

## Abstract

Climate change, in relation to the world of agriculture, has harmed and continues to harm all forms of life on earth. This study is an attempt to explore ways through which an African Christian ethic of care can be cultivated to promote sustainable agriculture in the context of climate change in Tanzania. Using theories of ecological transformation and of responsibility, also based on qualitative approaches to inquiry, the study argues that, because the agricultural sector is both a contributor to, and a victim of, climate change, a comprehensive African Christian ethic of care can make a significant contribution towards addressing challenges of climate change and environmental degradation today.

In general this study has noted that irresponsible modern agricultural methods, coupled with a mechanistic and anthropocentric worldview, have considerably contributed to the current climatic variability. Furthermore, Christianity through its anthropocentric theological position has for many years nurtured an unsustainable relationship between human beings and God's created order. Due to Christianity's anthropocentric theological viewpoint, humankind has been placed above all other forms of life on earth, based also on the claim that the human being is God's image-bearer. This has been compounded by the perceived superiority of Western philosophy and Western scientific knowledge which has downplayed African philosophy that, on the basis of indigenous ecological knowledge, embraces some important life-affirming agricultural methods. In this regard, the study has appealed for the need for an African Christian agro-moral vision rooted in African wisdom that will enhance sustainable agriculture in the context of climate change in Tanzania.

It has been further noted in this study that the African concepts of *Ubuntu* and *Ujamaa*, as advocated by *Mwalimu* [teacher] Nyerere [the first President of the United Republic of Tanzania], contain ecological wisdom which can be harnessed in order to cultivate an African Christian ethic of care to promote truly life-affirming agricultural methods, as opposed to the irresponsible modern farming practices that have been detrimental to God's creation and that have depleted ecosystems which support life on earth. However, the study argues that the successful cultivation of an African Christian ethic of care for sustainable agriculture needs to be informed by three key factors. Firstly, climate change and agriculture must be treated as a matter of faith, calling for traditional Christian faith formation to be revisited. Secondly, climate change and agriculture must be seen as a matter of

Christian mission, hence mission and pastoral formation process has to be critically reviewed. Thirdly, climate change and agriculture should be seen as a Christian moral-theological issue which requires a reassessment of the current Christian moral formation process. The fulfilment of these factors can potentially lead to the formation of an earth-caring community.

Therefore, the study has proposed that the traditional model of Christian formation, whose objective is to impart doctrines, traditions and other worldly perspectives must be reinstated with an ecological Christian formation perspective. The purpose of ecological Christian formation must be threefold: to strengthen a responsible Christian faith, to enhance Christian responsible life and to consolidate a holistic Christian mission. This new formation process has the potential of leading to the building of an earth-caring community that recognizes faith, doctrines and traditions as fundamentals for life- enhancing agriculture and for Christian life in general. On the basis of faith, doctrines and traditions, faith communities can potentially be able to define the condition of their natural environment, to identify principles for change and to set up strategies for a transformation that seeks to enhance all forms of life on earth.

