# Inequality and Life Fulfilment

## Modernism, Traditionalism and Happiness in the Greater Gaborone Region

**Daniel Watchorn** **TU Delft Urbanism**

**Thesis P5 Presentation** **June 26, 2023**

# What is the point of a city?

Culture

Value System

Answer

Capitalism

Economic Production

# Collectivism

# Community Advancement

What if the point is

enabling people to live

fulfilling lives?

What is preventing its achievement

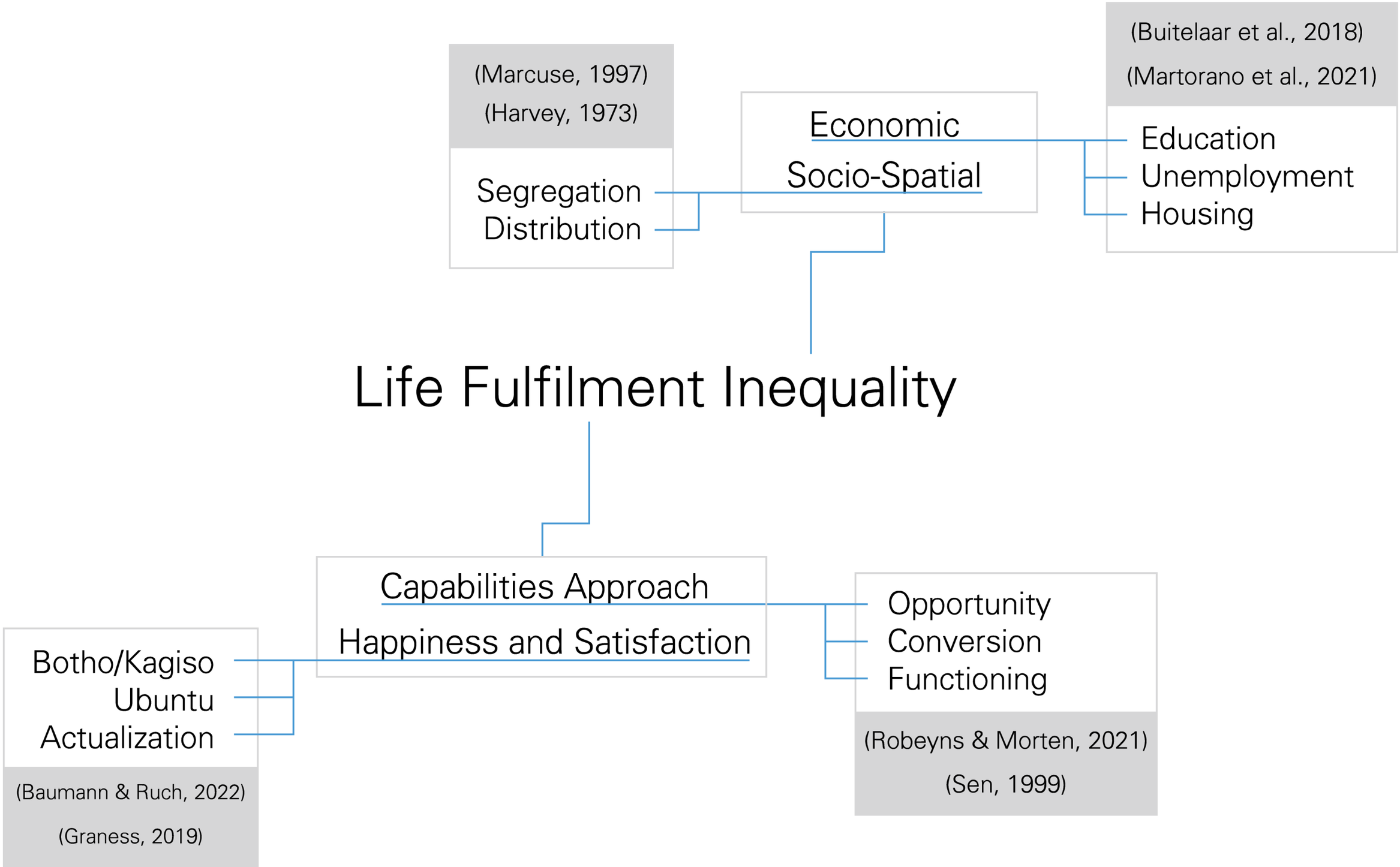
# Life Fulfilment

Understand People and Societal Underpinnings

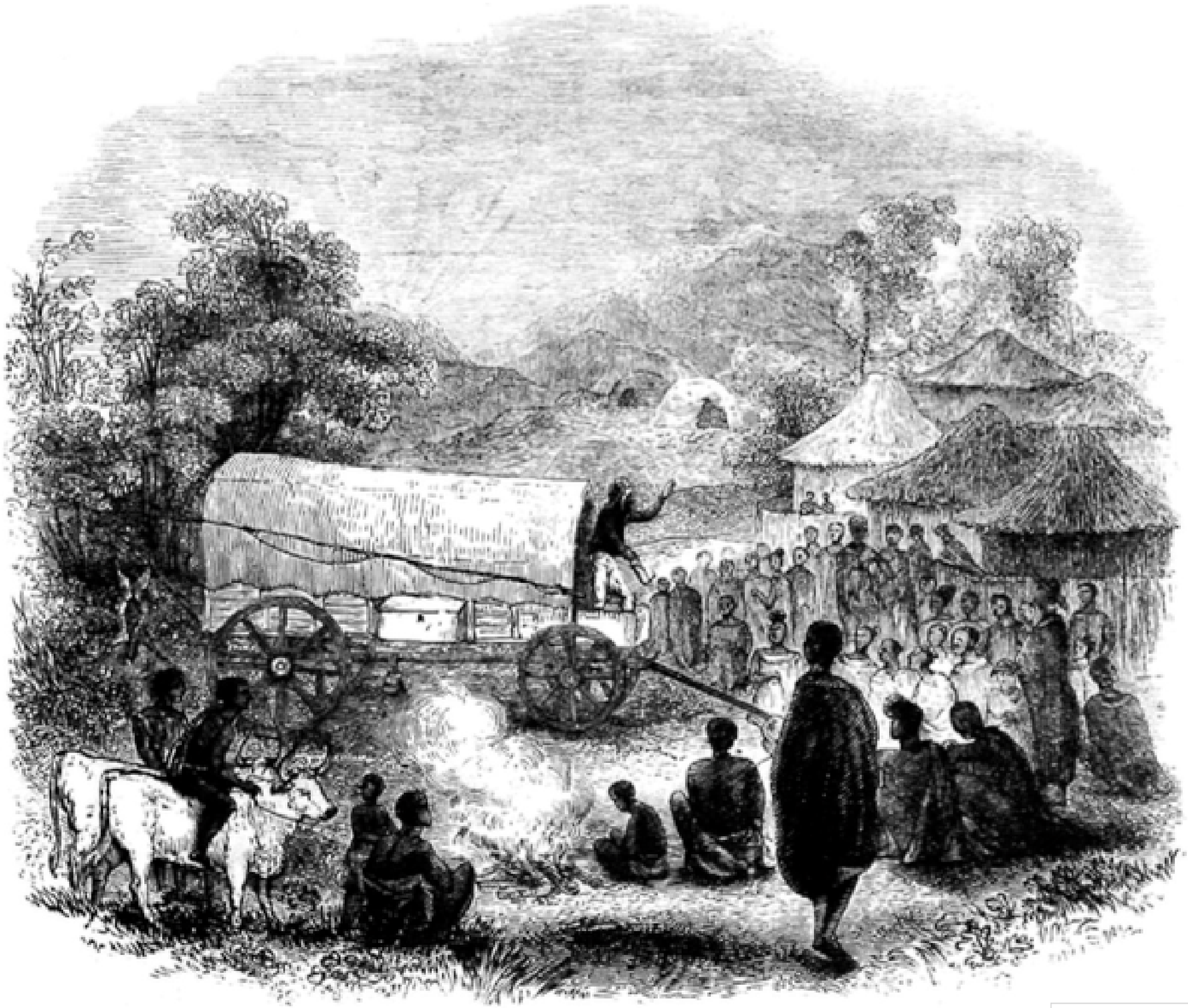
# Location

*Source: Author, from (Andreas 06, 2018)*

*Source: Author, from (GADM, 2022), (Jarvis et al., 2008), (ESRI et al., 2023)*

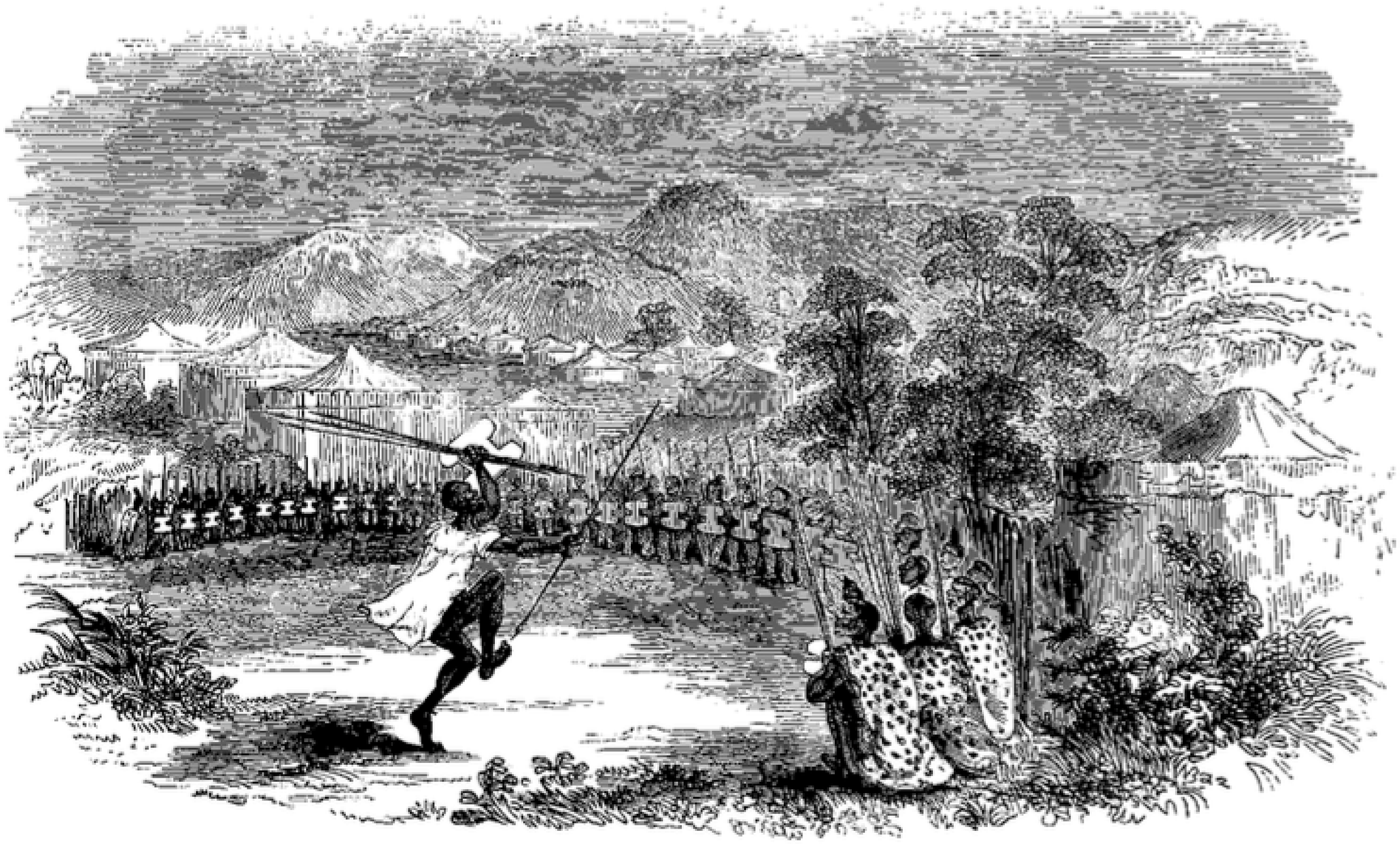

(Marcuse, 1997)
(Harvey, 1973)
Segregation
Distribution
Economic
Socio-Spatial
(Buitelaar et al., 2018)
(Martorano et al., 2021)
Education
Unemployment
Housing
Life Fulfilment Inequality
Capabilities Approach
Happiness and Satisfaction
Botho/Kagiso
Ubuntu
Actualization
(Baumann & Ruch, 2022)
(Graness, 2019)
Opportunity
Conversion
Functioning
(Robeyns & Morten, 2021)
(Sen, 1999)

# Year: 1840



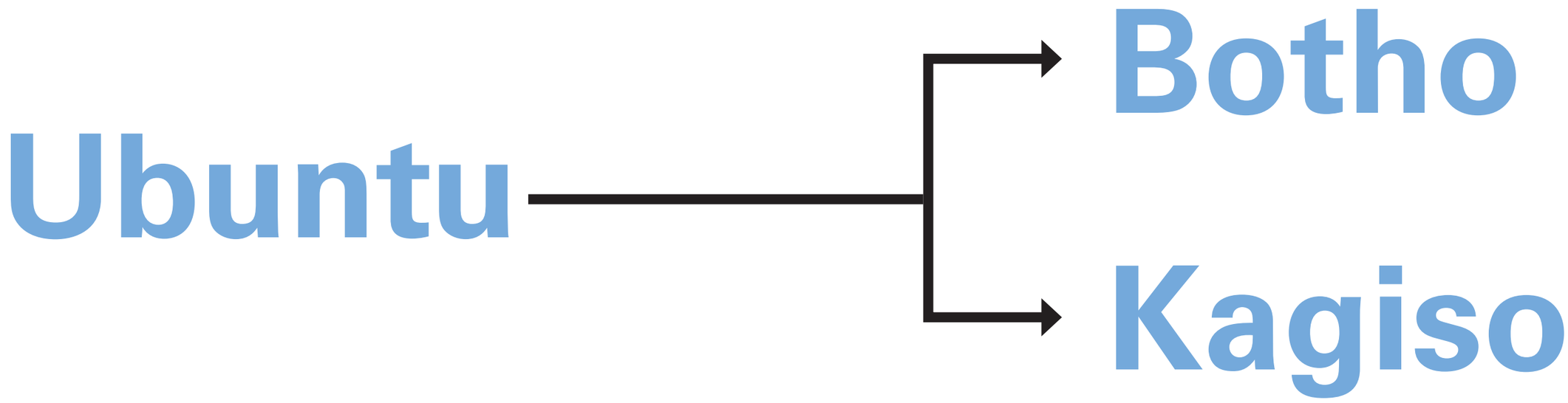
*Source: (Moffat, 1842)*

# Year: 1840



THE BECHUANA PARLIAMENT. Page 318.

*Source: (Moffat, 1842)*


Botho
Ubuntu
Kagiso

# Kagiso

## What

- Social Harmony
- The Common Good
- Rules and practices outlined in Tswana law and custom
- Fear/aversion to social tension
- Need for reconciliation between conflicting parties
- Willingness to live with dissenting opinions

## Why

- The advancement of kagiso promotes good health, good crops, plentiful rains, etc.
- The creation of social tension of social tension creates a heat (mogote) in the atmosphere, which causes bad health, droughts, poor crop yields, etc.
- The destruction of kagiso can sadden or harm the ancestors of the tribe. This sadness will be returned to living residents through some type of negative consequence

## Where

- The Tswana Merafe
- In all villages, fields and cattle posts
- At Kgotla meetings

## When

- All the time

## Who

- Kgosi is the most important steward of kagiso
- All members of the tribe must actively promote development and advancement

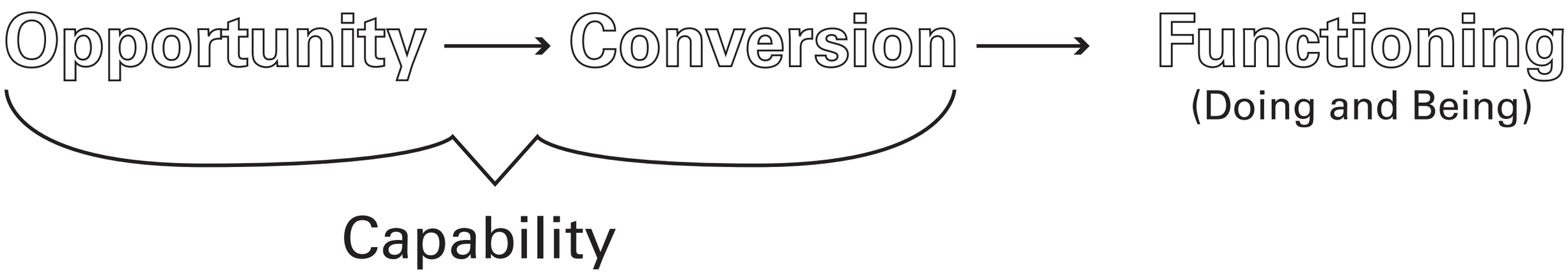
## How

- Consultation and consensus forming in decision making through kgotla meetings
- Constant holding to account from one to another
- Promotion of internal Botho from a very young age

**Kagiso ke go bona mabele - Peace gives plenty of corn**

Botho/Kagiso
Ubuntu
Actualization

Happiness and Satisfaction


Opportunity
Conversion
Functioning
(Doing and Being)
Capability

# A Societal Understanding - The Capabilities Approach

# Life Fulfilment

## Capabilities Approach

- Opportunity
- Conversion
- Functioning

(Robeyns & Morten, 2021)

(Sen, 1999)

## Happiness and Satisfaction

- Botho/Kagiso
- Ubuntu
- Actualization

(Baumann & Ruch, 2022)

(Graness, 2019)

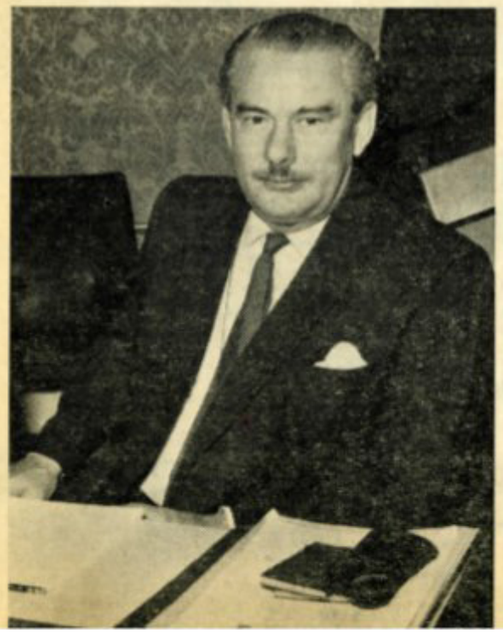
# Year: 1885

*Source: (Stanford, 1904)*

Economic

- Education
- Unemployment
- Housing

# Year: 1966



## Botswana is Born

*Above: The opening of the Independence Conference on February 14th at Marlborough House, London. Facing the Bechuanaland Representatives are Mrs. Eirene White, Parliamentary Under Secretary of State for the Colonies and Lord Longford, Secretary of State for the Colonies. On the Bechuanaland side of the table are (from the right) Sir Hugh Norman-Walker, Queen's Commissioner; Chief Bathoen II; Dr. Seretse Khama, Prime Minister of Bechuanaland; Mr. Q. K. J. Masire, Deputy Prime Minister; Mr. P. G. Matante, Leader of the Opposition; and Mr. A. G. Tilbury, Attorney-General.*

*Opposite page: The Colonial Secretary, Lord Longford, making his opening speech, while Dr. Khama listens intently.*

*Below: Chief Bathoen II and Sir Hugh Norman-Walker at the conference table.*

*Source: (Brand Botswana, 2019)*

# Diamonds!

*Source: (Google, 2023)*

Economic
- Education
- Unemployment
- Housing

# Botswana Today

GDP Per Capita (PPP Adjusted)

