tends to decline in flora and fauna resources	3.06	.74
Within the communities, there is displacement of people	3.24	.93
Average Mean	3.08	0.77

Source: *Primary Data, 2025*

From the table above, the mean of 3.48 with a low standard deviation (0.56) indicates that the majority of respondents feel that oil and gas activities have had a positive impact on access to safe water in the community. This suggests that, despite the potential negative impacts of such projects, they may have contributed to improving the availability or quality of water sources for domestic use. The mean score of 2.90 and the higher standard deviation (0.87) reflect a more mixed perception regarding the extension of healthcare services. While healthcare may have improved for some, the variation in responses indicates that not all members of the community have experienced the same level of access or quality of healthcare due to oil and gas exploration activities.

With a mean score of 2.36 and a standard deviation of 0.96, the data suggests that oil and gas exploration activities may have led to a noticeable reduction in food crop farming. This could be due to land use changes or environmental degradation caused by exploration, making farming less viable for local communities. The mean score of 3.48 with a low standard deviation of 0.56 indicates that communities feel the loss of grazing land due to oil and gas activities. This is a significant concern as reduced grazing land can impact livestock farming and, consequently, the livelihoods of pastoralist communities. A mean score of 3.06 (with a standard deviation of 0.74) suggests that oil and gas exploration is perceived to be having a detrimental effect on local flora and fauna resources. This may include deforestation, habitat destruction, or pollution, which would disrupt ecosystems and reduce biodiversity. With a mean score of 3.24 and a standard deviation of 0.93, the data shows a significant concern about displacement. Oil and gas exploration activities may be forcing people to relocate, causing disruptions to their livelihoods and communities.

The **average mean of 3.08** with a standard deviation of **0.77** highlights that, overall, while there are some positive impacts, the oil and gas exploration activities seem to have more significant negative effects on people's livelihoods. The displacement, reduction in farming and grazing land, and environmental degradation seem to outweigh the benefits like access to safe water or healthcare. The relatively high standard deviations across many categories also suggest variability in how different individuals or communities perceive these impacts, likely due to varying proximity to oil extraction activities or differences in community resilience.

The results from interviews with key informants too did not differ so much from what was revealed by quantitative data analysis. During an interview session with the District Agriculture Officer, he had this to say,

> *Cotton production has reduced from 80% to 2% as a result of oil and gas exploration activities. Likewise, fish production has reduced from 10 tons to 3 tons per boat per month while the fish prices have increased. The cost of a kilogram of Nile perch for example, has risen from Shillings 5,000 to Shillings. 7,500.*
>
> *Respondents famous a decay in trim yields due to arrive securing for oil and gas investigation exercises, as well as soil defilement from exploration-related chemicals*

conjointly Animals proprietors expressed unsettling influences in brushing lands and water sources, driving to a decay in animals wellbeing and efficiency.

Community individuals communicated concerns over deforestation and living space misfortune coming about from arrive clearance for framework advancement related with oil and gas investigation.

CHAPTER FIVE

DISCUSSION OF RESULTS

5.0 Introduction

The chapter discussed the results in relation to the study objectives; - *to find out the main exploration activities taking place in Buseruka Sub-County, Hoima District, Uganda, and to establish the impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County, Hoima District, Uganda.*

5.1 Discussion of results

5.1.1 The main exploration activities taking place in Buseruka Sub-County, Hoima District

Results an average mean of 3.0 indicates that exploration activities taking place signify that oil and gas companies in Buseruka Sub-County, Hoima District. As part of the initial exploration process, seismic surveys are conducted to assess the geological structures and potential oil reserves. This is followed by exploratory drilling to confirm the presence and quantity of oil. In Buseruka Sub-County, seismic surveys and drilling have been key activities driving the oil industry forward. A study by **Kasozi et al. (2020)** suggests that these activities are critical in determining the commercial viability of Uganda's oil reserves and establishing the required infrastructure (Kasozi et al., 2020). The seismic activities, though less invasive, can cause environmental disturbances, while drilling activities are more directly felt by the communities through land use changes.

The construction of roads, camps, and drilling sites are critical components of oil exploration. These infrastructures are essential for the logistical support of oil extraction. **Wandera and Matovu (2021)** found that such developments often lead to increased access to local areas but can also result in significant land displacement and degradation, as large areas of land are repurposed for exploration activities (Wandera & Matovu, 2021). In Buseruka, while some local residents benefit from improved road networks and temporary employment, others experience land loss and disruptions to their livelihoods.

