



**UNIVERSITY OF THE WESTERN CAPE**  
**INSTITUTE FOR SOCIAL DEVELOPMENT**

Title:

**Development planning for urban food and nutrition security: The need for 'food sensitive' planning in the City of Cape Town (CoCT)**

A mini thesis submitted in partial fulfilment of the requirements for the degree

**Master of Development Studies**

By

**Mihlali Hlomla Mtoto**

Student Number: 2961009

Supervisor: **Lauren Taverner-Smith**

Co-Supervisor: **Dr Camilla Adelle**

## Declaration

I declare that *Development Planning for urban food and nutrition security: The need for 'food sensitive' planning in the City of Cape Town (CoCT)* is my own work, that it has not been submitted before any degree or examination in any other university, and that all source I have used or quoted have been indicated and acknowledged by complete reference.

Name: Mihlali Hlomla Mtoto

Signed: .....

Date: .....November 2021.....



UNIVERSITY *of the*  
WESTERN CAPE

## Acknowledgements

I would like to firstly acknowledge the DSI/NRF Centre of Excellence in Food Security UWC for the financial assistance towards this research and my Masters studies.

I remain eternally grateful to my supervisor Ms Lauren Tarvener-Smith for your encouragements and undivided support. Lauren your belief in my writing and research kept me going in the most difficult of times. Special thanks to my co-supervisor Dr Camilla Adelle for not only the sound guidance and expertise, but also for her patience and dedication towards the completion of this study.

I would also like to acknowledge Dr Abdulrazack Kariem, Professor Bruno Lorch and Florian Kroll for earlier assistance in the conceptualising of this thesis. Advocate Nic Kock for your guidance and material support throughout my postgraduate career. Thanks to Ms Priscilla Kippie for creating a conducive and warm environment at the Institute for Social Development, UWC.

I'd like to acknowledge my Mom and Dad for the encouragements and unending support towards my studies. Completing my Masters with the both of you still alive to witness your sacrifices is an understated blessing.

To my siblings and nieces for unknowingly keeping me in check and holding me accountable for the decisions I make.

I'd like to also acknowledge Ms Noluyolo Ngodwana for being ever present at every breaking point of my life, for guiding and assisting me navigate through bouts of self-doubt, anxiety, and depression.

Lastly my friends, classmates, colleagues, and comrades for the enriching experiences I shared with each and every one of them.

## Dedication

To the hardened city Gogos and street vendors who raise their off-springs on nothing but maize and a hope for a better tomorrow



## Abstract

Food security along with poverty is often framed as a rural challenge requiring interventions on agricultural production to ensure that food is available for the country's households. This framing effectively neglects urban food and nutrition security and thus exonerates municipalities from following up on their responsibilities as enshrined in RSA constitution. With over 30% of South Africa's severely hungry population residing in the City of Cape Town, Johannesburg and Ekurhuleni it is surprising to see that municipalities are yet to include 'food-sensitive' policies in their development planning. The study's focus on urban planning, food policy governance and urban food systems importantly makes the case for distinct urban planning by municipalities, which will efficiently enable local authorities to better regulate and govern food systems within metropolitan areas. Thus, ensuring that food is not just available, but is also accessible to all people and is of adequate nutritional value. This study investigates and explores urban food security strategies like Urban Agriculture, which are excised by City of Cape Town urban planners to deal with the developmental challenge of urban food and nutrition insecurity. With the use of comprehensive desktop research on CoCT food related policies, this research is able to ascertain how food and nutrition of urban dwellers is understood and thus championed by development planners in the City.

**Key words:** urban food and nutrition security, urban planning, food-sensitive planning, local government, land use management, urban agriculture

## Abbreviations and acronyms

AFSUN	..... African Food Security Network
CRFS	..... City Regions Food Systems'
CoCT	..... City of Cape Town
CFS	..... Committee of world Food Security
CDS	..... City Development Strategy
DAFF	.....Department of Agriculture, Forest and Fisheries
FANTA	.....Food and Nutrition Technical Assistance
FAO	.....Food Agriculture Organization
FSP	.....Food Security Policy
FSN	.....Food Security and Nutrition
HLPE	.....High Level Panel of Experts
ICN	.....International Council of Nurses
IDP	.....Integrated Development Pan
IFSS	.....Integrated Food Security Strategy
MSDF	.....Municipal Spatial Development Framework
MPAP	.....Multi-stakeholder Policy Formulation & Action Planning
NCDs	.....non-communicable diseases
NPC	.....National Planning Commission'
NUA	.....New Urban Agenda
NPFNS	..... National Policy on Food and Nutrition Security
PHA	..... Phillphi Horticulture Area
SACN	..... South African Cities Network
SADC	..... Southern African Development Community