1) Ireland ---------- 145.196

52) Seychelles ---------- 39.663

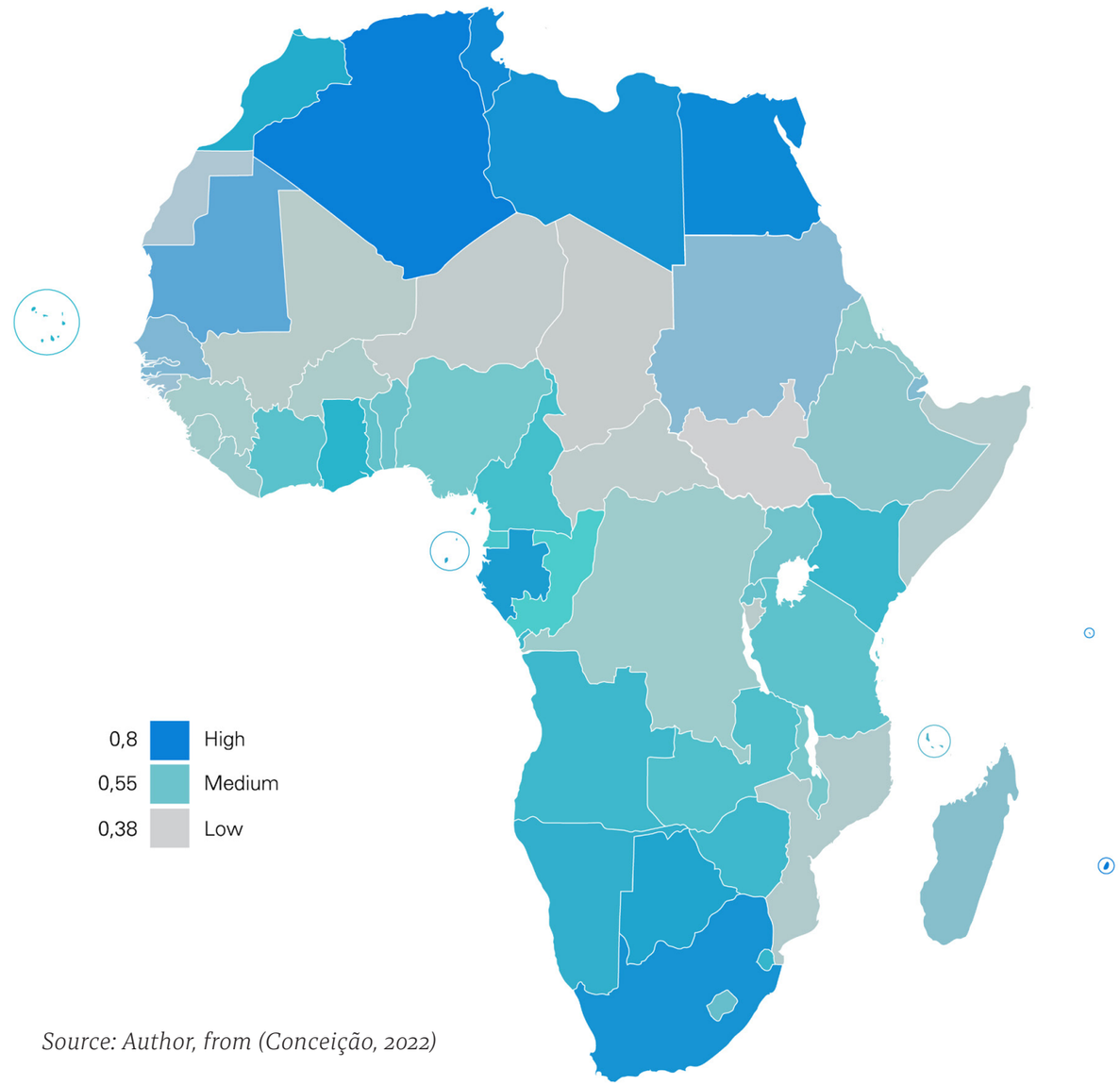
83) Botswana ---------- 19.398

175) Zimbabwe ---------- 2.627

167) South Sudan ---------- 516

*Source: (IMF, 2023)*

Human Development Index




*Source: Author, from (Conceição, 2022)*

- Economic
  - Education
  - Unemployment
  - Housing

# Botswana Today

## Inequality

1) South Africa ---------- 63,0

9) Hong Kong ---------- 53,9
10) Botswana ---------- 53,3

148) Netherlands ---------- 29,2

167) Slovakia ---------- 23,2

*Source: (Botswana - the World Factbook, n.d.)*

## Happiness

1) Finland ---------- 7,804

40) Nicaragua ---------- 6,259

105) Namibia ---------- 4,631

132) Botswana ---------- 3,435

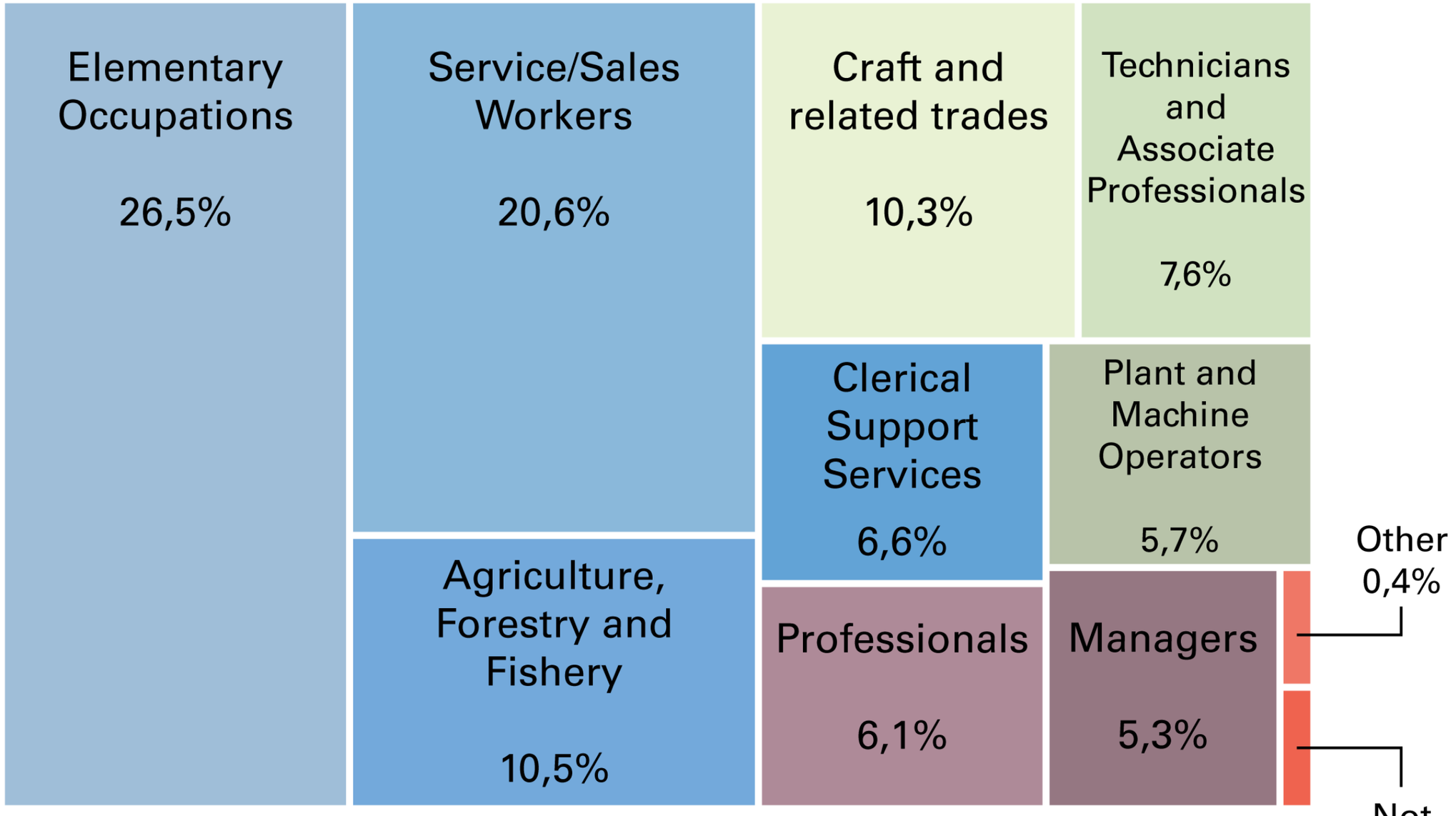
137) Afghanistan ---------- 1,859

*Source: (Helliwell et al., 2023)*

Economic
- Education
- Unemployment
- Housing

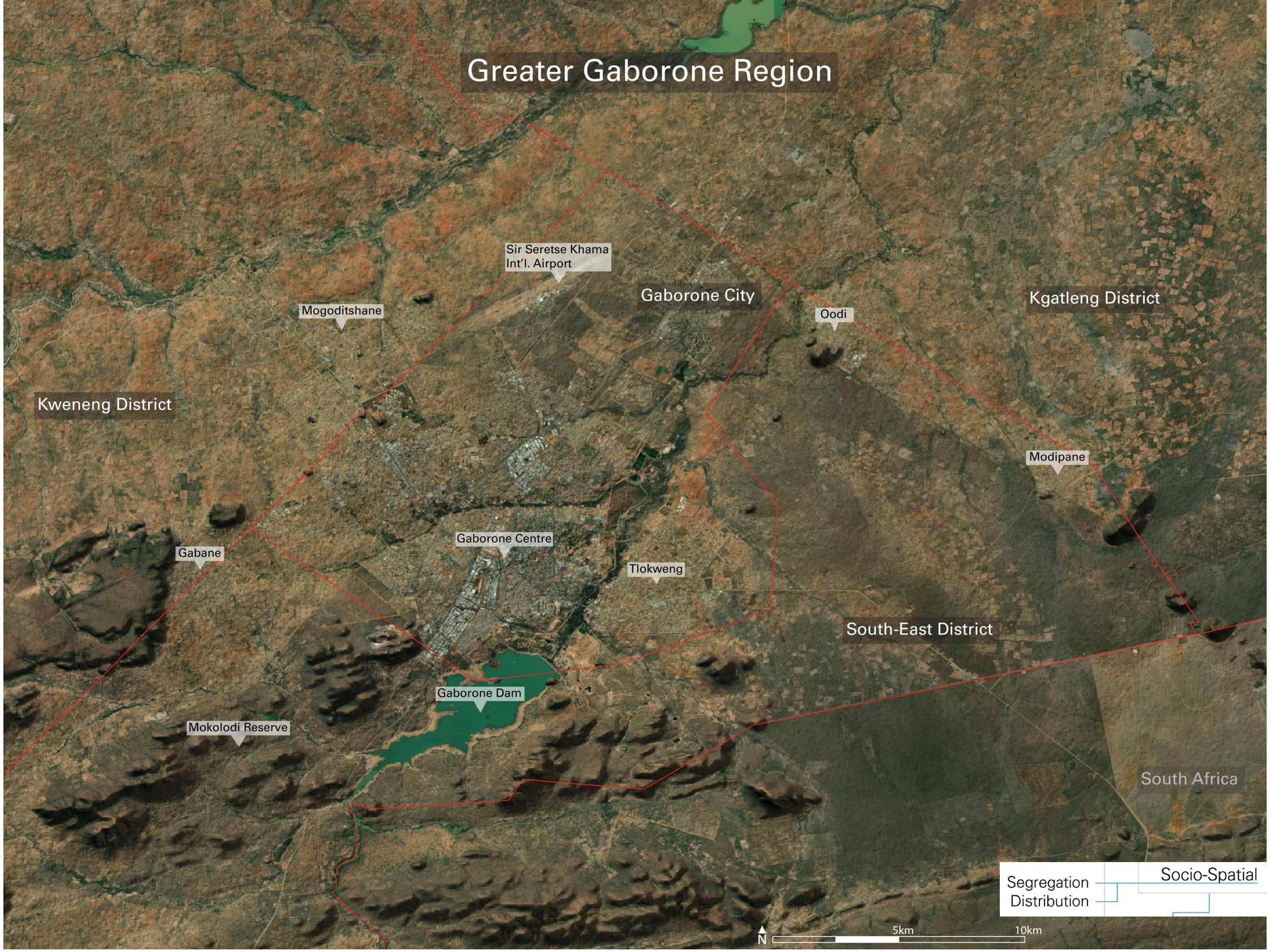
# Analysis and Description of Modern Society

Employment by Category




Economic
- Education
- Unemployment
- Housing

*Source: Author, from (Statistics Botswana, 2018)*




*Source: Author, from (GADM, 2022), (Jarvis et al., 2008), (ESRI et al., 2023)*

# Populations

Pop.:
Rate:

Gabane
20.016
2,6%

Metsimotlhabe
11.597
2,5%

Mogoditshane
88.098
4,0%

Mmopane
25.355
4,8%

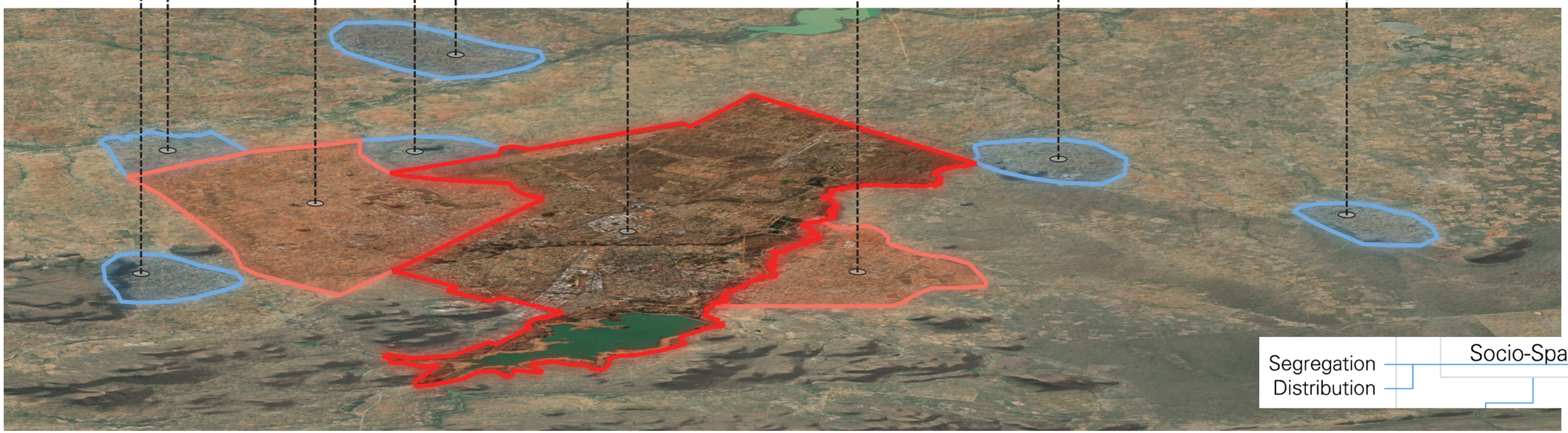
Kopong
13.820
3,8%

Gaborone
289.703
0,5%

Tlokweng
55.517
4,1%

Oodi
10.258
5,7%

Modipane
7.942
9,0%




*Source: Author, (Mguni, 2022)*

# City Centre

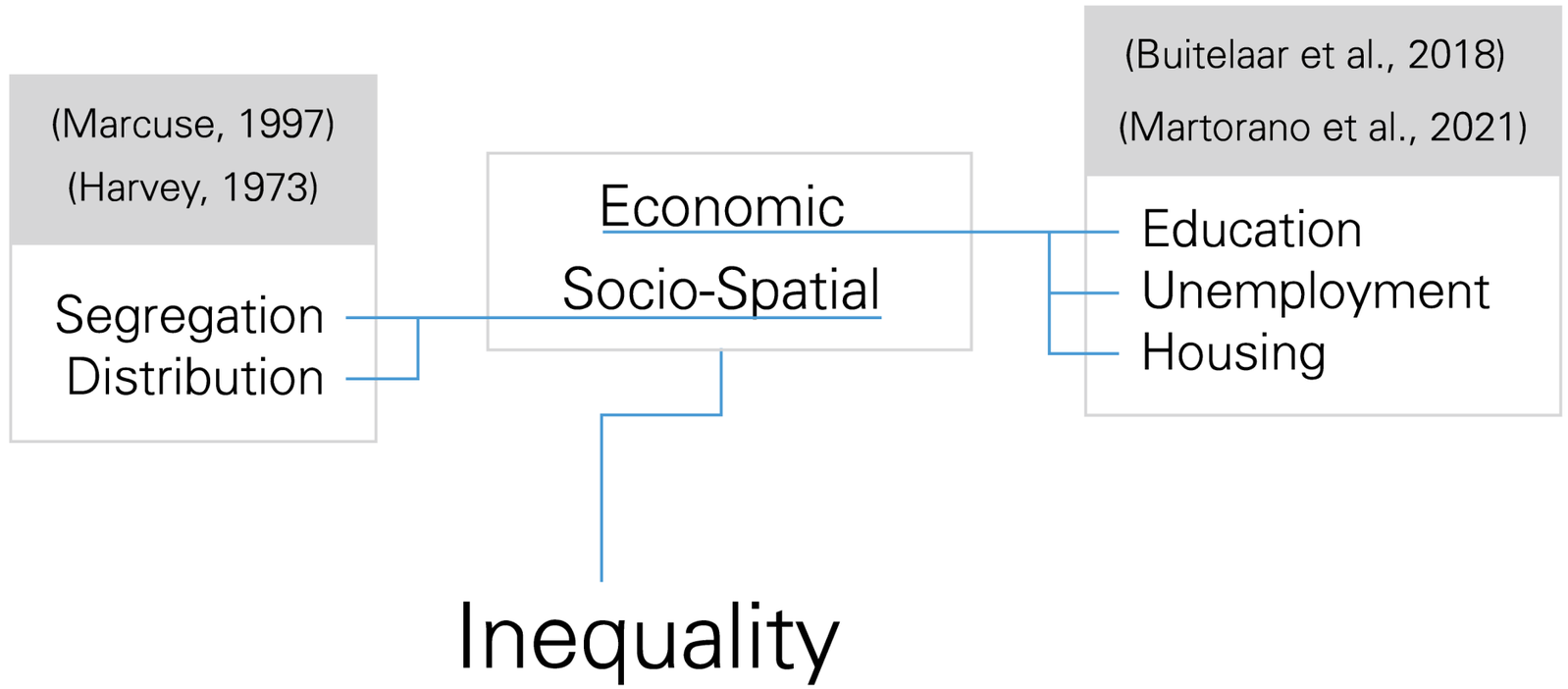
*Source: Author*

# Village

*Source: Author*

# Inequality

*Source: Author*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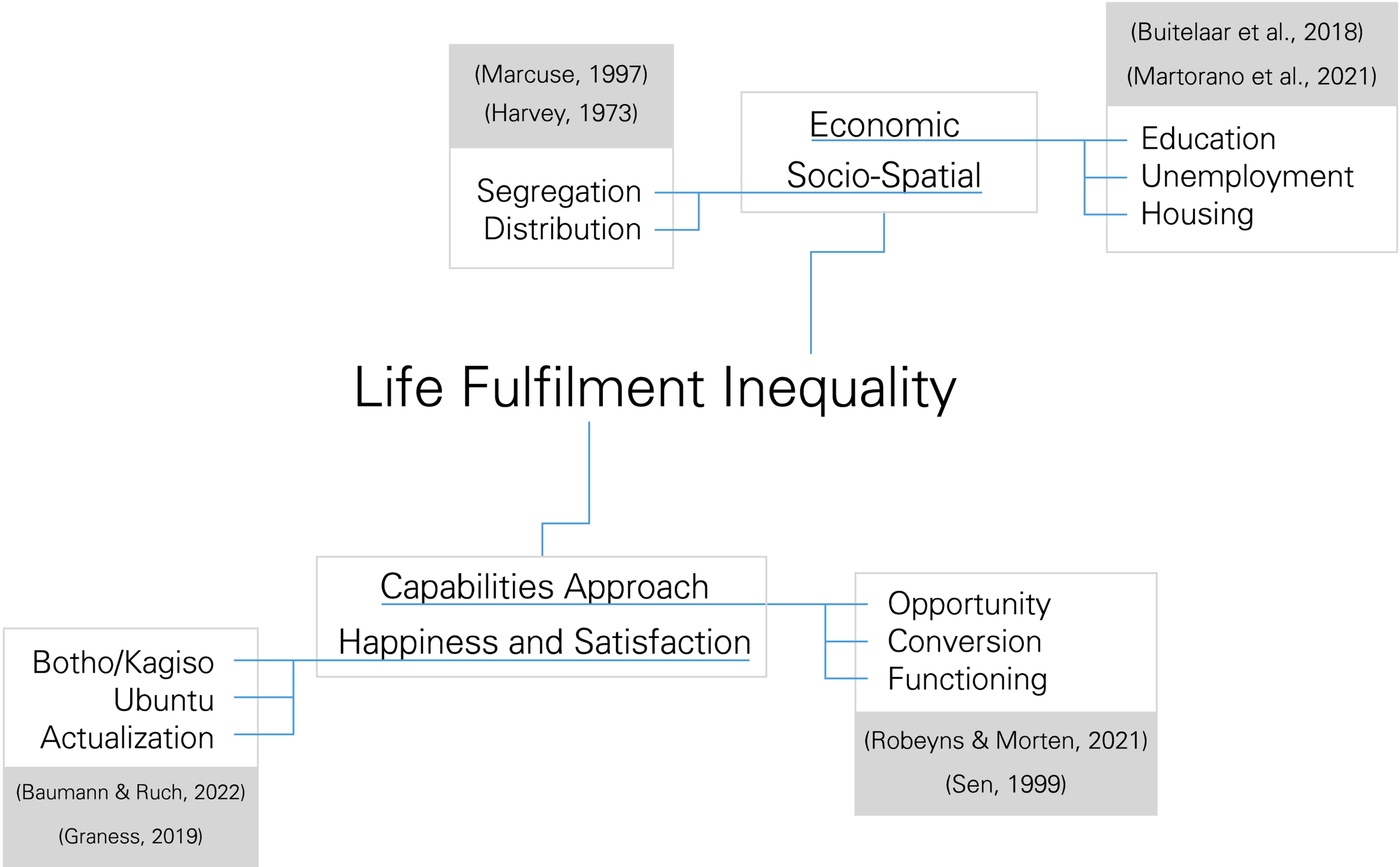
Education
Unemployment
Housing
Inequality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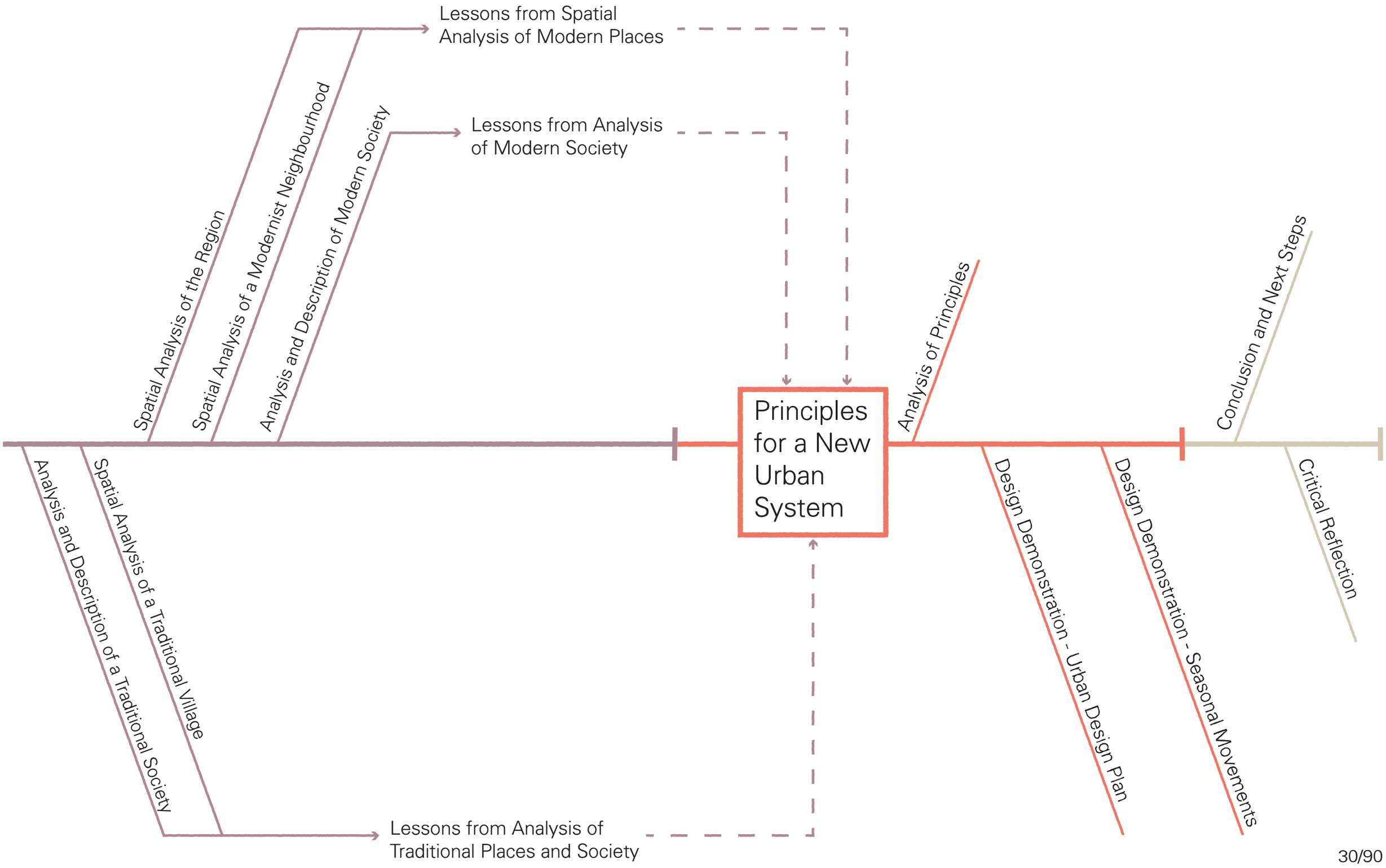
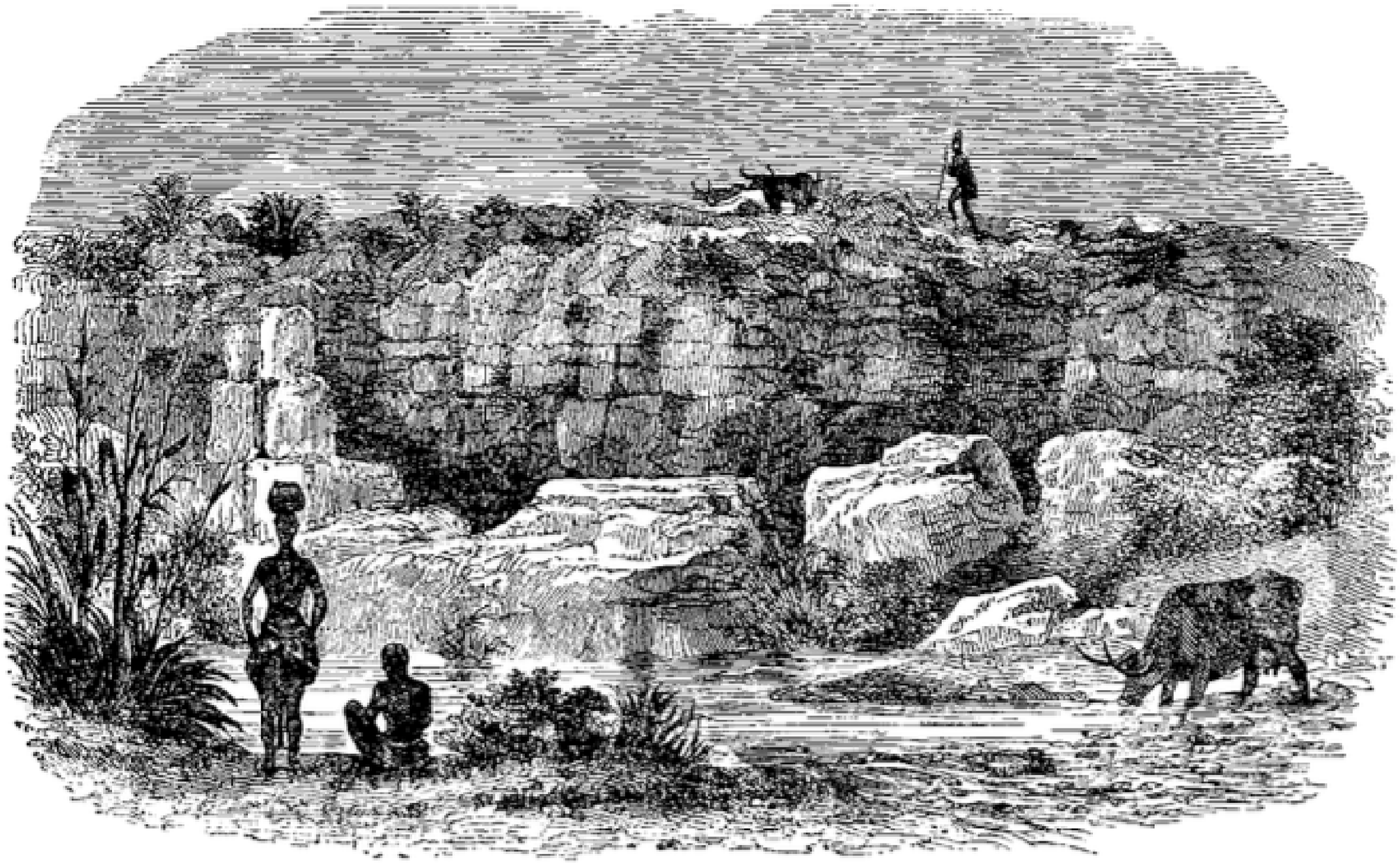
## Research Question

How can **urban design** and **planning** be leveraged as tools to create a **new spatial development paradigm** that reduces **life fulfilment inequality** in the Gaborone region?

# Structure of the Project

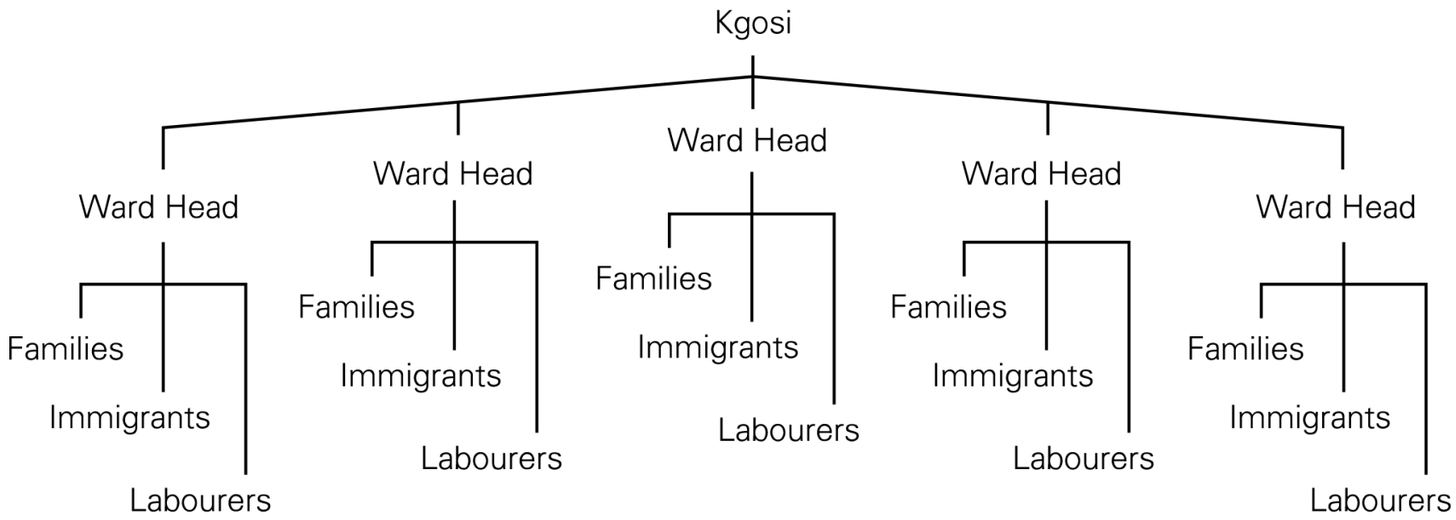


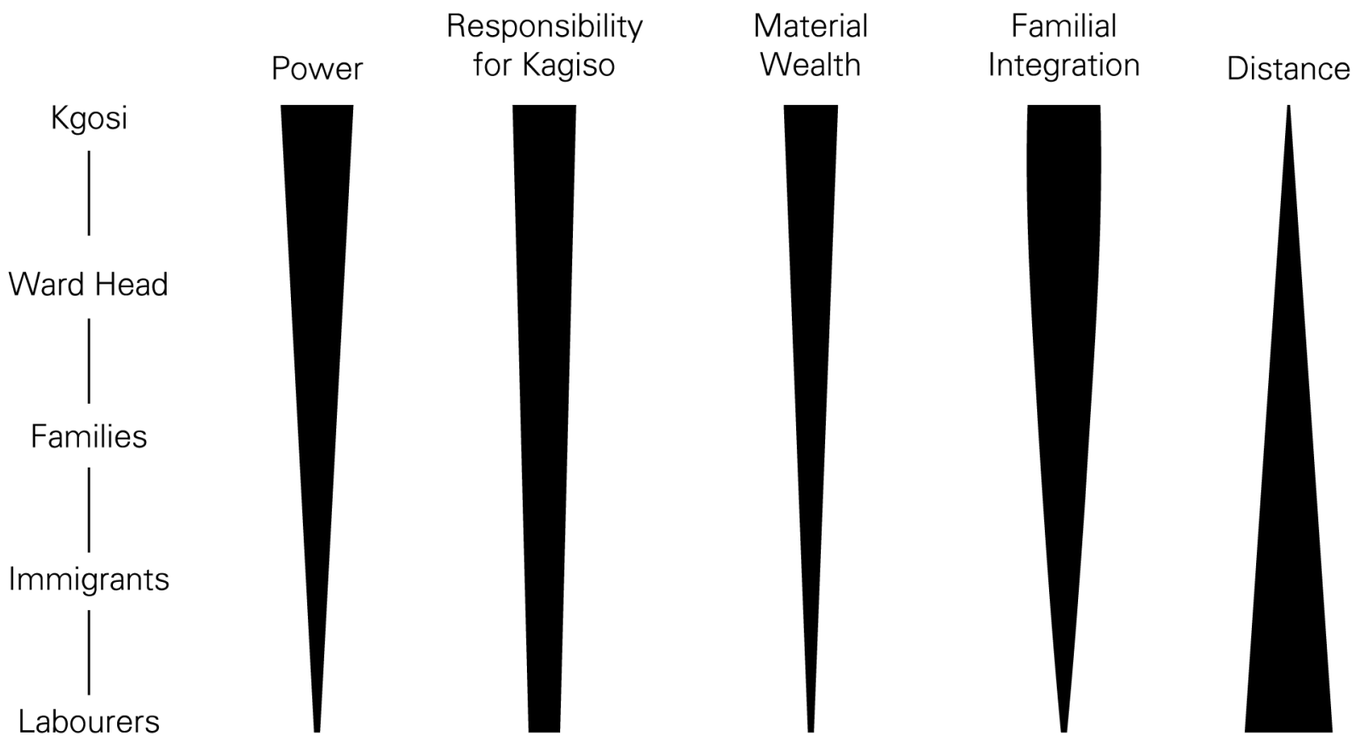
# Traditional Society



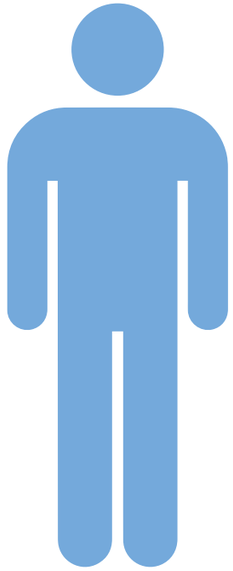
*Source: (Moffat, 1842)*

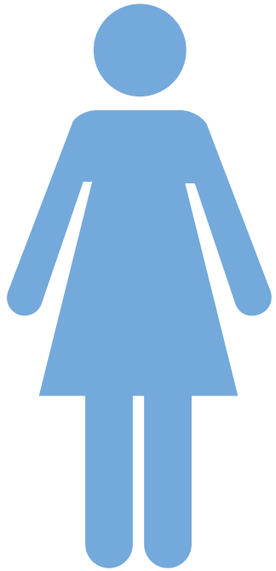
# Social Hierarchies

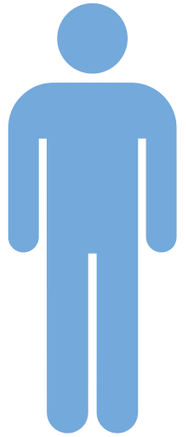


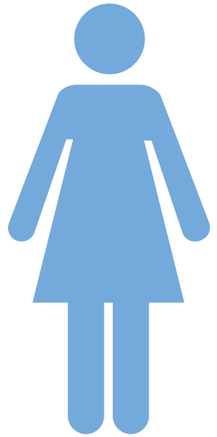



# Expected Responsibilities









| Married Men | Married Women | Boys | Girls |
|---|---|---|---|
| ◦ Attend and contribute to Kgotla meetings<br>◦ Advance social standing of the family<br>◦ Promote kagiso of the tribe<br>◦ Learn Tswana laws and customs<br>◦ Advise to-be-married boys<br>◦ Weigh in on societal issues<br>◦ Negotiate dowry payments | ◦ Manage the Lolwapa<br>◦ Manage agricultural needs of the family<br>◦ Promote kagiso of the tribe<br>◦ Advise to-be-married girls<br>◦ Household chores and family caretaking | ◦ Manage the cattle post<br>◦ Assist the mother with agriculture and other household chores<br>◦ Promote kagiso of the tribe<br>◦ Find appropriate suitor for marriage<br>◦ Learn and apply the principles of Botho | ◦ Assist the mother with agriculture and other household chores<br>◦ Promote kagiso of the tribe<br>◦ Find appropriate suitor for marriage<br>◦ Learn and apply the principles of Botho |