Environmental concerns are frequently raised about the impact of oil exploration on local

ecosystems. A study by **Mugisha et al. (2022)** indicated that while Uganda's oil exploration activities, especially in the Albertine Graben (which includes Buseruka Sub-County), are expected to drive economic growth, they also pose risks such as habitat destruction, pollution, and disruptions to water resources. The authors highlighted the importance of thorough Environmental Impact Assessments (EIAs) and the implementation of mitigation measures to protect the local environment (Mugisha et al., 2022). This underscores the concern that while oil exploration may bring economic benefits, the long-term environmental costs can affect agriculture, fishing, and water access, which are primary livelihoods for the local community.

The displacement of communities is a significant issue associated with oil exploration activities. **Ogwang (2023)** notes that many residents in the oil-rich regions of Uganda, including Buseruka, face displacement due to land acquisition by oil companies for drilling and infrastructure development. While compensation is often offered, the resettlement process and the long-term socio-economic impact on these displaced people remain a contentious issue. **Ogwang (2023)** emphasized that displaced communities often face challenges such as limited access to alternative land, loss of traditional livelihoods, and social disruption, which ultimately affect their overall well-being (Ogwang, 2023).

5.1.2 The impact of oil and gas exploration activities on people's livelihoods

The impact of oil and gas exploration activities on people's livelihoods, as reflected by the average mean of 3.08 and a standard deviation of 0.77, indicates a complex balance between positive and negative effects, with a tendency towards more significant adverse consequences for local communities. While some positive outcomes, such as improved access to infrastructure, healthcare, and water, are recognized, the broader impacts seem to disrupt traditional livelihoods, particularly those dependent on agriculture and natural resources. Studies by Mugisha et al. (2022) suggest that communities near oil exploration sites often face the loss of arable land and grazing areas due to land acquisition for drilling and infrastructure development. This land loss diminishes the agricultural productivity of local residents, further exacerbating food insecurity. Moreover, Kasozi et al. (2020) found that while oil companies may offer short-term employment opportunities, these jobs are often temporary and do not provide long-term financial stability, leaving communities vulnerable to the volatility of the oil industry.

In addition to land loss, Ogwang (2023) highlights that the displacement of communities is a major issue, as local people are often relocated to make space for exploration activities. However, these resettlements are not always accompanied by adequate compensation or long-term support, which leads to further socioeconomic difficulties for displaced families. Furthermore, Wandera & Matovu (2021) argue that the environmental degradation caused by oil exploration, such as deforestation, water pollution, and habitat destruction, has far-reaching consequences for people whose livelihoods depend on natural resources, such as fishing and farming. This aligns with the findings of Mugisha et al. (2022), who also noted that ecological damage, including contamination of water sources, disrupts fishing activities, further damaging local economies.

Thus, while oil and gas exploration activities can bring certain infrastructural and economic benefits, they tend to undermine the long-term sustainability of local livelihoods by disrupting the natural environment and traditional economic activities. This reflects the need for more balanced and sustainable approaches to resource extraction that prioritize community welfare alongside economic development.

CHAPTER SIX

CONCLUSION AND RECOMMENDATION

6.0 Introduction

The study presented the conclusions, recommendations arrived at and contribution to body of knowledge. It also gives suggestions for further research.

6.1 Conclusion

In summary, the exploration activities undertaken in Butiaba subcounty have provided helpful insights into the region's geological composition and potential resource reserves. In spite of critical steps in understanding the affect of investigation on people's jobs in Butiaba subcounty, there stay very some roads for advance inquire about as seen underneath;

There ought to be a comprehensive examination of the dispersion of financial benefits inferred from investigation exercises, analyzing how income created from the oil and gas division is apportioned and whether it satisfactorily contributes to nearby improvement. Additionally, investigating the elements of business creation, aptitudes advancement, and nearby commerce openings coming about from investigation exercises may give bits of knowledge into the degree to which these wanders contribute to destitution lessening and socio-economic strengthening. Furthermore, examining the recognitions and encounters of marginalized bunches, such as ladies, youth, and inborn communities, in getting to and profiting from exploration-related openings may offer a more understanding of value issues and advise focused on intercessions to address incongruities and advance comprehensive advancement.

Moreover, there ought to be center on longitudinal examination, looking at the long-term socio-economic and natural results of oil and gas advancement. This think about might include observing changes in work designs, wage conveyance, and community well-being over an expanded period to evaluate the maintainability of vocations within the confront of fluctuating oil costs and showcase flow. Moreover, investigating the viability of relief measures and community improvement activities in relieving negative impacts and improving strength seem give profitable bits of knowledge for future arrangement mediations and industry hone.