## TABLE OF CONTENTS

<b>CHAPTER ONE</b> .....	Error! Bookmark not defined.
<b>INTRODUCING THE STUDY</b> .....	Error! Bookmark not defined.
1.0 Introduction .....	<b>Error! Bookmark not defined.</b>
1.1 Background and identification of research problem ...	<b>Error! Bookmark not defined.</b>
1.1.1 Background of the study .....	<b>Error! Bookmark not defined.</b>
1.1.2 Identification of the research problem.....	<b>Error! Bookmark not defined.</b>
1.2 Rationale for the present study.....	<b>Error! Bookmark not defined.</b>
1.3 Research question and objectives.....	<b>Error! Bookmark not defined.</b>
1.4 The scope of the study.....	<b>Error! Bookmark not defined.</b>
1.5 Significance of the study.....	<b>Error! Bookmark not defined.</b>
1.6 Theoretical and methodological underpinning of the study	<b>Error! Bookmark not defined.</b>
1.7 Integrating theories into the logic of the study .....	<b>Error! Bookmark not defined.</b>
1.8 Research design and methodology.....	<b>Error! Bookmark not defined.</b>
1.8.1 Research design.....	<b>Error! Bookmark not defined.</b>
1.8.2 Research Methodology .....	<b>Error! Bookmark not defined.</b>
1.8.3 Methods of data collection.....	<b>Error! Bookmark not defined.</b>
1.8.3.1 Critical analysis of existing literature.....	<b>Error! Bookmark not defined.</b>
1.8.3.2 Archival search and document analysis .....	<b>Error! Bookmark not defined.</b>
1.8.3.3 Analytical tool deployed in this study .....	<b>Error! Bookmark not defined.</b>
1.9 Chapter summary .....	<b>Error! Bookmark not defined.</b>
<b>CHAPTER TWO</b> .....	Error! Bookmark not defined.
<b>CLIMATE CHANGE, WORLD OF AGRICULTURE AND THE CHURCH IN TANZANIA</b> .....	Error! Bookmark not defined.
2.1 Introduction .....	<b>Error! Bookmark not defined.</b>
2.2 Tanzania’s geographical location.....	<b>Error! Bookmark not defined.</b>
2.3 Tanzania’s socio-economic situation.....	<b>Error! Bookmark not defined.</b>
2.4 The nature of climatic conditions in Tanzania.....	<b>Error! Bookmark not defined.</b>
2.5 Public debate on climate change and the world of agriculture	<b>Error! Bookmark not defined.</b>
2.5.1 Various debates on climate change.....	<b>Error! Bookmark not defined.</b>
2.5.2 Climate change and the natural environment.....	<b>Error! Bookmark not defined.</b>
2.6 Trends of climate change in Tanzania.....	<b>Error! Bookmark not defined.</b>
2.7 Causes and impact of climate change in Tanzania .....	<b>Error! Bookmark not defined.</b>
2.8 Climate change and the mission of the church .....	<b>Error! Bookmark not defined.</b>
2.9 Chapter summary .....	<b>Error! Bookmark not defined.</b>

## **CHAPTER THREE FARMING METHODS IN THE WORLD OF AGRICULTURE AS VICTIM OF AND CONTRIBUTOR TO CLIMATE CHANGE**Error! Bookmark not defined.

- 3.1 Introduction ..... **Error! Bookmark not defined.**
- 3.2 Agriculture and its life sustaining role on earth ..... **Error! Bookmark not defined.**
- 3.3 Farming, environment and economy in the light of climate change **Error! Bookmark not defined.**
- 3.4 The evolvement of the agricultural sector ..... **Error! Bookmark not defined.**
- 3.5 Dominant approaches to farming ..... **Error! Bookmark not defined.**
  - 3.5.1 Traditional farming systems ..... **Error! Bookmark not defined.**
  - 3.5.2 Modern agriculture ..... **Error! Bookmark not defined.**
  - 3.5.3 The green revolution initiative ..... **Error! Bookmark not defined.**
- 3.6 Agriculture and climate change in Tanzania ..... **Error! Bookmark not defined.**
- 3.7 Farming systems during the pre-colonial and colonial periods in Tanzania **Error! Bookmark not defined.**
- 3.8 The impact of climate change in Agriculture ..... **Error! Bookmark not defined.**
  - 3.8.1 Change in biological processes ..... **Error! Bookmark not defined.**
  - 3.8.2 Change in environmental and physical processes ..... **Error! Bookmark not defined.**
  - 3.8.3 Impact on human health ..... **Error! Bookmark not defined.**
  - 3.8.4 Impact on non-agricultural livelihoods ..... **Error! Bookmark not defined.**
- 3.9 Contribution of agriculture to climate change ..... **Error! Bookmark not defined.**
- 3.10 Chapter summary ..... **Error! Bookmark not defined.**

## **CHAPTER FOUR THEOLOGY: A PROBLEM AND PROMISE FOR LIFE-GIVING AGRICULTURE IN THE CONTEXT OF CLIMATE CHANGE**?Error! Bookmark not defined.

- 4. 1 Introduction ..... **Error! Bookmark not defined.**
- 4. 2 Climate change, agriculture and theology: ..... **Error! Bookmark not defined.**
- 4. 3 Theological underpinning of climate change: An agrarian perspective **Error! Bookmark not defined.**
  - 4.3.1 Christian theology and the emergence of science and technology **Error! Bookmark not defined.**
  - 4.3.2 Anthropological theology and creation ..... **Error! Bookmark not defined.**
  - 4.3.3 Missionary influence on the anthropocentric attitude towards nature **Error! Bookmark not defined.**
  - 4.3.4 Anthropocentrism in emerging theologies ..... **Error! Bookmark not defined.**

4. 4 Tilling and keeping: A theological resource for sustainable agriculture **Error! Bookmark not defined.**