# Regional Layout

~0,8-1,2 ha

Royal Village

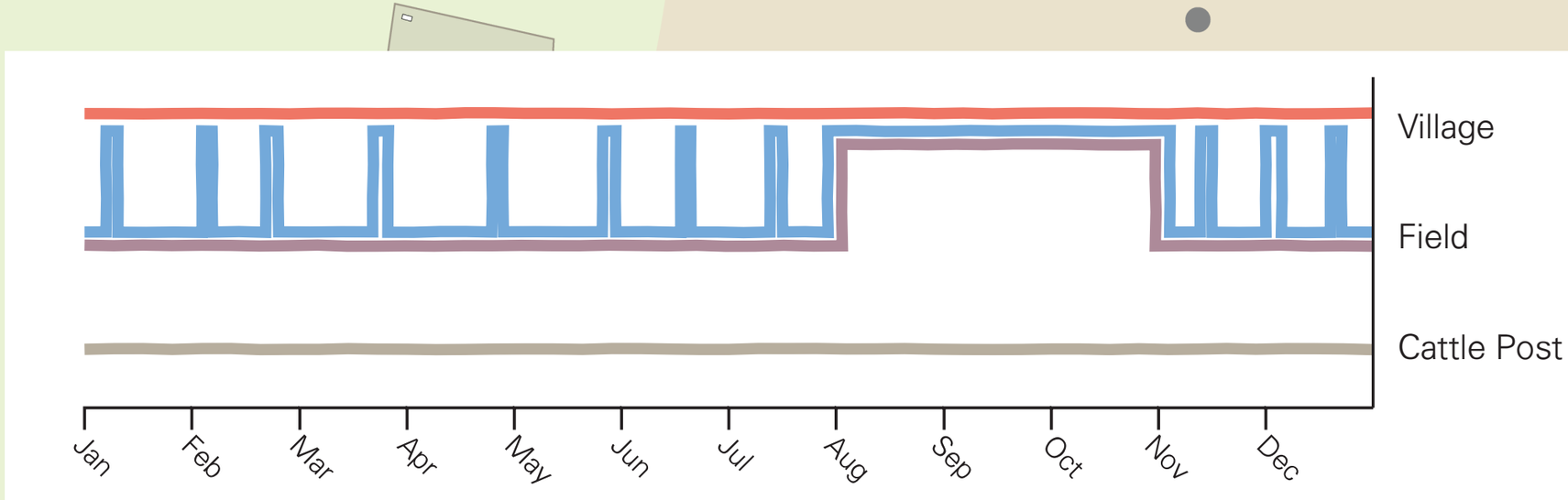
Agriculture

Cattle Posts

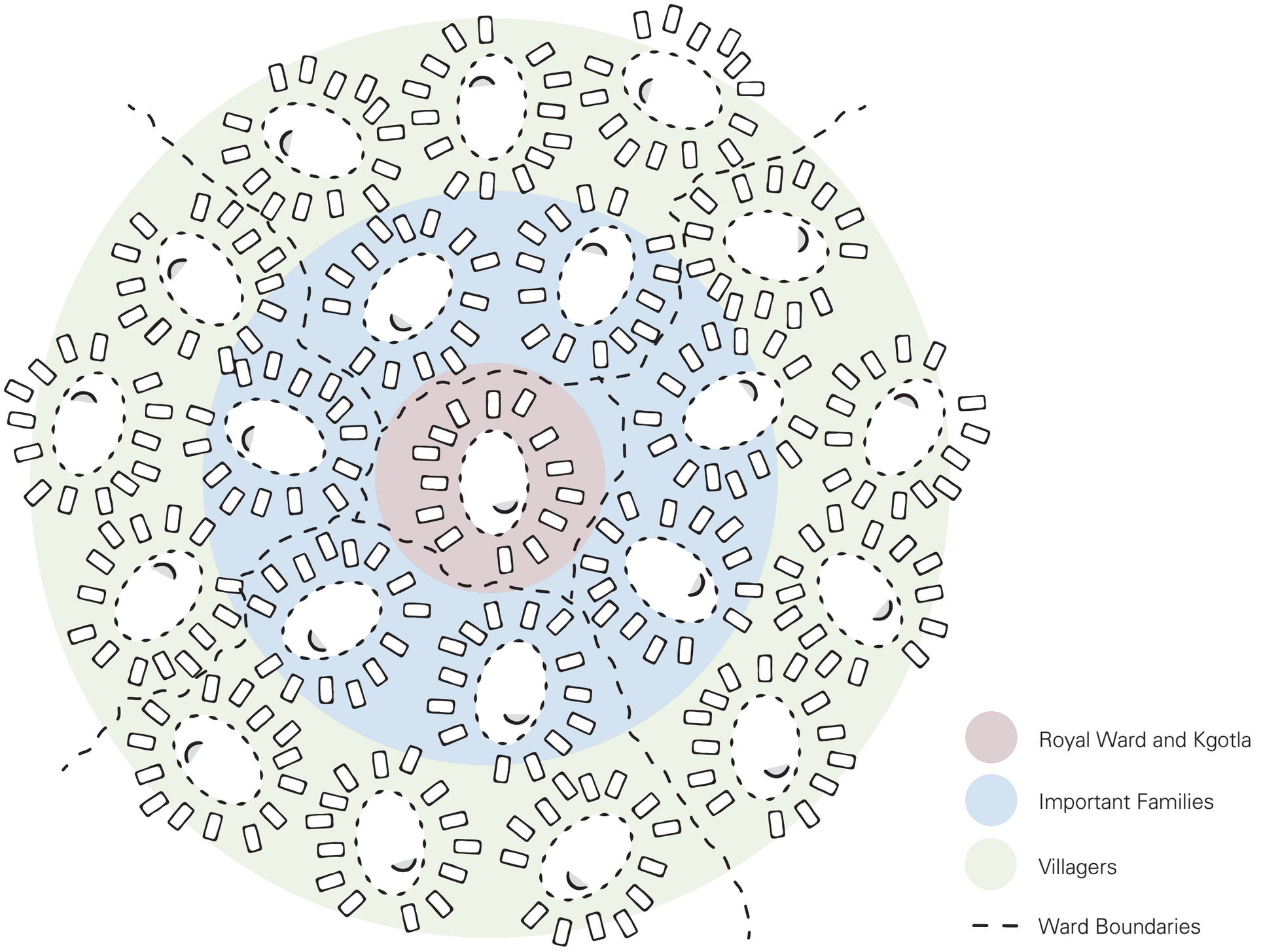
8km

40km

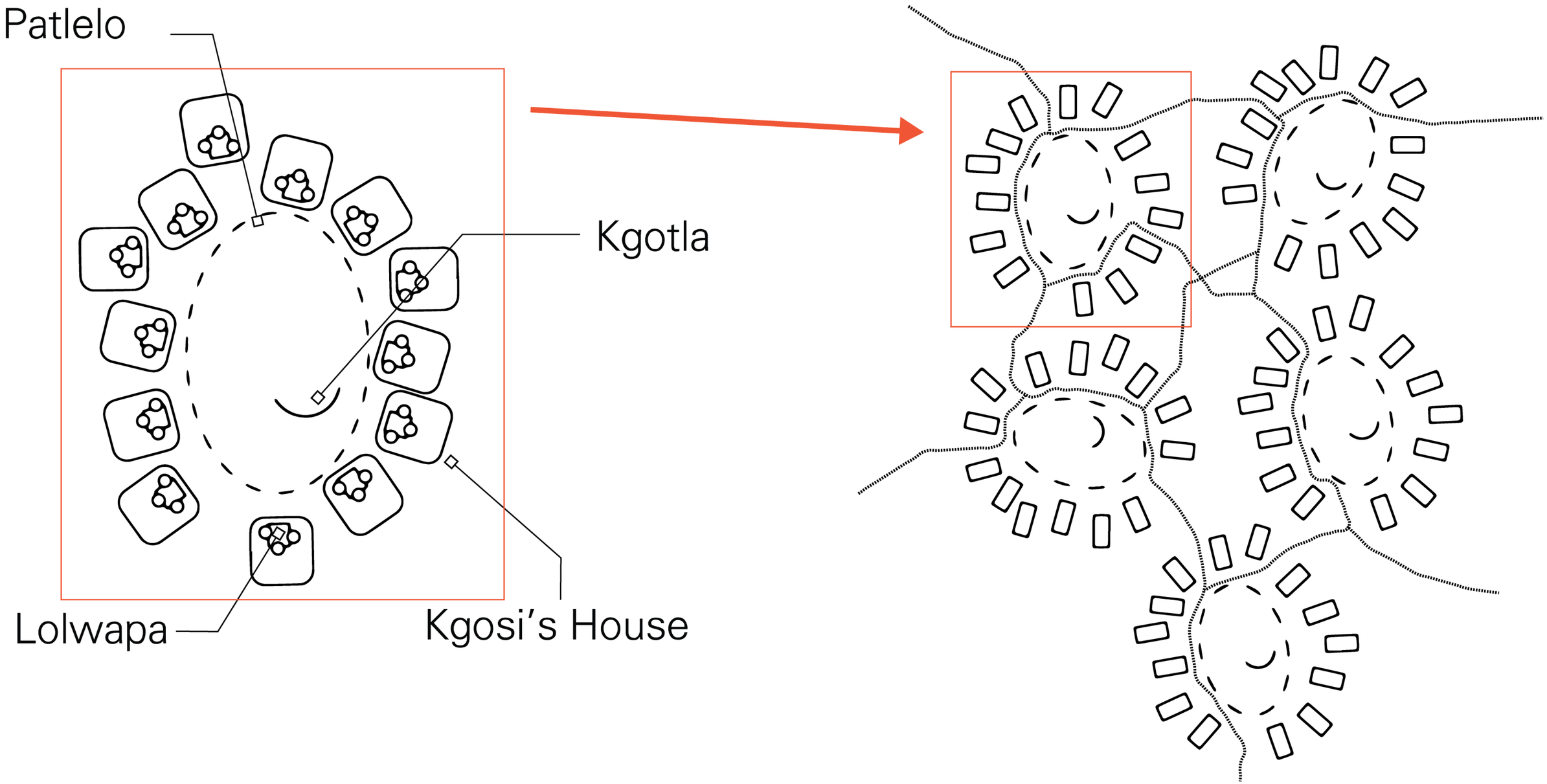
65+km



# Social Hierarchy in Space



# Village Development Pattern



# Kgotla

*Source: Author*

# Patlelo

*Source: Author*

# Lolwapa

*Source: Author*

# Neighbourhood Analysis

*Source: Author, (Google Maps, n.d.-d)*

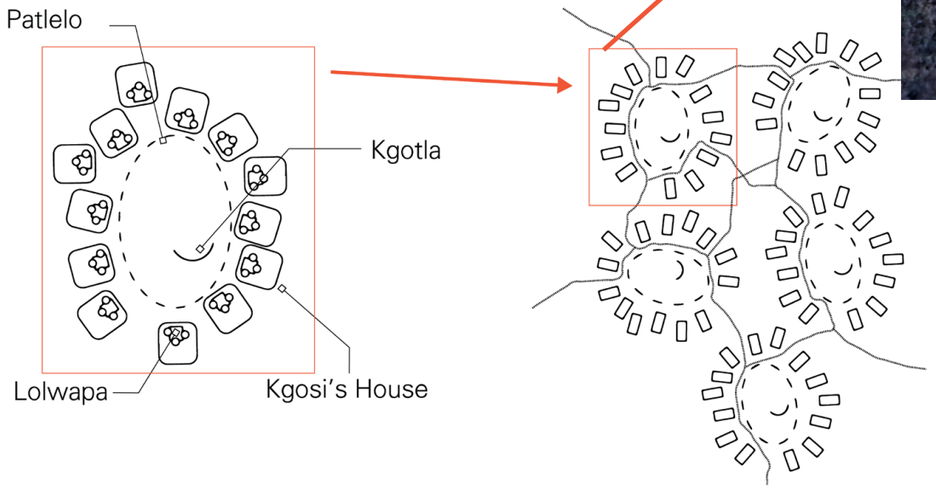
*Source: Author*

*Source: Author*

*Source: Author*

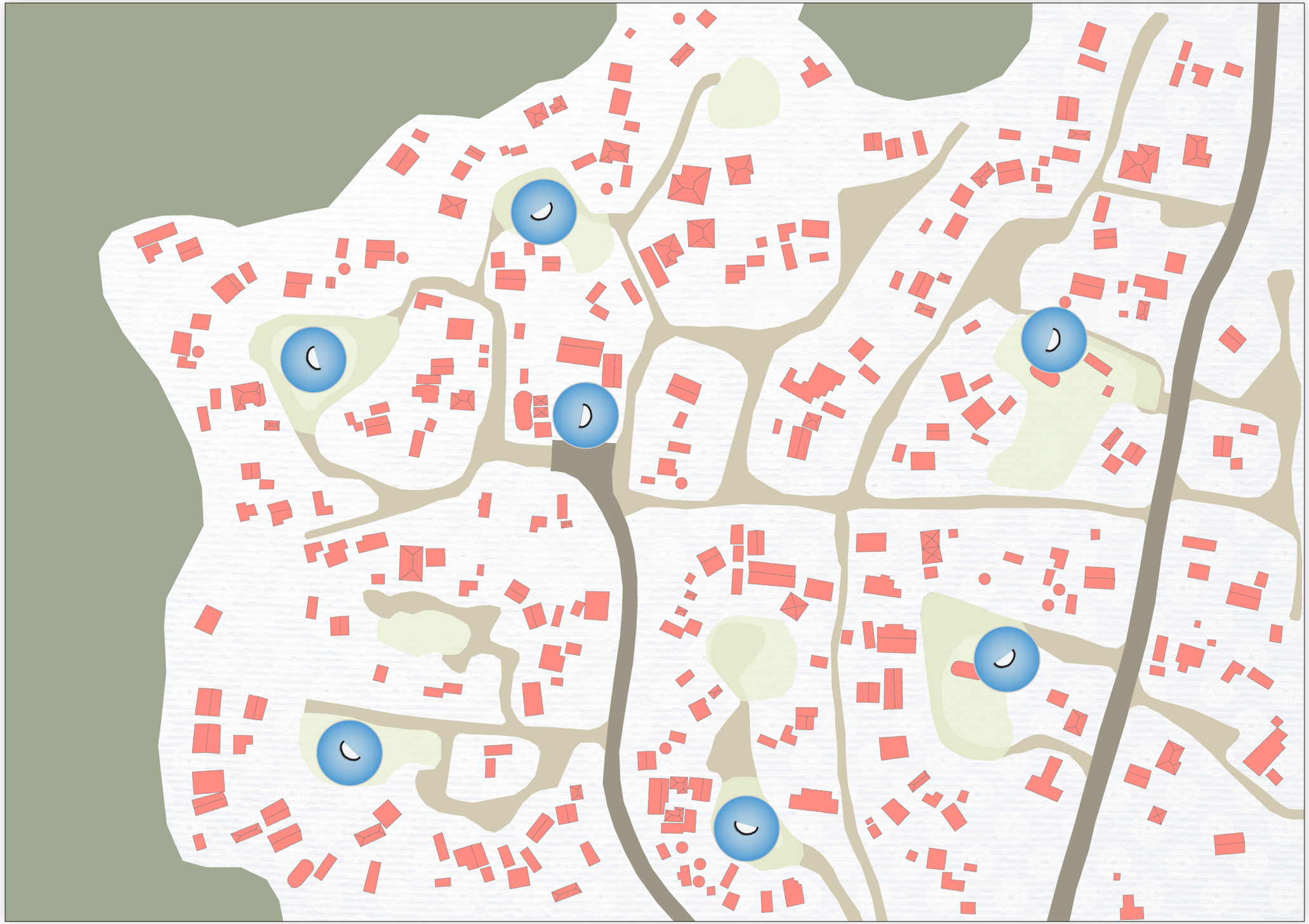
*Source: Author*

# Development Pattern in Gabane



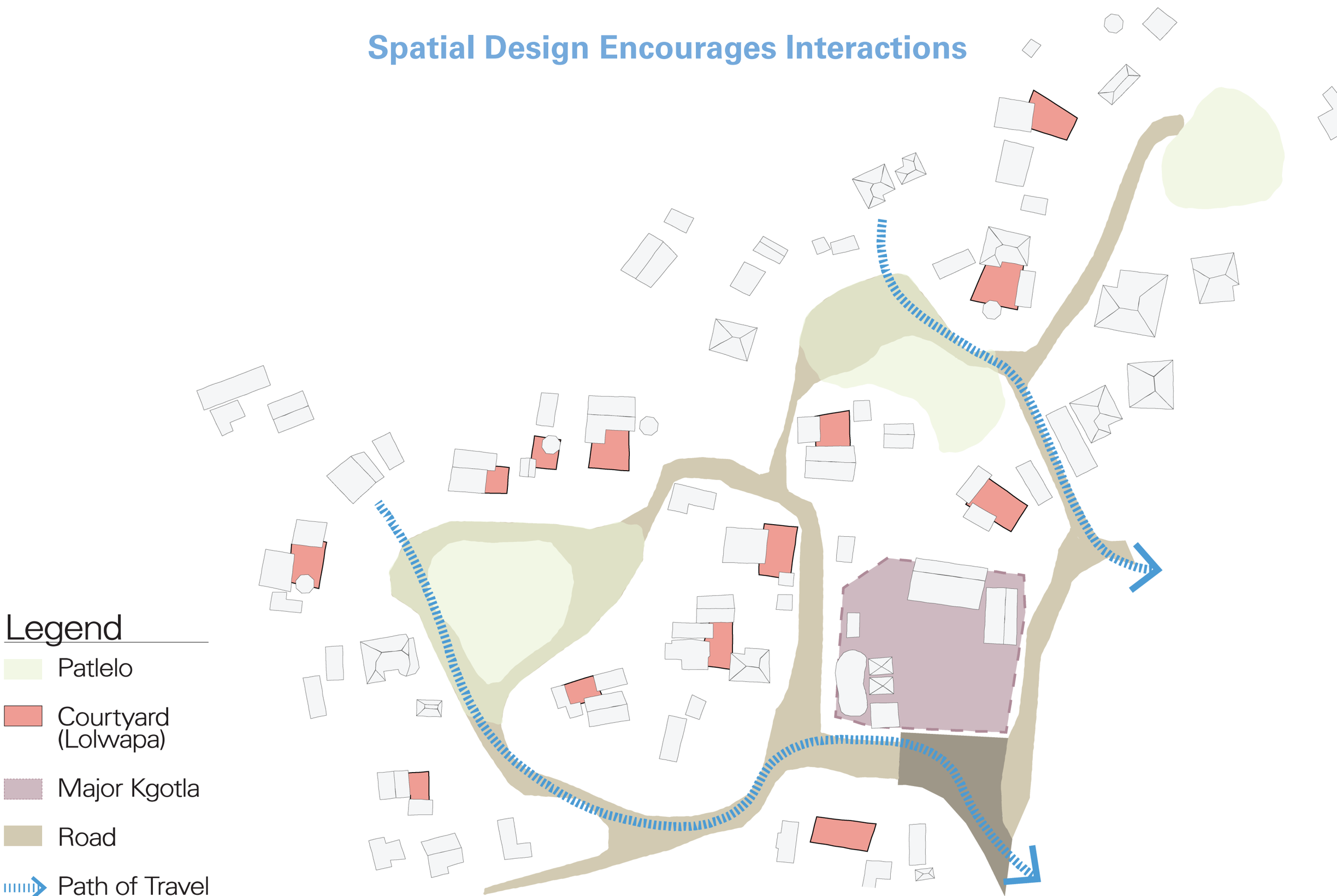

*Source: (Google Maps, n.d.-d)*

# Dikgotla and dipatlelo



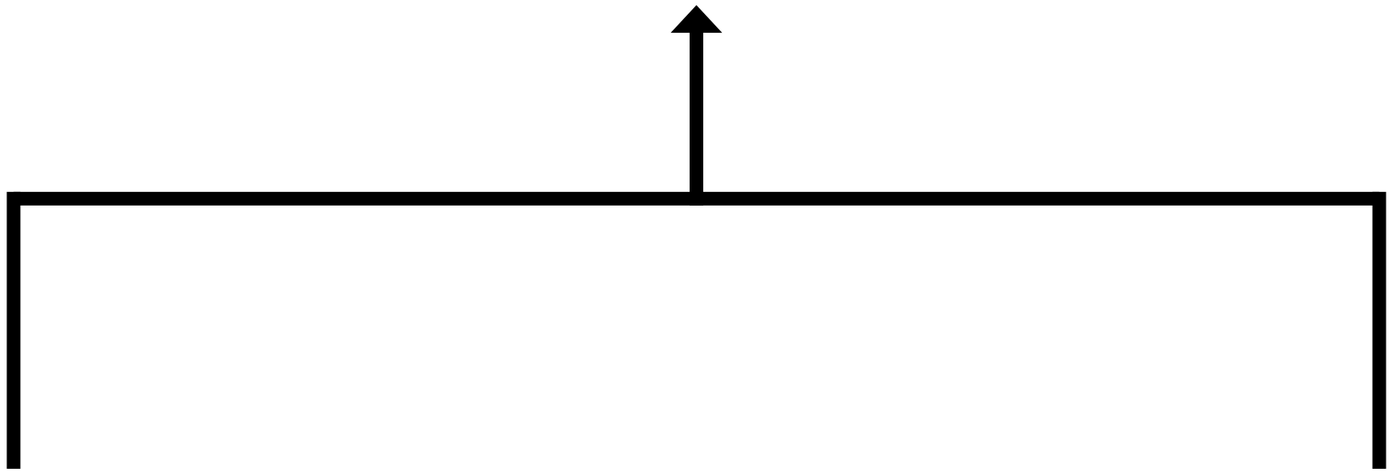

*Source: Author, (OpenStreetMap Contributors, 2022)*

# Spatial Design Encourages Interactions




*Source: Author, (OpenStreetMap Contributors, 2022)*

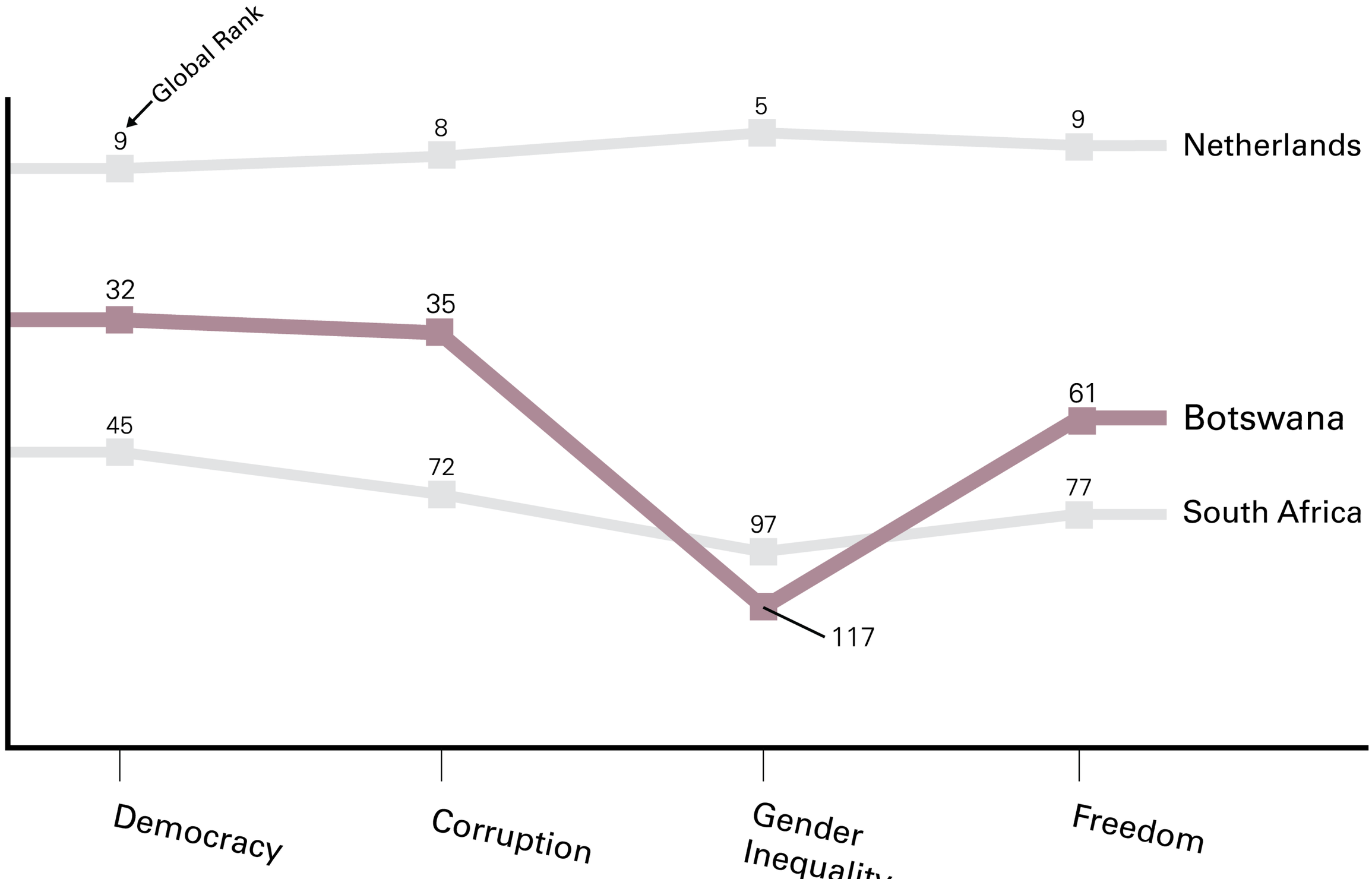
# Collective Social Harmony



## Spatial Design

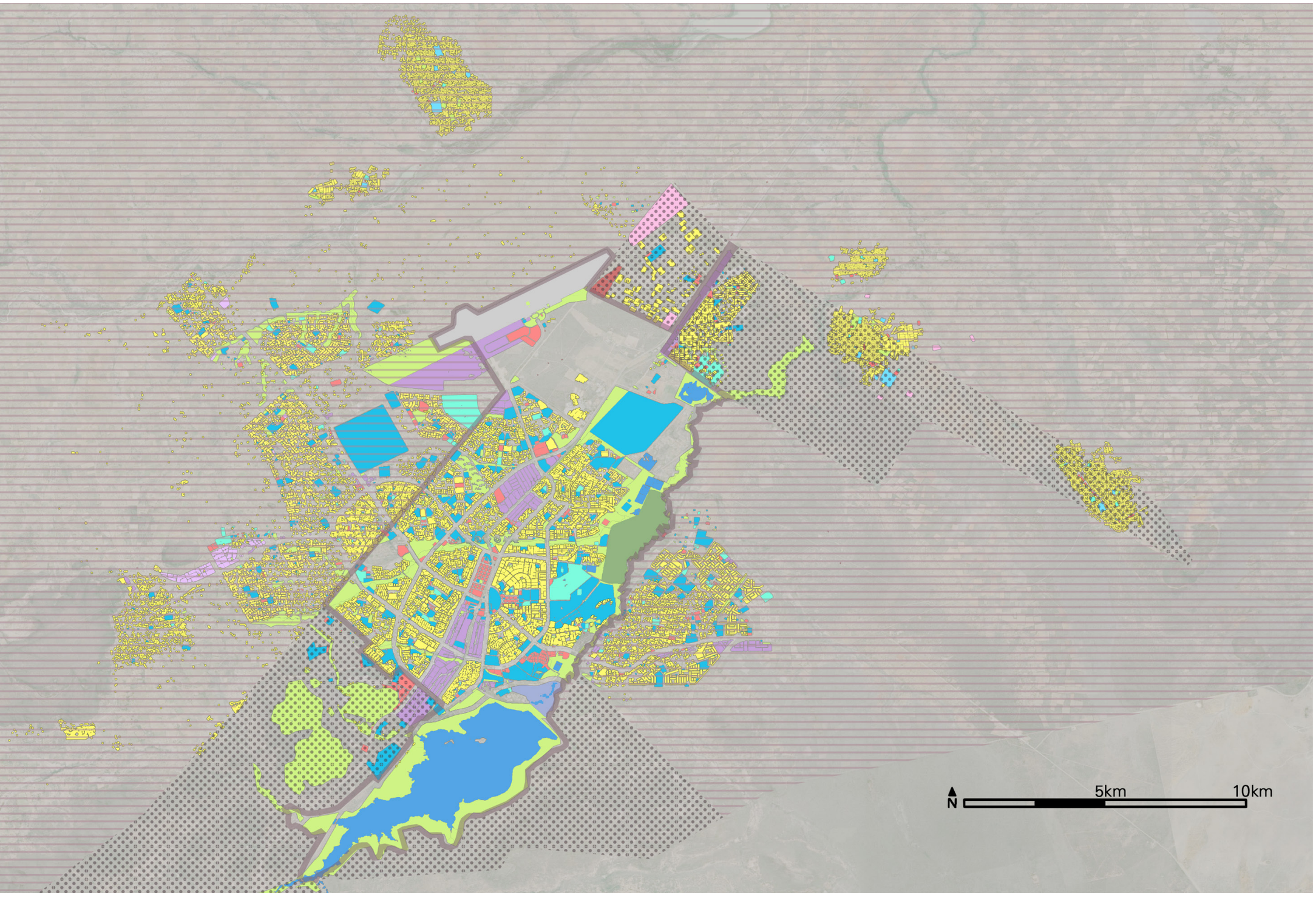
## Societal Design

# Analysis of Modern Spaces and Society



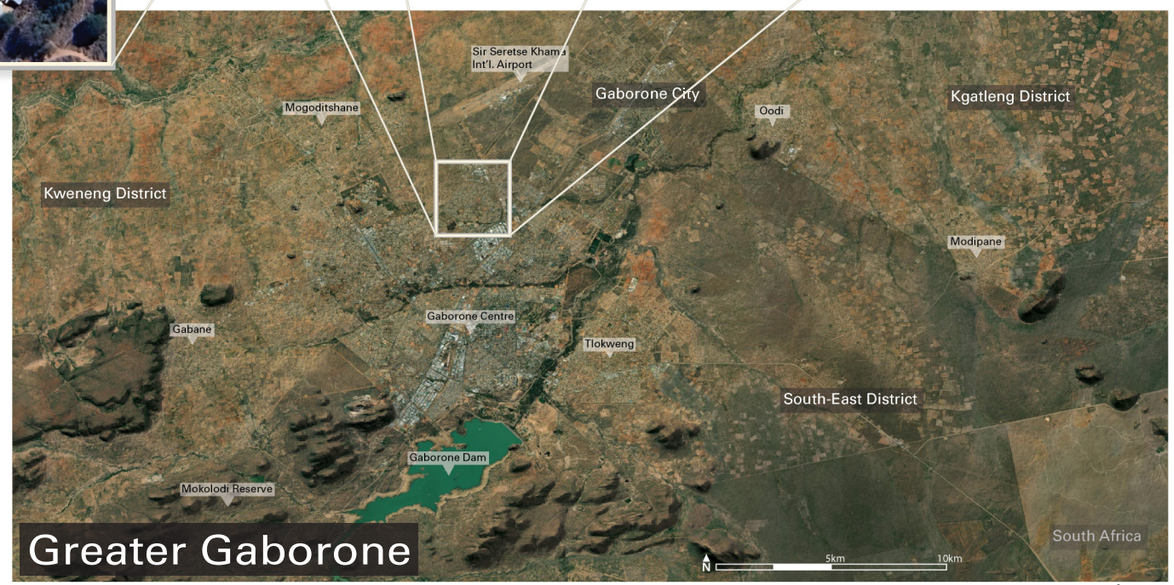

*Source: Author, (Economist Intellligence Unit, 2023), (Transparency International, 2023), (United Nations, n.d.), (Vasquez et al., 2023)*