The study also elucidates how these activities have brought both opportunities and challenges to the community, influencing their socio-economic landscape. While oil and gas ventures have provided employment and economic growth, they have also disrupted traditional livelihoods, heightened environmental concerns, and posed socio-cultural changes. This comprehensive understanding underscores the necessity for balanced and sustainable development strategies that prioritize the well-being of local residents while harnessing the benefits of oil and gas extraction in Butiaba Subcounty

6.2 Recommendations

Based on our study, it is suggested to prioritize the establishment of robust regulatory frameworks and monitoring mechanisms to ensure environmental sustainability and mitigate potential adverse impacts. This entails strengthening oversight mechanisms to enforce compliance with environmental regulations and best practices, including rigorous environmental impact assessments (EIAs) throughout the exploration process. Moreover, fostering proactive engagement and consultation with local communities is crucial to address concerns. Furthermore, investing in capacity-building initiatives for local stakeholders, including training programs and knowledge transfer, can enhance their participation and empower them to actively engage in decision-making processes related to exploration activities on the ecosystem and livelihoods of local residents.

Ultimately it is also authoritative to implement a holistic approach towards mitigating adverse effects and maximizing benefits. This entails fostering community engagement and participation in decision-making processes concerning oil and gas projects, ensuring transparent communication channels between stakeholders and the industry. Furthermore, robust regulatory frameworks must be enforced to safeguard environmental integrity and protect the socio-cultural fabric of the community. By prioritizing sustainability, inclusivity, and resilience, Butiaba Subcounty can navigate the challenges posed by oil and gas activities while harnessing their potential for long-term socio-economic development.

6.3 Area for Further Research

In spite of critical steps in understanding the affect of investigation on people's jobs in Butiaba subcounty, there stay very some roads for advance inquire about as seen underneath;

There ought to be a comprehensive examination of the dispersion of financial benefits inferred from investigation exercises, analyzing how income created from the oil and gas division is apportioned and whether it satisfactorily contributes to nearby improvement. Additionally, investigating the elements of business creation, aptitudes advancement, and nearby commerce openings coming about from investigation exercises may give bits of knowledge into the degree to which these wanders contribute to destitution lessening and socio-economic strengthening. Furthermore, examining the recognitions and encounters of marginalized bunches, such as ladies, youth, and inborn communities, in getting to and profiting from exploration-related openings may offer a more understanding of value issues and advise focused on intercessions to address incongruities and advance comprehensive advancement.

Moreover, there ought to be center on longitudinal examination, looking at the long-term socio-economic and natural results of oil and gas advancement. This think about might include observing changes in work designs, wage conveyance, and community well-being over an expanded period to evaluate the maintainability of vocations within the confront of fluctuating oil costs and showcase flow. Moreover, investigating the viability of relief measures and community improvement activities in relieving negative impacts and improving strength seem give profitable bits of knowledge for future arrangement mediations and industry hone.

REFERENCES

Ablo, A. D. (2015). Local content and participation in Ghana's oil and gas industry: Can enterprise development make a difference? . *The Extractive Industries and Society*, 2(2), 320- 327.

Adam Smith, C. (2001). *Smith's theories as part of the general body of thought in the period of the Enlightenment.* Cambridge .

Batool, S. &. (2016). Wildlife in the perspective of environmental degradation: A review. *Journal of Entomology and Zoology Studies*, 4(5), 508-511.

Byakagaba, P. M. (2019). The socio-economic and environmental implications of oil and gas exploration: Perspectives at the micro level in the Albertine region of Uganda. *The Extractive Industries and Society*, 6(2), 358-366.

Cordaid. (2016). Informing Local Communities, Civil Society and Local Government about Oil & Gas: A Practical Guide on Technical Aspects. *Retrieved from: https://www.cordaid.org/en/wp-content/uploads/sites/3/2016/10/161017-Cordaid-Social Aspects-Guide-fina*.

Ericson, K. (2014). A crude awakening:. *The relationship between petroleum exploration and environmental conservation in western Uganda*.

Ofuoku, A. O. (2014). Social impact assessment of crude oil pollution on small scale farmers in oil producing communities of the central agricultural zone of Delta State, Nigeria. *Asian Journal of Agriculture and Rural Development*, 4(393- 2016-23776), 233-241.

OIIE&PF. (1997). Oil Industry International Exploration, & Production Forum. . *Environmental Management in Oil and Gas Exploration and Production: An Overview of Issues and Management Approaches* .

Olaniyi, R. O. (2011). Global sex trade and women trafficking in Nigeria.

Omorede, C. K. (2014). Assessment of the impact of oil and gas resource exploration on the environment of selected communities in Delta State, Nigeria. . *International Journal of Management, Economics and Social Sciences (IJMESS)*, 3(2), 79-99.

Plumptre, A. J. (2015). Biodiversity surveys of Murchison Falls Protected Area. . *Wildlife Conservation Society, Kampala, Uganda, 26.*

Plumptre, A. P. (2016). Documentation of existing and potential oil/geothermal projects, mapping their likely adverse negative effects on the biodiversity conservation and community

livelihoods in the Greater Virunga Landscape. *Unpublished report to Greater Virunga Transboundary Collaboration.*

Robbins, L. (1952). *The Theory of Economic Policy in English Classical Political Economy* . London.