4.5 Chapter summary ..... **Error! Bookmark not defined.**

## **CHAPTER FIVE AFRICAN CHRISTIAN AGRO-MORAL-THEOLOGICAL VISION IN THE CONTEXT OF CLIMATE CHANGE .....Error! Bookmark not defined.**

5.1 Introduction ..... **Error! Bookmark not defined.**

5. 2 Discerning moral-theological implications of climate change **Error! Bookmark not defined.**

5.3 The nature of existing Christian ethics..... **Error! Bookmark not defined.**

5.4 Re-envisioning Christian ethics to enhance agro-moral vision **Error! Bookmark not defined.**

5.4 .1 Redeeming the divine vocation of caring for the earth **Error! Bookmark not defined.**

5.4.2 Re-interpreting eco-dominion theology..... **Error! Bookmark not defined.**

5.4.3 Reclaiming African cosmo-vision to enhance agro-moral vision **Error! Bookmark not defined.**

5.5 Chapter summary ..... **Error! Bookmark not defined.**

## **CHAPTER SIX AFRICAN INDIGENOUS ECOLOGICAL KNOWLEDGE TO ENHANCE AGRO-MORAL-THEOLOGICAL VISION IN RESPONSE TO CLIMATE CHANGE .....Error! Bookmark not defined.**

6.1 Introduction ..... **Error! Bookmark not defined.**

6.2 African indigenous knowledge and scientific knowledge **Error! Bookmark not defined.**

6.3 Conceptualising African indigenous knowledge ..... **Error! Bookmark not defined.**

6.4 Uncovering African indigenous ecological knowledge **Error! Bookmark not defined.**

6.5 Potentials of African ecological knowledge to enhance agro-moral vision **Error! Bookmark not defined.**

6.6 Indigenous ecological knowledge and an African Christian agro-moral vision **Error! Bookmark not defined.**

6.7 Chapter summary ..... **Error! Bookmark not defined.**

## **CHAPTER SEVEN CULTIVATING AN AFRICAN CHRISTIAN ETHIC OF CARE FOR SUSTAINABLE AGRICULTURE IN THE CONTEXT OF CLIMATE CHANGE .....Error! Bookmark not defined.**

7.1 Introduction ..... **Error! Bookmark not defined.**

7.2 Conceptualising ethics of care ..... **Error! Bookmark not defined.**

7.3 Emergence of ethics of care..... **Error! Bookmark not defined.**

7.4 Saving the soil: Responsible care through life-enhancing agriculture **Error! Bookmark not defined.**

7.5 Creation care and agriculture: A new mission frontier **Error! Bookmark not defined.**

7.6 Eco-Mission as creation care ..... **Error! Bookmark not defined.**

7.7 Cultivating African Christian ethics of care for sustainable agriculture **Error! Bookmark not defined.**

7.7.1 Sustainable agriculture: A Christian faith concern.... **Error! Bookmark not defined.**

7.7.2 Sustainable agriculture: A mission concern ..... **Error! Bookmark not defined.**

7.7.3 Sustainable agriculture as pastoral issue: An ecological therapy **Error! Bookmark not defined.**

7.7.4 Sustainable agriculture: A key to African Christian ethic of care **Error! Bookmark not defined.**

7.8. A formation of earth-caring community to enhance sustainable agriculture **Error! Bookmark not defined.**

7.8.1 Re-envisioning Christian discipleship..... **Error! Bookmark not defined.**

7.8.2 Re-envisioning African Christian moral formation.. **Error! Bookmark not defined.**

7.8.3 Cultivating an African Christian ethic of care through eco-moral formation **Error! Bookmark not defined.**

7.7 Chapter summary ..... **Error! Bookmark not defined.**

**CHAPTER EIGHT CONCLUDING OBSERVATIONS AND RECOMMENDATIONS**

..... **Error! Bookmark not defined.**

8.1 Introduction ..... **Error! Bookmark not defined.**

8.2 Postulating the thesis of the study ..... **Error! Bookmark not defined.**

8.3 The study’s contribution to the body of knowledge ... **Error! Bookmark not defined.**

8.4 Limitations and recommendations for further research **Error! Bookmark not defined.**

8.5 Conclusion..... **Error! Bookmark not defined.**

**BIBLIOGRAPHY:** ..... **Error! Bookmark not defined.**

**APPENDICES** ..... **Error! Bookmark not defined.**

Appendices 1 Ethical Clearance Letter..... **Error! Bookmark not defined.**

Appendix 2: Turnitin Report..... **Error! Bookmark not defined.**