# Urban Planning - A Citadel




*Source: Author, from (Kalabamu, 2004), (Kalabamu & Lyamua, 2021), (Mosienyane and Partners International & Plantec Africa, 2009), Author's interpretation*

# Neighbourhood Analysis




*Source: Author, (Google Maps, n.d.-f)*

*Source: Author*

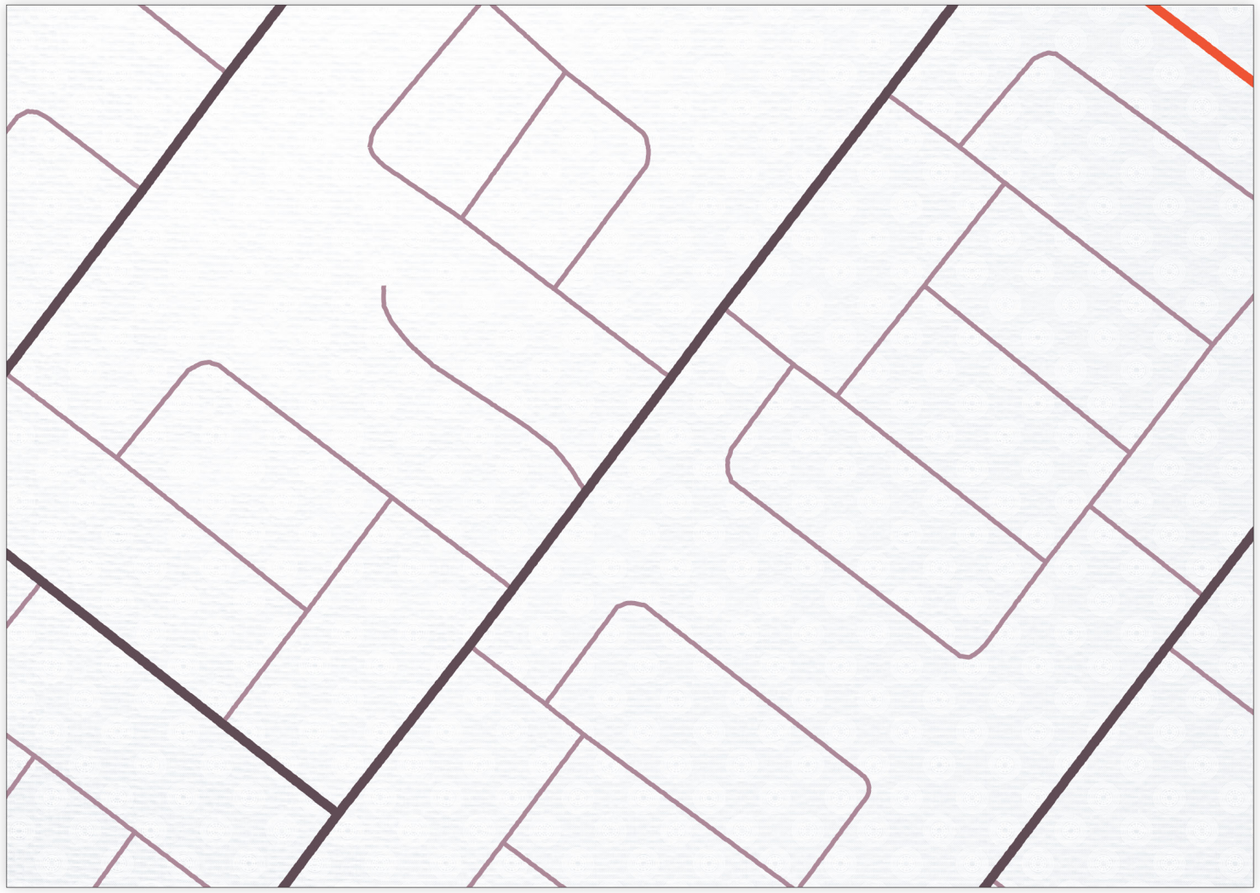
*Source: Author*

*Source: Author*

# Neighbourhood Plan

*Source: Author, (OpenStreetMap Contributors, 2022)*

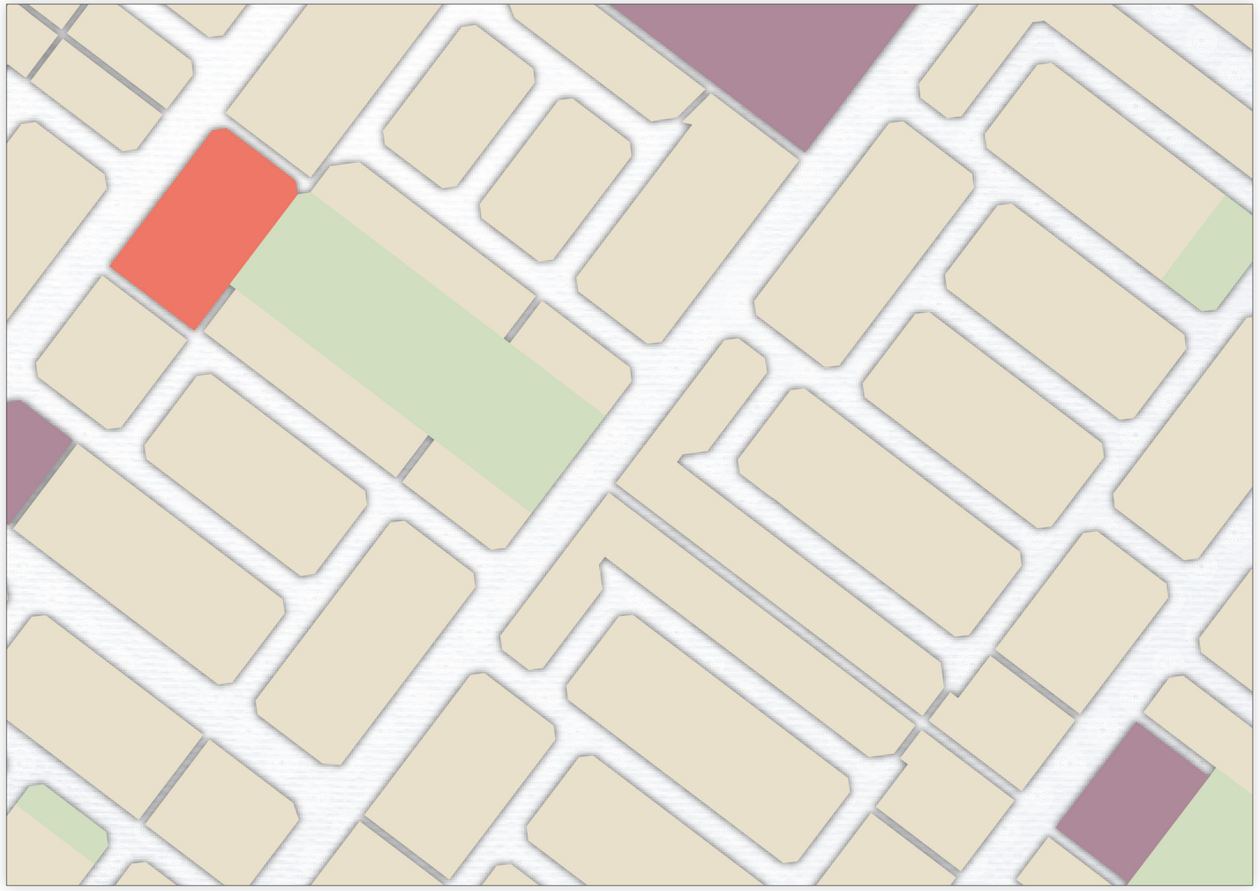
# Land Use and Transportation



N 250m

## Legend

- Tarred Road
- Dirt Road



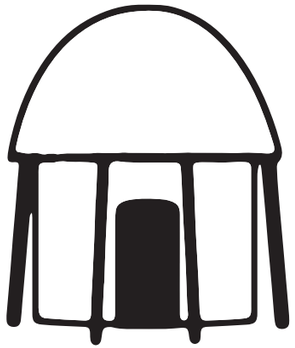
N 250m

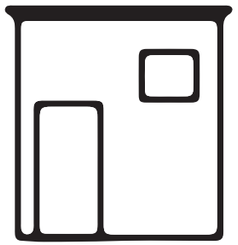
## Legend

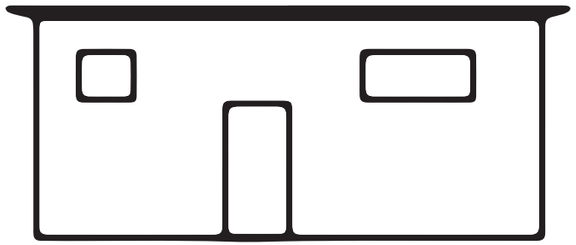
- Residential
- Community
- Open Space
- Commercial

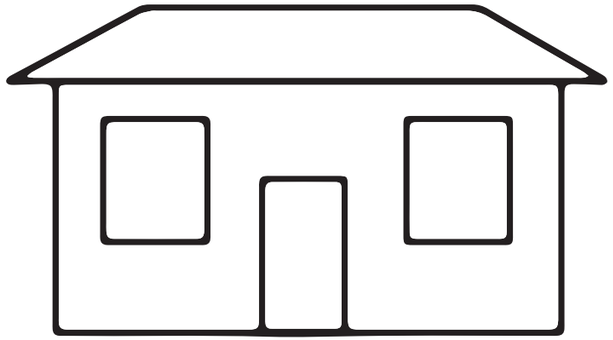
*Source: Author, (OpenStreetMap Contributors, 2022)*

# Architectural Evolution

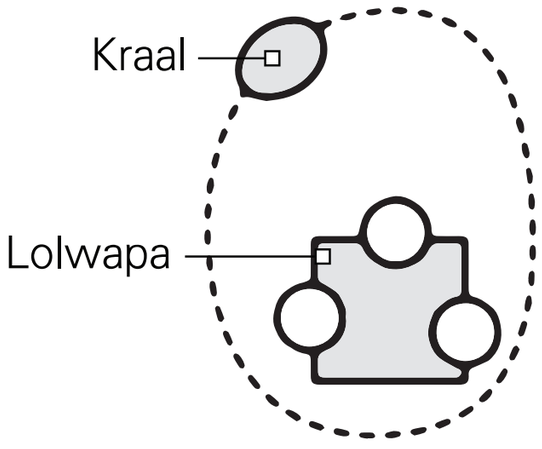


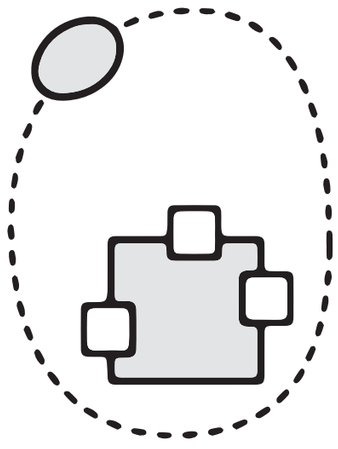


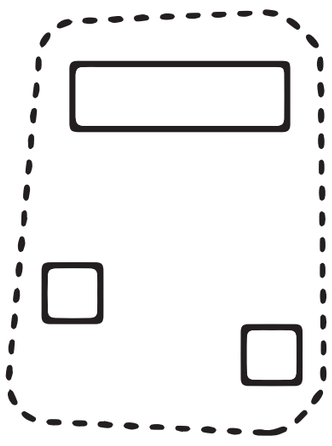


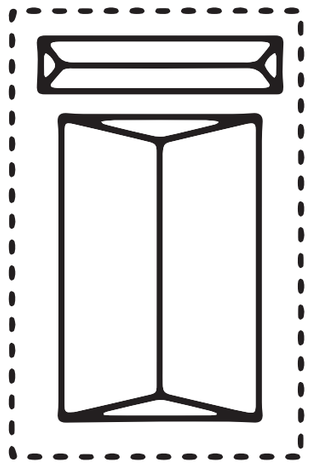


| Walls | Mud & Dung | Concrete Blocks | Concrete & Plaster | Wood Frame, Brick & Plaster |
|---|---|---|---|---|
| Roof | Thatch | Sheet Metal | Sheet Metal | Shingles |