Sen's, A. (2011). *"Uses and abuses of Adam Smith," History of Political Economy, vol. 43, pp. 257-271: Smith's economics and views on social institutions and justice.*

Smith, A. (1779). *"The economic theory": wealth is created via labor, and self-interest, Revolution of Industries.* London: Kirkcaldy, Scotland .

Ukoli, M. K. (2001). Environmental Factors in Management of the Oil and Gas Industry in Nigeria. *Posted in web.* .

Vokes, R. (2012). The politics of oil in Uganda. *African Affairs*, 111(443), 303-314.

APPENDICES:

APPENDIX I

INTRODUCTORY LETTER FOR THE RESPONDENTS

Dear Sir/ Madam,

Greetings!

I am a bachelor's of science of oil and gas of Uganda Christian University. Part of the requirements for the award a dissertation. My study is entitled,

"***Assessing the impact of exploration on people's livelihoods: a case study of Albertine Graben Region in Western Uganda"***

Within this context, may I request you to participate in this study by answering the questionnaires? Kindly do not leave any option unanswered. Any data you will provide shall be for academic purposes only and no information of such kind shall be disclosed to others.

Thanking you in advance for your cooperation.

Yours faithfully,

APPENDIX II:

QUESTIONNAIRE

Please tick in the appropriate box and also fill in the blank spaces provided for those questions where elaborate answers are required. You are requested to complete this questionnaire as honestly and objectively as possible. Use the space at the back of this questionnaire if you need more space for your responses.

SECTION A: SOCIO-DEMOGRAPHICS

1. Gender of the respondent

Male [ ]

Female [ ]

3. Indicate your Age group

25 years or less [ ]

26-35 years [ ]

36-45 years [ ]

46-55 years [ ]

With 55 years and above [ ]

4. Education Level

Diploma [ ]

Degree [ ]

Masters [ ]

PhD [ ]

None of the above [ ]

5. How many years have you worked in oil and gas industry?

2 – 4 years [ ]

5 - 7 years [ ]

8 - 10 years [ ]

11 and above [ ]

SECTION B: THE MAIN EXPLORATION ACTIVITIES TAKING PLACE IN BUSERUKA SUB-COUNTY, HOIMA DISTRICT.

This section analyses, presents and interprets and discusses the findings for the second objective of the study: the main exploration activities taking place in Buseruka Sub-County, Hoima District.

	Description	**Response**				
		Strongly agree	Agree	Not sure	Disagree	Strongly disagree
1	The government conducts surveying of the land					
2	There is site clearance including the surrounding areas of communities					
3	The government conducts mapping of the area					
4	Government conducts land acquisition, construction and drilling for oil and gas					

THE IMPACT OF OIL AND GAS EXPLORATION ACTIVITIES ON PEOPLE'S LIVELIHOODS IN BUSERUKA SUB-COUNTY, HOIMA DISTRICT.

This section analyses, presents and interprets and discusses the findings for the second objective of the study: impact of oil and gas exploration activities on people's livelihoods in Buseruka Sub-County, Hoima District.

a) People's livelihoods in Buseruka Sub-County, Hoima District

	Description	**Response**				
		Strongly agree	Agree	Not sure	Disagree	Strongly disagree
1	There is crop farming conducted by the communities					
2	There several livestock farming in the communities					
3	Community members tend to conduct finishing while using ponds and lake albert					
4	There is sand mining and stone quarrying					
5	Members of the community conducts trade and commerce					

b) The impact of exploration activities on people's livelihoods

	Description	**Response**				
		Strongly agree	Agree	Not sure	Disagree	Strongly disagree
1	People access to safe water for domestic use in the community					
2	There is access to health care extended to people in the community					
3	There is reduction of food crop farming					
4	There is low grazing land					
5	The place tends to decline in flora and fauna resources					
6	Within the communities, there is displacement of people					

APPENDIX III:

INTERVIEW GUIDE FOR KEY RESPONDENTS

1. Are there specific effects that you know of in the areas of crop farming, animal rearing, fishing, trade, forest resource harnessing?
2. Have the oil and gas exploration activities negatively affected the livelihood of the people in Butiaba Sub County? If yes, explain what effects are.
3. Have there been changes in the people's livelihood in Butiaba Sub County after the oil and gas exploration activities? If yes, what are the changes that have occurred?
4. What were the major sources of livelihood of the people in Buseruka Sub-County, Hoima District **before** the oil and gas exploration activities?
5. What were the major sources of livelihood of the people in Buseruka Sub-County, Hoima District **after** the oil and gas exploration activities?

Thank you for your cooperation