Traditional

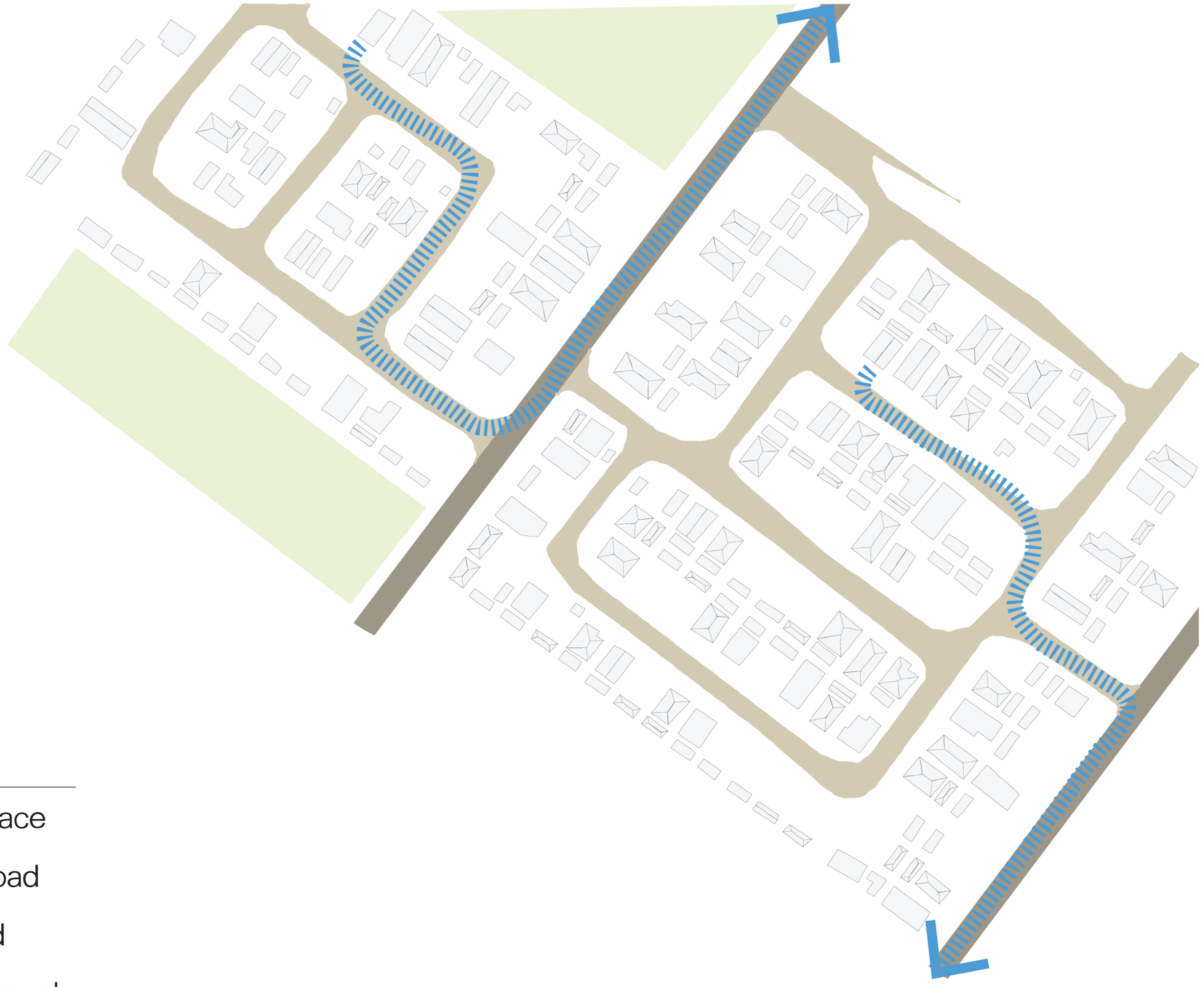
Quasi Traditional

Transition

Modernist

*Source: Author*

# Spatial Design Discourages Interactions

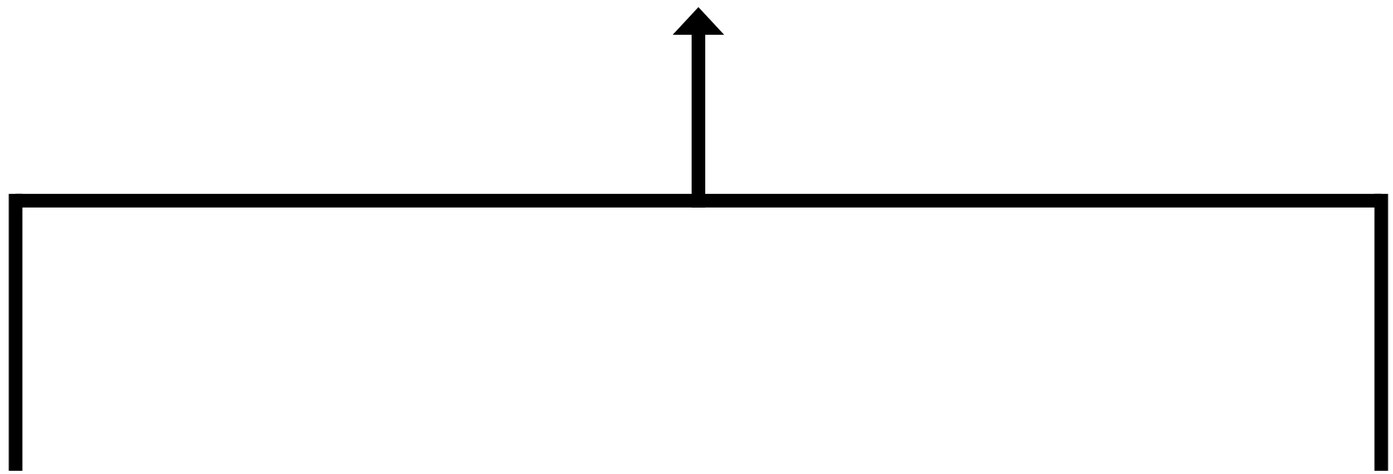


## Legend

- Open Space
- Tarred Road
- Dirt Road
- Path of Travel

*Source: Author, (OpenStreetMap Contributors, 2022)*

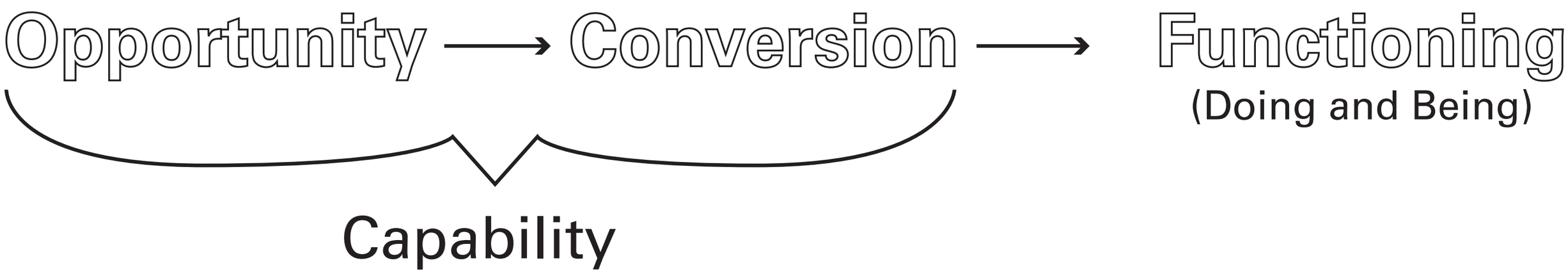
# Individualistic Capitalist



## Spatial Design

## Societal Design

# The Human Experience


Opportunity
Conversion
Functioning
(Doing and Being)
Capability

# A Societal Understanding - The Capabilities Approach

## Goitse

◦ Female ◦ 6 ◦ Urban Village ◦ Primary

Three other siblings

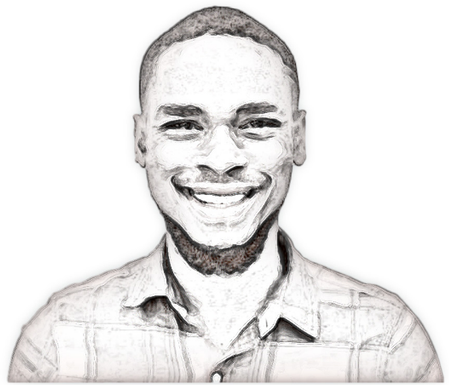
Attending primary school

## Thabo

◦ Male ◦ 12 ◦ Urban Village ◦ Primary

Attending primary school

Helps with tuck shop, chickens and goats

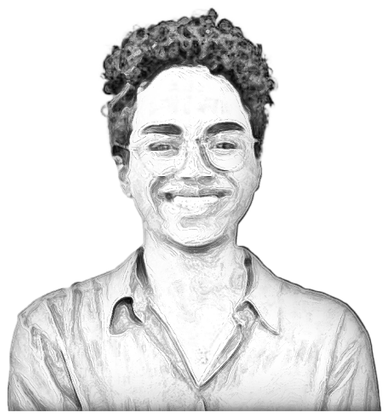


## Kabelo

◦ Male ◦ 20 ◦ Village ◦ Secondary

Taking care of aging parents

Working small-scale agriculture



## Lorato

◦ Female ◦ 26 ◦ Urban ◦ Secondary

University student

Seeking good job

## Masego

◦ Female ◦ 34 ◦ Urban Village ◦ Vocational

Horeca worker

3 Children

## Kabo

◦ Male ◦ 48 ◦ Urban ◦ Tertiary

Working professional

Lives in upper class area

## Malebogo

◦ Female ◦ 67 ◦ Rural ◦ Non-Formal

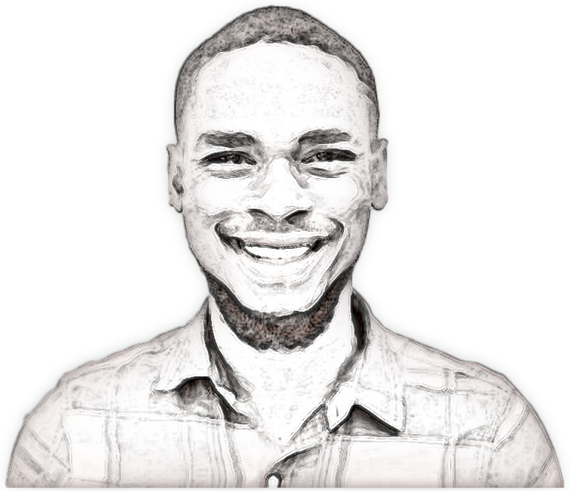
Lived a difficult life with little opportunity

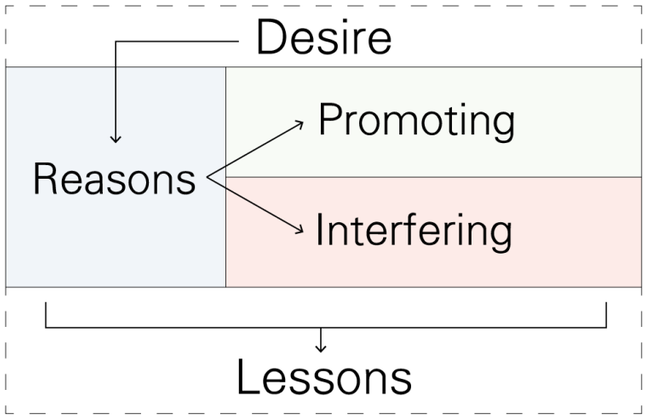
Substance abuse issues

Has loving family in the area

# Analysis Example 1

## Kabelo






### Attend university and climb the economic ladder

- Sees this as the path to greater prosperity
- Peers he grew up with are doing this
- Feels that this is the correct path for himself in life

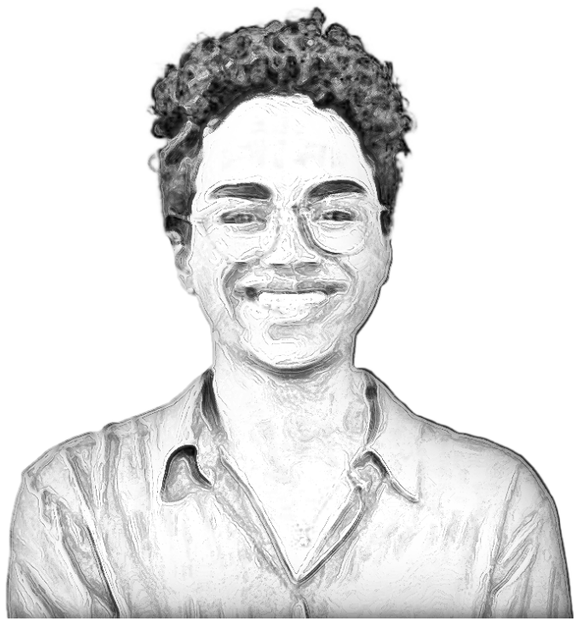
- Secondary School graduate
- Has a supportive community around him who encourage him to try

- Needs to care for and help his ageing parents
- Lives a far distance from the university campus
- Poor access to internet in the village
- No access to a private car
- Public transport options expensive and slow due to routing

- Limited social services in the villages affects both young and old alike
- Poor transportation options to the countryside limit opportunities for the achievement of desires
- Villages and countryside not seen as a place for growth/advancement
- Education and capitalistic advancement seen as the correct path forward in life
- Major tradeoffs between personal and family/community development are necessary for people living in remote villages

# Analysis Example 2

## Lorato

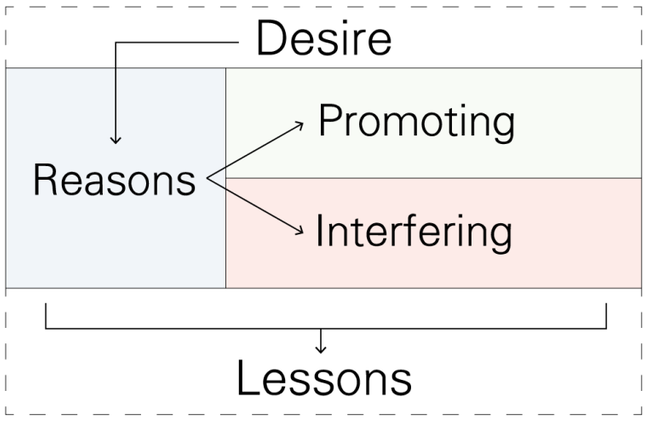


Eventually move out to a smaller village and enjoy a more peaceful lifestyle outside of work

- Despite the desire for a fun and lively lifestyle in the present, she believes that the village lifestyle will bring her a greater sense of peace and happiness than living in the city
- Feels a sense of nostalgia for the village lifestyle based on the stories from her parents' youth
- Believes this will also lead to the best outcomes for her social life and feelings of community

- Has an uncle who lives in a nearby village who could help with her integration into that social environment
- The lower cost associated with living in villages makes it more financially manageable than staying in the city

- The village her uncle lives in is relatively far from the city and so would have a long commute to the city centre if that is where she does find work upon graduation
- Not many traditional style homesteads become available for transfer or purchase, which is the style of home she is hoping to live in




- Even some young people who did not grow up in a village environment see villages as desirable places to live
- Distance between most villages and larger cities can make the balancing of career and life challenging for current and would-be village dwellers
- Lack of any development recently in the traditional style recently makes traditional homesteads more scarce as related to the overall housing supply

## Conclusion to the Capabilities Analysis

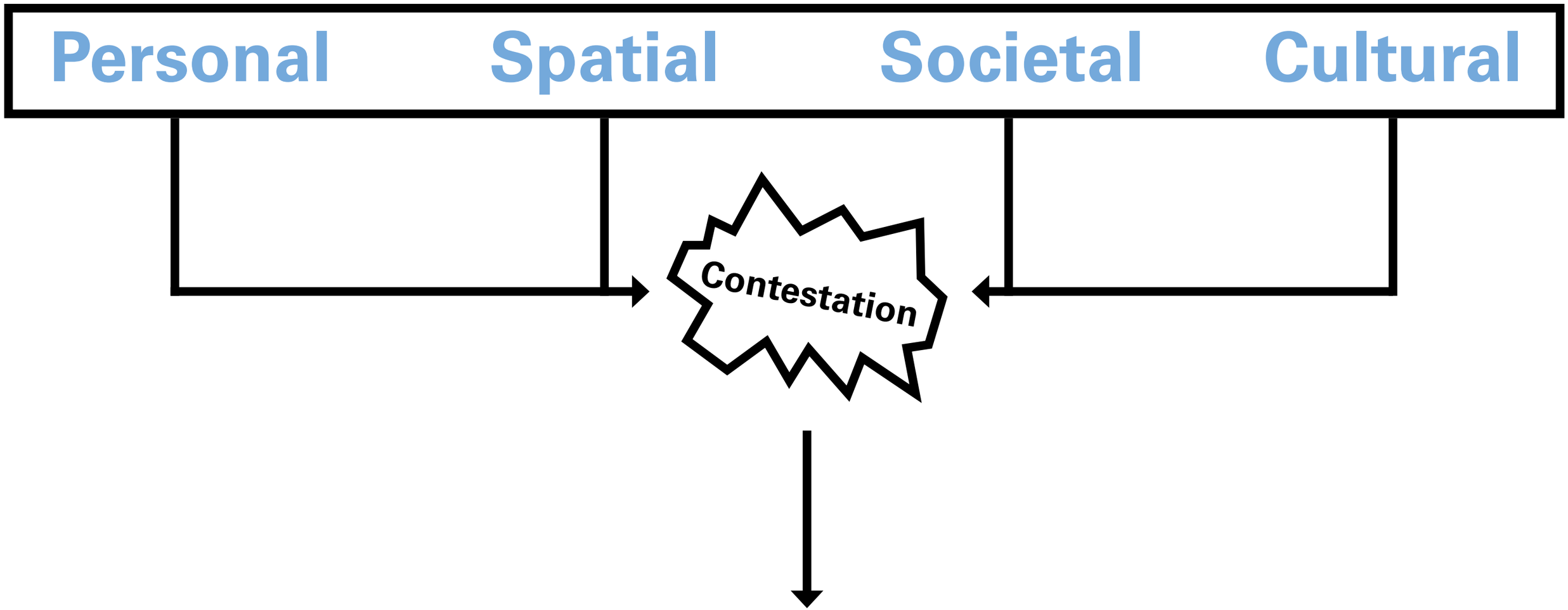
**Desire for Community**

**Disconnect between desires and expectations**

**Psychological connection to villages**

**Appreciation of Urban Amenities**

# Forces




# Life Fulfilment Inequality

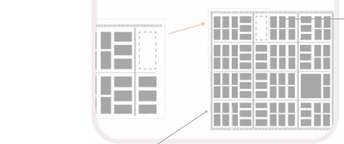
# What shall we do about it?

# Analysis has given us some lessons

## Modernism

### Educational and employment facilities are provided in an ordered and logical manner

### Efficient and cost effective provision of infrastructure is prioritized




### Fast, cheap and reliable transportation options are limited in the ability to connect the entire region

Related Personas

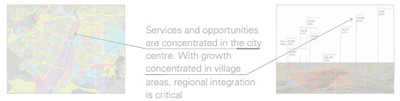
The lack of affordable public transportation options are limiting the ability of people across the region to carry out lives that they value. Opportunities that could be sought out are otherwise out of reach due to a lack of connection options.

### Transportation systems are organized for fast and efficient movement patterns

### Village and rural areas need to be integrated into the larger region to ensure people are not systemically left behind

Related Personas

Disconnectedness and lack of public services create situations where people living in rural areas can become trapped, with little possibility to seek out lives they value.




### Public spaces should be accessible, open and facilitate community development

Related Personas

There is a strong desire to use public space both as a place for recreation, and as a driver of community bonds. This was how public space was used in traditional villages, but is not the case in modernist neighbourhoods.

### Diverse and cheap housing options should be available across geographies

Related Personas

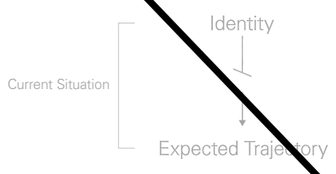
Building regulations strictly limit the types of homes that can be built, the materials that must be used, and where they can be built. This has caused housing to become more expensive and therefore more difficult to attain. It is also increasingly difficult to find housing in desired locations.

Traditional housing was constructed using local materials by individuals. The institutionalization of building practices has led to increased prices and few options

### The ability to connect with one's home village should be easy and regular

Related Personas

A significant portion of one's sense of self and identity stem from their connection to their home village. This creates a contestation between the expression of identity and the expected trajectories of life which lead people to leave their home villages for large urban areas.




### Self-help development at plot, neighbourhood and village level should all be encouraged

Related Personas

Construction of both private and public buildings and facilities was done through collective action in traditional societies, acting as a key method for the development of community. The professionalization and institutionalization of construction has eliminated this as a method for building community and has also made housing more expensive. There is demand for both more affordable housing and better sense of community, leading to a need for self-help development at all levels.

### Keeping livestock should be possible in city and village environments

Related Personas

Many homesteads in village areas currently keep some livestock and many urban dwellers are interested in this practice as well. It was very common to keep livestock at each homestead in traditional Tswana society, which further advances the consideration of keeping livestock as a good practice. Most modernist neighbourhoods do not permit this to occur.

### Balance must be struck between traditionalism and modernism

Related Personas

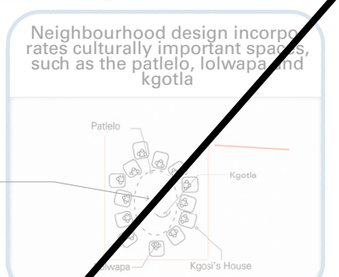
There are clearly benefits stemming from both the traditional and modern ways of life. A strong sense of identity, happiness and fulfilment derived from traditional values and practices. Modern development has led to significant improvements in material situations and has opened up possibilities that were not otherwise available. Finding a way to strike a more even balance between these two systems is key for progressing the urban system.

## Traditionalism

### Community building principles are integrated into spatial design philosophy

### Movements between village and production environments occur on yearly timescales

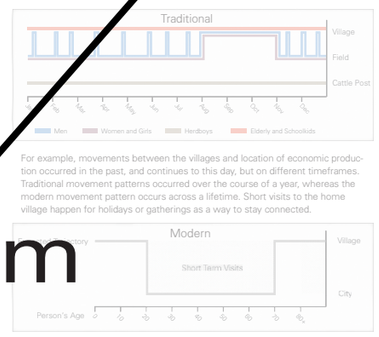
### Neighbourhood design incorporates culturally important spaces, such as the patlelo, lolwapa, and kgotla




### Traditional lifestyle practices should be possible while still participating in modern society

Related Personas

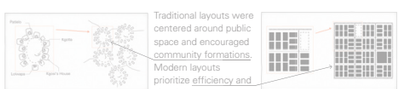
Many of the practices that were core to the way that traditional societies functioned are either no longer possible, or have been altered significantly in the present day.



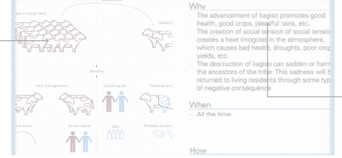

### Community building and sense of belonging must be promoted

Related Personas

Community was the foundation of traditional societies, being fully integrated into both societal structures and spatial design. It has been removed from modern spatial planning and the formation of communities has become very challenging as a result.




### Neighbourhood maintenance and improvement occurs through communal action



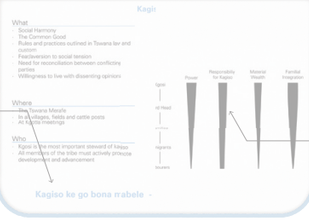

Use of the mafisa system encourages collaboration and sense of shared ownership

Promotion of Kagiso as a social philosophy leads to a culture of working together for the greater good

### Significant freedom of land use and building and development rules

Village residential land use allowed for significant flexibility for number of buildings on-site, erection of tuck shops, etc.

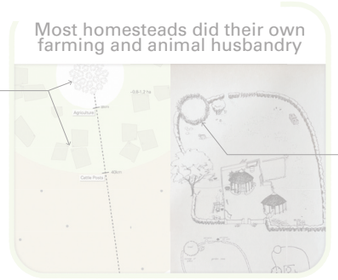
### Promotion of Kagiso/Botho was at the heart of societal functioning




Kagiso was seen as the path to properity

All people, no matter their place in the societal hierarchy, were responsible for advancing Kagiso

### Most homesteads did their own farming and animal husbandry



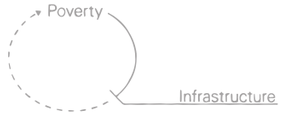

People owned homes both in the fields and in the village, growing crops to feed themselves and their dependents

Kraals were found in most village homesteads for small livestock to be kept year-round

### Access to reliable water, electricity, internet and food must be available to all people

Related Personas

Basic infrastructure, especially in rural areas, is still not necessarily available everywhere. This creates further disadvantage for low-income people in these areas, further entrenching a cycle of poverty.




## Freedom

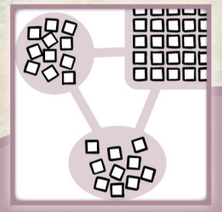
# Principles for a New Urban System

# Feasibility Analysis

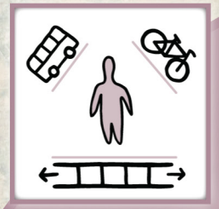


# Design Demonstration

Well Integrated Environments



Efficient Transportation



Reliable Infrastructure

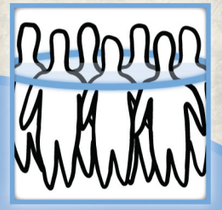
Spatially Equitable

Harmonious Regional Functioning

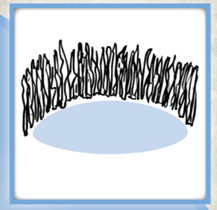
Life Fulfilment Equity

Development of Kagiso/Botho

Community Building



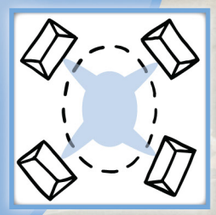
Culturally Relevant Spaces



Self-Help Development

Desirable Housing

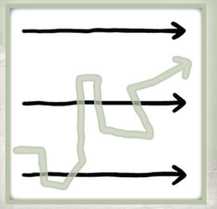
Public Space Drives Kagiso



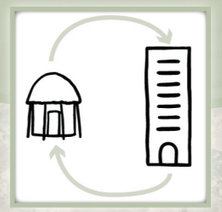
Promotion of Lifestyle Freedom

Small Scale Agriculture

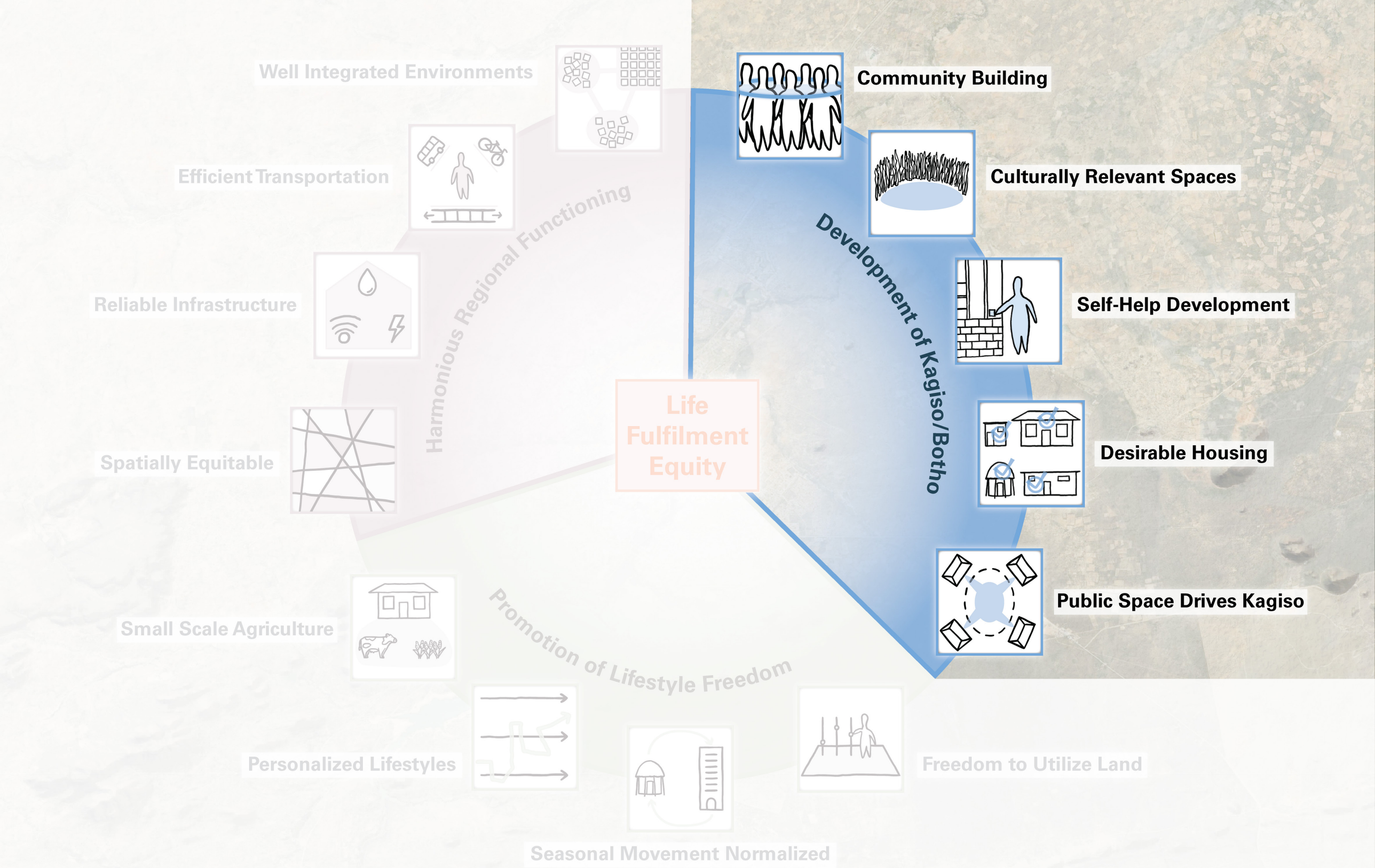
Personalized Lifestyles



Seasonal Movement Normalized



Freedom to Utilize Land


Well Integrated Environments
Efficient Transportation
Reliable Infrastructure
Spatially Equitable
Small Scale Agriculture
Personalized Lifestyles
Seasonal Movement Normalized
Freedom to Utilize Land
Harmonious Regional Functioning
Promotion of Lifestyle Freedom
Life Fulfilment Equity
Development of Kagiso/Botho
Community Building
Culturally Relevant Spaces
Self-Help Development
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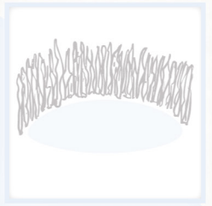
Culturally Relevant Spaces



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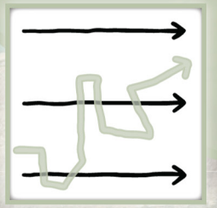

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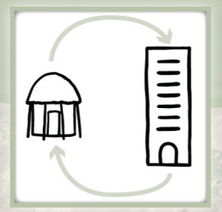
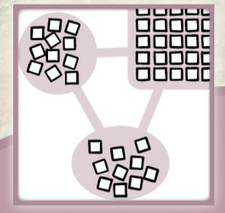
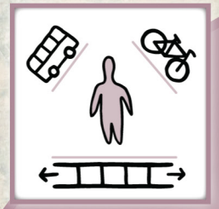


Freedom to Utilize Land

Well Integrated Environments



Efficient Transportation



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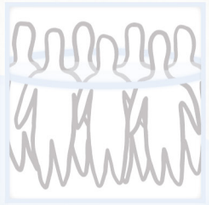
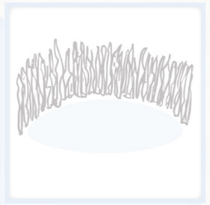
Community Building



Culturally Relevant Spaces



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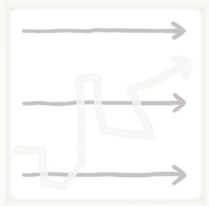
Small Scale Agriculture

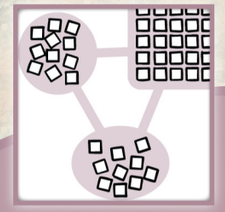
Personalized Lifestyles



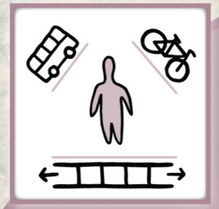
Seasonal Movement Normalized

Freedom to Utilize Land

Well Integrated Environments



Efficient Transportation



Reliable Infrastructure

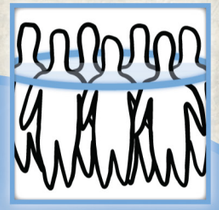
Spatially Equitable

Harmonious Regional Functioning

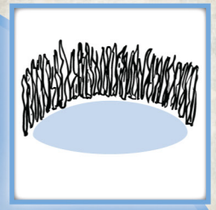
Life Fulfilment Equity

Development of Kagiso/Botho

Community Building



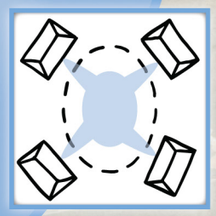
Culturally Relevant Spaces



Self-Help Development

Desirable Housing

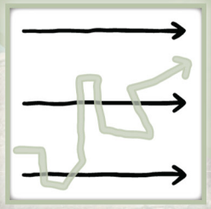
Public Space Drives Kagiso



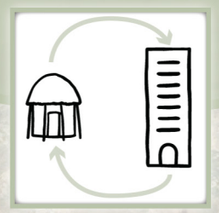
Promotion of Lifestyle Freedom

Small Scale Agriculture

Personalized Lifestyles



Seasonal Movement Normalized



Freedom to Utilize Land

# Feasibility Analysis (x13)

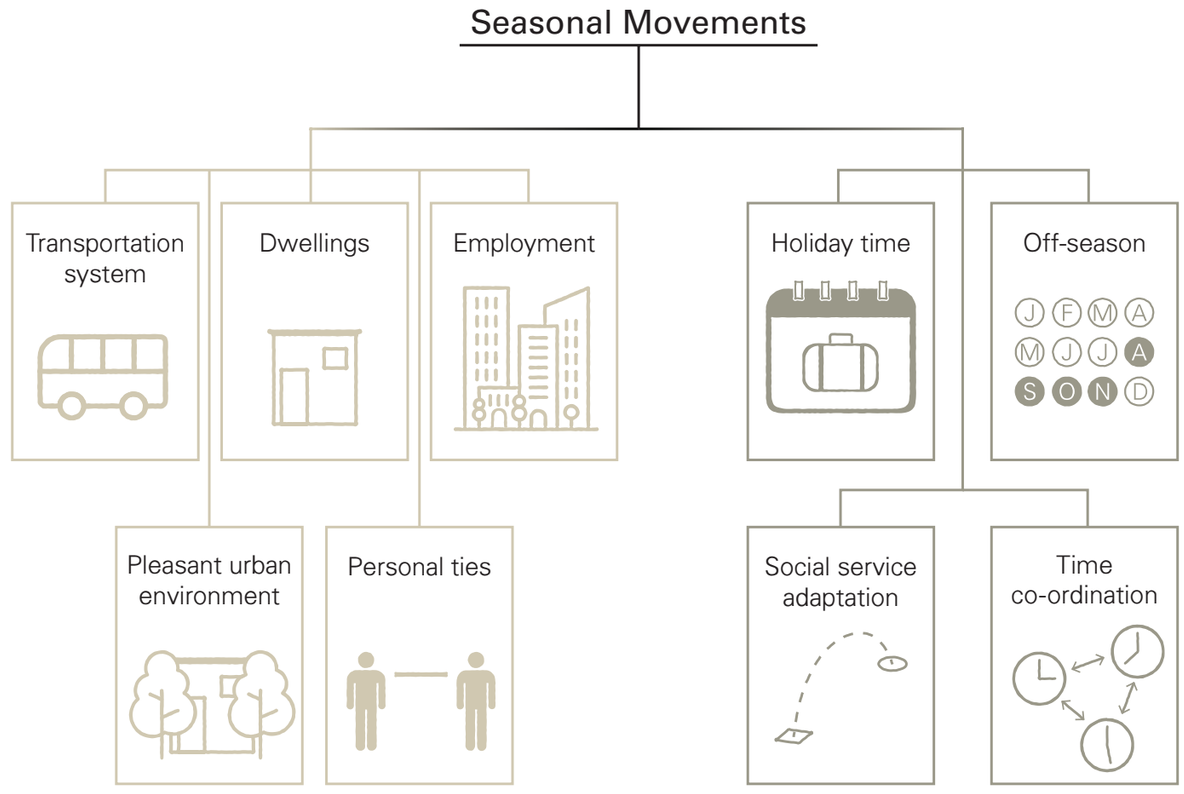
| Promoting |
| --- |
| Interfering |
| Relevance to Research Question |

How can urban design and planning be leveraged as tools to create a new spatial development paradigm that reduces life fulfilment inequality in the Gaborone region?

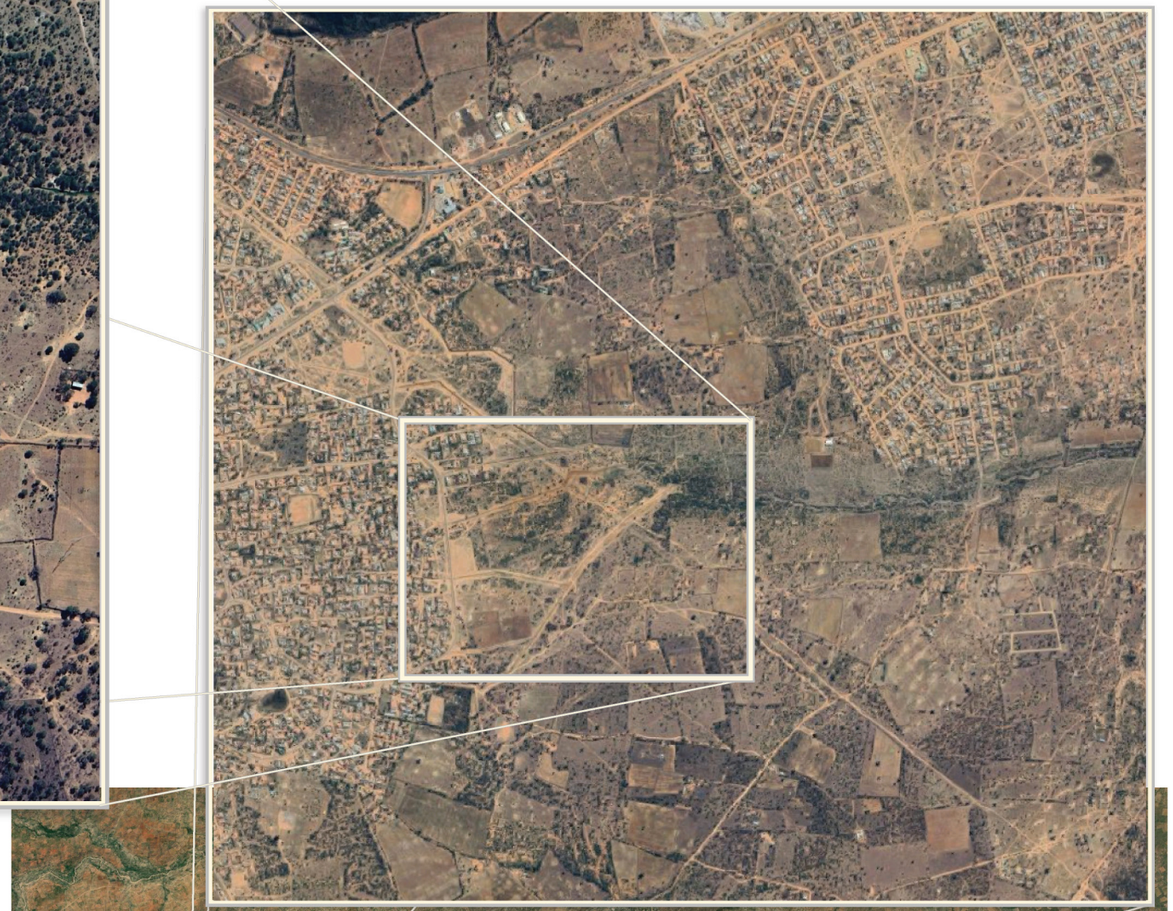
1. Community building and Kagiso/Botho development forms the basis of spatial design across all scales and settlement types.

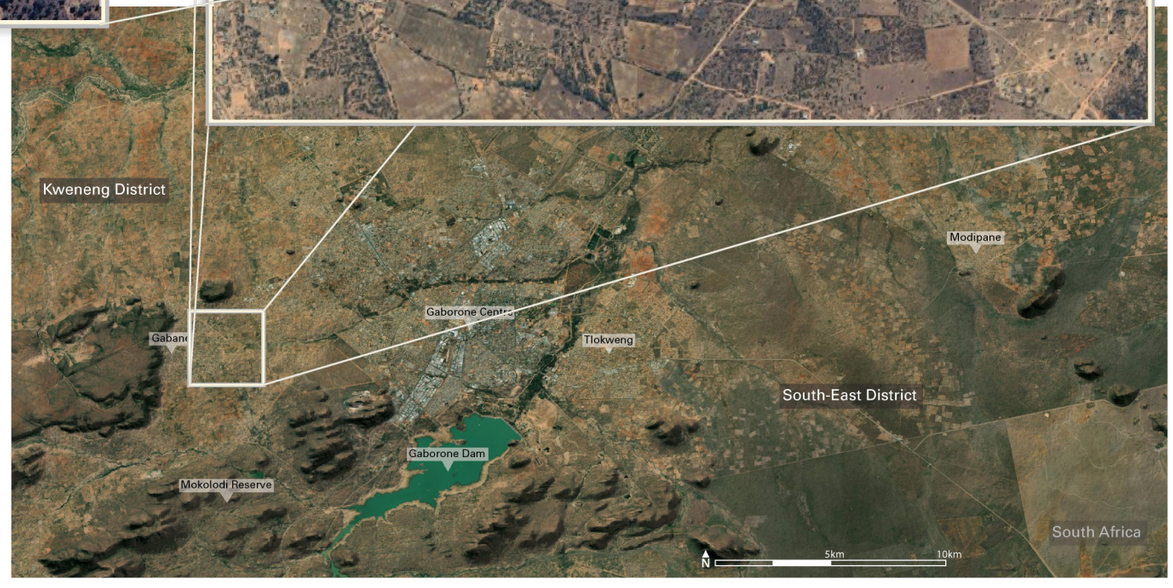
| |
| --- |
| ◦ Strong heritage of this development pattern occurring in the past provides a strong basis for a return to this style.<br>◦ Development of community is seen as highly desirable by most Batswana.<br>◦ Centralized planning system provides relatively simple avenue for altering planning policy on at a broad scale. |
| ◦ Development system is based on capitalist principles, heavily prioritizing economic efficiency in land use development.<br>◦ There is currently no entrenched method for measuring community development and individual life fulfilment. A lack of measurement tools makes it more difficult to justify significant policy changes as it is then more difficult to prove the effectivenes of changes. |
| ◦ In considering that spatial design is playing a significant role in driving both inequality and lack of happiness and fulfilment, a radical re-think is necessary in order to reduce life fulfilment inequality.<br>◦ The prioritization of Kagiso/Botho and community development in spatial design will help to foster a feeling of connectedness between people, their neighbourhoods and their culture. |

# Design Demonstrations



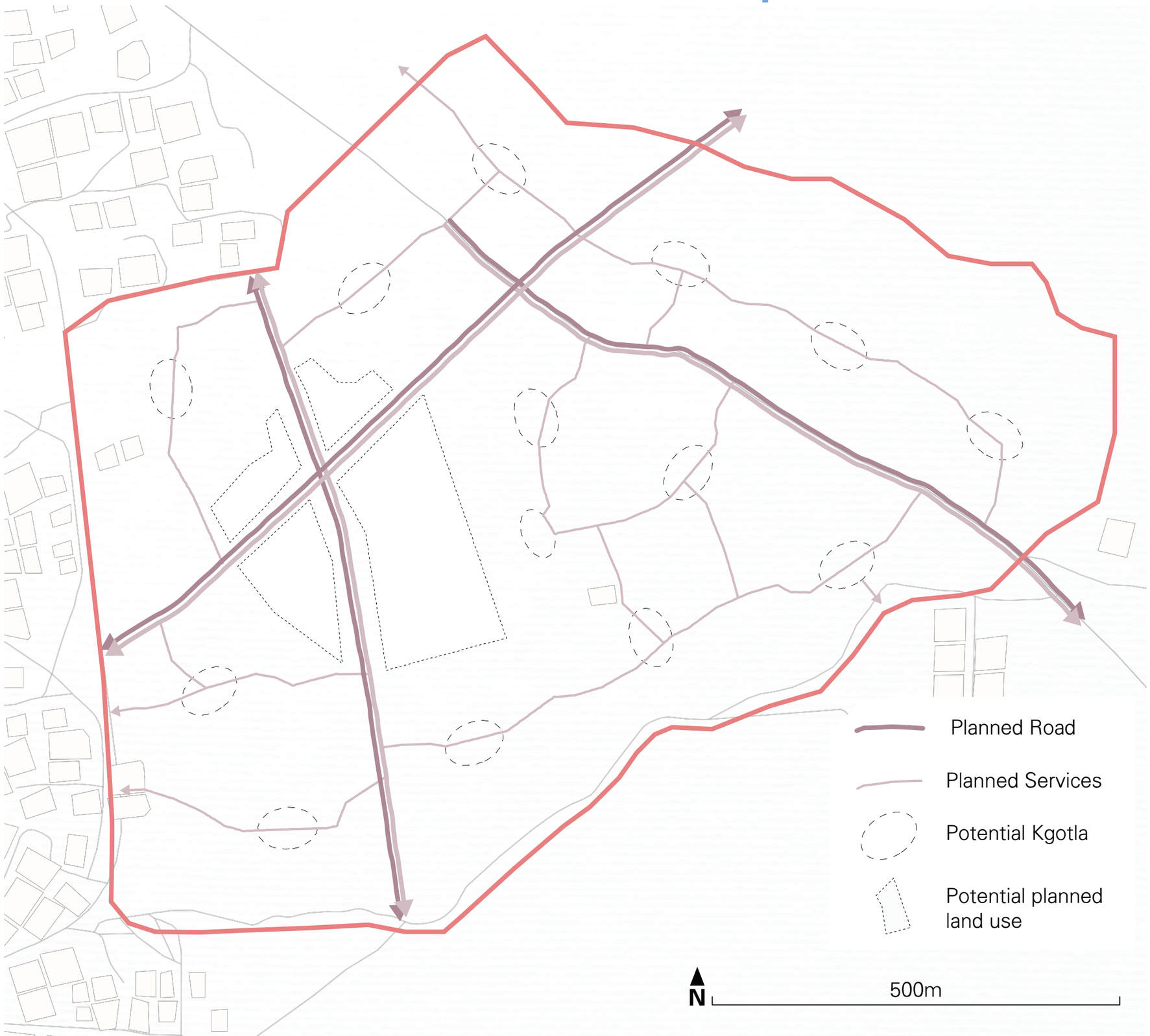
# Site - Outside Gabane





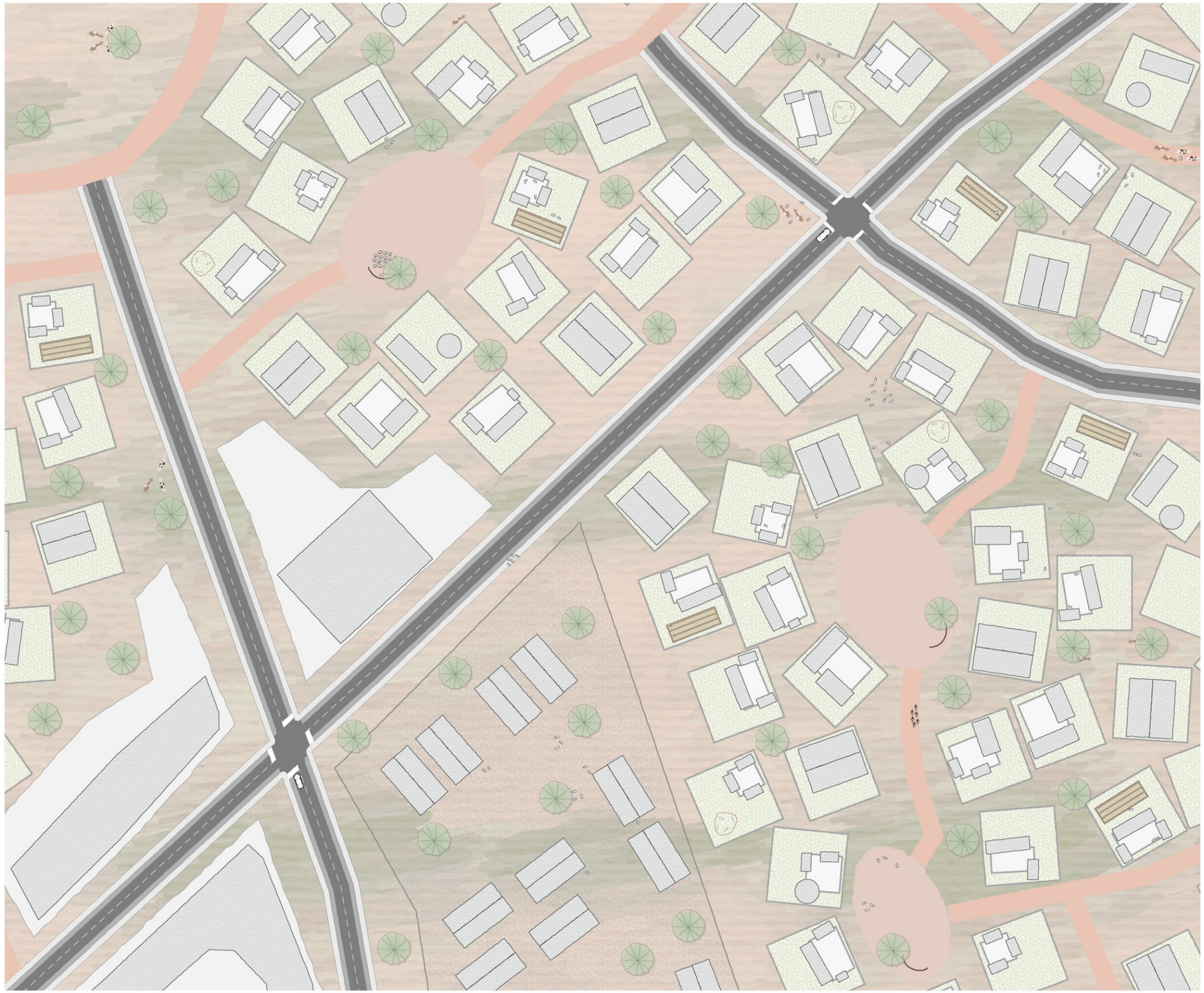

*Source: Author, (Google Maps, n.d.-i)*

# Sites and Services Development



# Overall Plan

# Zoom in



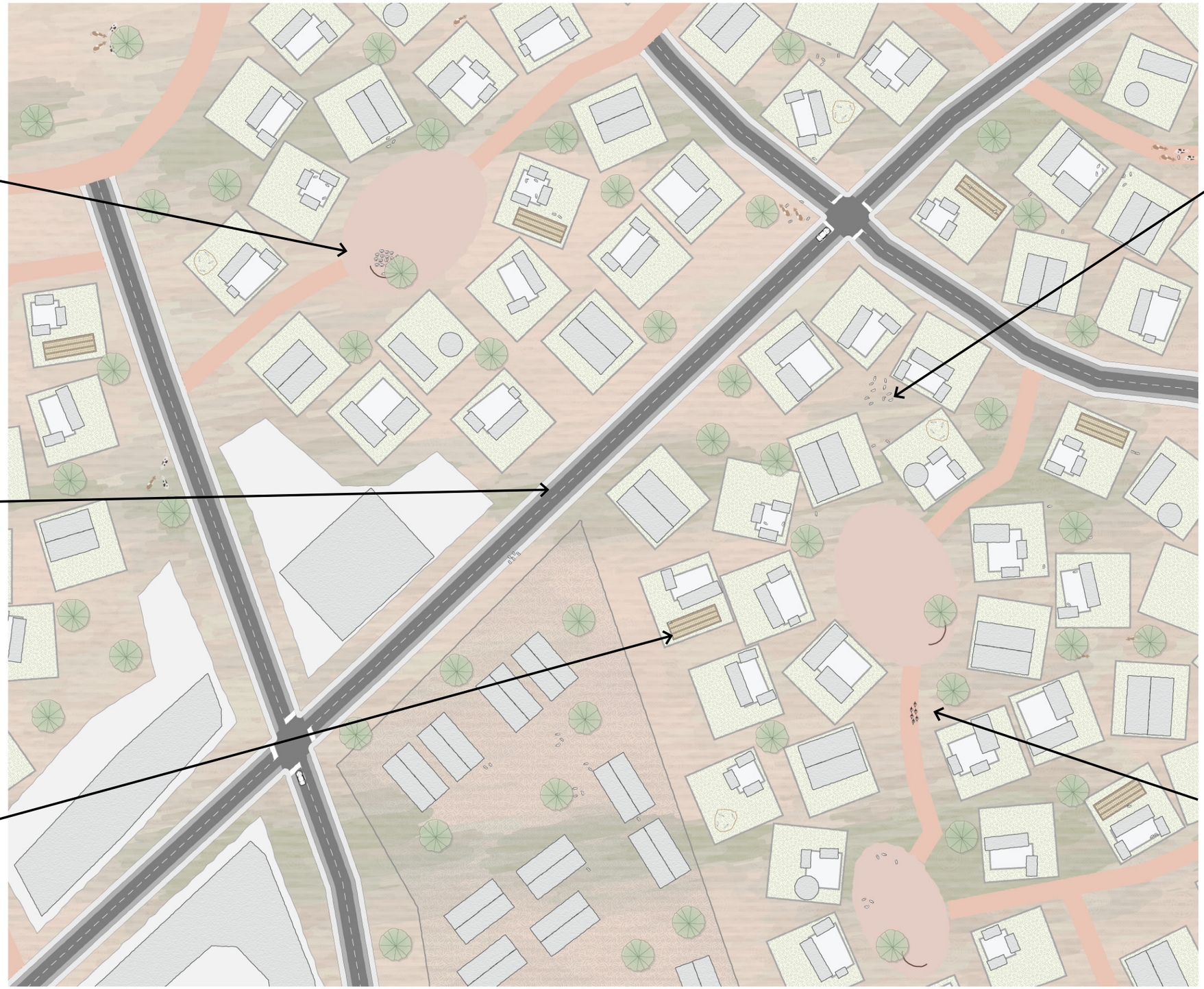
N

100m

Orientation around the patlelo and kgotla

Efficient infrastructure layout

Freedom to use land for different needs



Mini-open spaces form creating possibilities for different public interactions

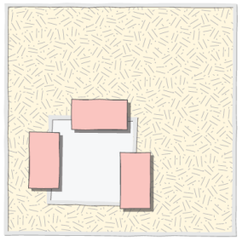
Space for children to play

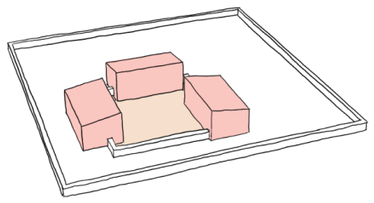
N

100m

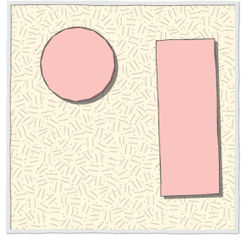
# Freedom and Variety

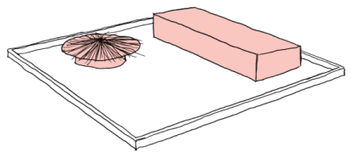
Traditional Layout with Lolwapa



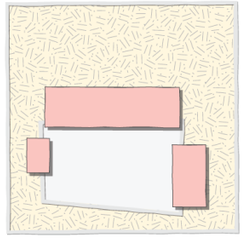


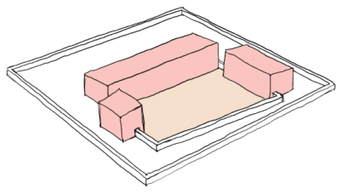
Modern and Traditional Styles



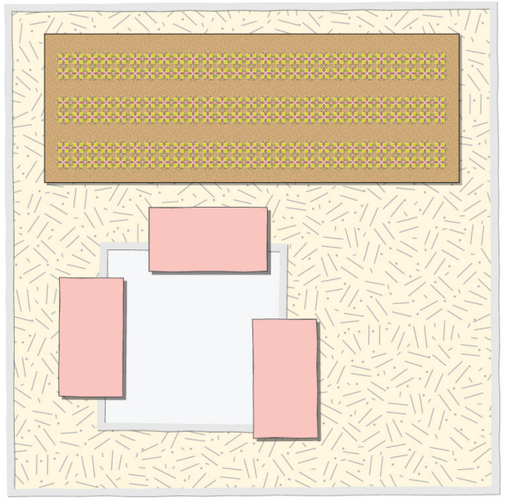


Quasi-Traditional with Lolwapa

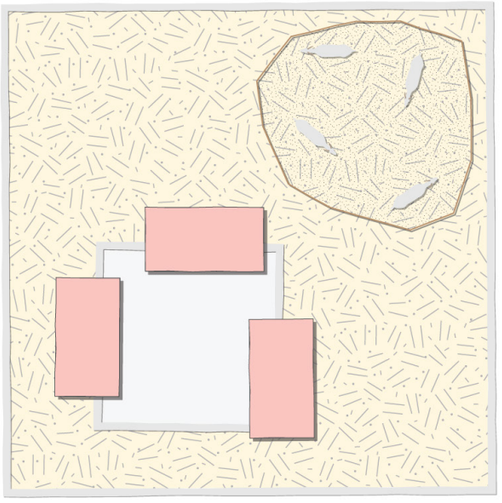




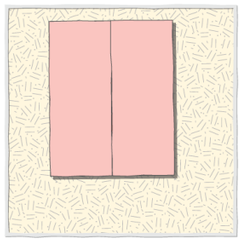
Agriculture

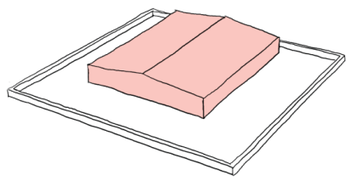


Animal Husbandry

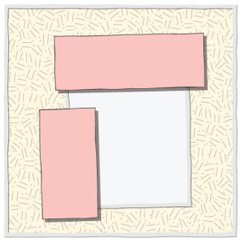


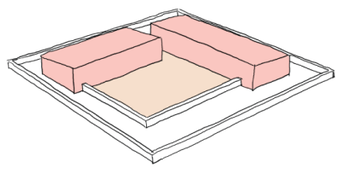
Large Modernist Style



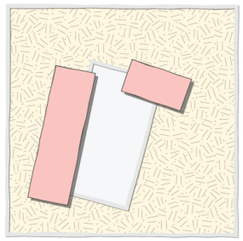


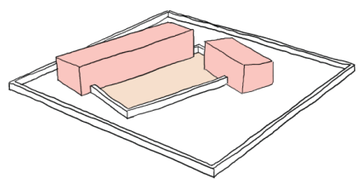
Large Buildings with Lolwapa



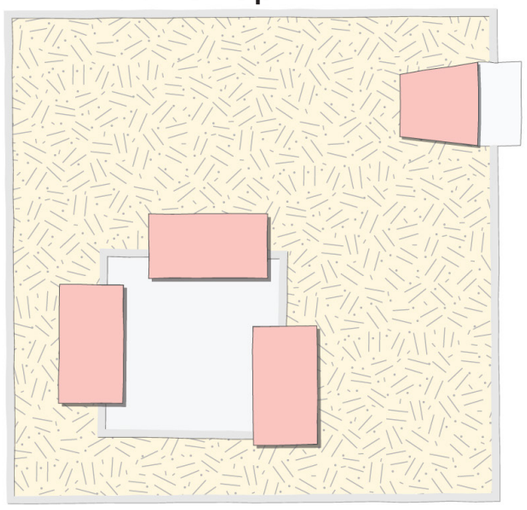


Medium Buildings with Lolwapa

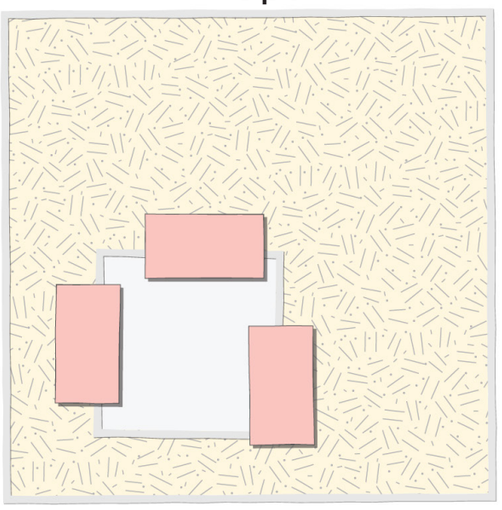




Tuck Shop



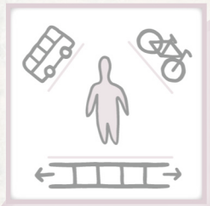
Open



# What is the point of a city?

Well Integrated Environments

Efficient Transportation



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Spatially Equitable

Harmonious Regional Functioning

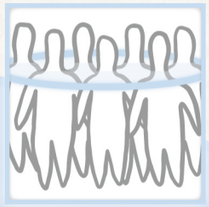
Enabling

Life Fulfilment Equity

Values

Development of Kagiso/Botho

Community Building



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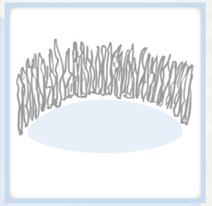

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Desirable Housing

Freedom

Promotion of Lifestyle Freedom

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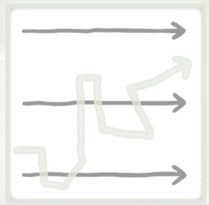

Seasonal Movement Normalized

Freedom to Utilize Land

Public Space Drives Kagiso

Thank You!

Go Leboga!