SPLUMA	.....	Spatial Planning and Land Use Management Act
UA	.....	Urban Agriculture
UN	.....	United Nations
UN DESA	.....	United Nation Department of Economic & Social Affairs
UNICEF	.....	United Nations International Children’s Emergency Fund
WCG	.....	Western Cape Government
WHO	.....	World Health Organization



## Table of Contents

<b>Declaration</b> .....	2
<b>Acknowledgements</b> .....	3
<b>Dedication</b> .....	4
<b>Abstract</b> .....	5
<b>Abbreviations and acronyms</b> .....	6
<b>Chapter 1. Introduction</b> .....	11
1.1 Background .....	11
1.2 Problem Statement .....	13
1.3 Rational of the Study .....	14
1.4 Aims & Objectives .....	14
1.4.1 Aim of the Study .....	14
1.4.2 Objective of the Study .....	15
1.5 Research Questions .....	15
1.6 Outline of the Dissertation .....	15
1.7 Summary .....	17
<b>Chapter 2. Conceptual Framework</b> .....	18
2.1 Introduction .....	18
2.2 Food Security and Nutrition (FSN): A conceptual understanding .....	18
2.3 Food Security & Nutrition Status: Six dimensions of food security .....	19
2.3.1 Availability .....	20
2.3.2 Accessibility .....	20
2.3.3 Utilization .....	21
2.3.4 Stability .....	22
2.3.5 Agency .....	22
2.3.6 Sustainability .....	22
2.4 Summary .....	23
<b>Chapter 3. Literature Review</b> .....	24
3.1 Introduction .....	24
3.2 Urban Food & Nutrition Security: A definition .....	24
3.3 Urban Food & Nutrition insecurity: Stunting, Obesity and NCDs .....	25
3.4 Urban Food insecurity determinants .....	26
3.4.1 Household Income .....	27



3.4.2	Food Price Stability.....	28
3.4.3	Spatial Access & Transportation .....	28
3.5	Urban Food Security & Planning.....	29
3.6	Food Security Absence in Urban Planning .....	31
3.7	Summary .....	32
<b>Chapter 4.</b>	<b>Research Methodology .....</b>	<b>33</b>
4.1	Introduction .....	33
4.2	Study Area.....	33
4.3	Data Collection.....	34
4.4	Policy Analysis .....	34
4.5	Ethical Considerations.....	35
4.6	Scope and limitation of Dissertation.....	35
4.7	Summary .....	35
<b>Chapter 5.</b>	<b>Planning instruments &amp; powers for Food Security and Nutrition .....</b>	<b>37</b>
5.1	Introduction .....	37
5.2	Urban Planning for Food and Nutrition Security .....	37
5.3	Municipal Planning & Food Security .....	38
5.4	Food Policy and Urban Planning: The Link.....	39
5.5	Urban Planner Roles in Food-System Planning.....	41
5.6	Planning approaches and instruments for addressing urban FNS.....	43
5.6.1	Food Charters .....	43
5.6.2	Food Asset Mapping.....	44
5.6.3	Spatial indicators .....	44
5.6.4	Zoning, Regulations and Land use planning .....	45
5.6.5	Multi-stakeholder Policy Formulation & Action Planning (MPAP).....	46
5.7	Unintended Consequences of Planning on Food.....	46
5.7.1	Overreliance on Agricultural Production .....	47
5.7.2	Retail Expansionism.....	48
5.7.3	'Clean-Up' Programmes: Informal Trader Relocations .....	49
5.8	Summary .....	51
<b>Chapter 6.</b>	<b>Cape Town Policy Context.....</b>	<b>52</b>
6.1	Introduction .....	52
6.2	Spatial Planning and Land Use Management Act (SPLUMA) .....	53
6.3	CoCT Integrated Development Plan.....	54

6.4	CoCT Municipal Spatial Development Framework (MSDF) .....	55
6.5	Land-Use Management Systems.....	57
6.6	City of Cape Town Informal Trading Policy .....	58
6.7	Urban Agricultural Policy for the City of Cape Town .....	59
6.8	City of Cape Town Resilience Strategy (2019) .....	60
6.9	Summary .....	61
<b>Chapter 7.</b>	<b>Discussion &amp; Findings</b> .....	<b>63</b>
7.1	Introduction .....	63
7.2	Research themes: Food Policy Outcomes.....	63
7.2.1	Policy Outcome 1: Food Availability .....	65
7.2.2	Policy Outcome 2: Food Accessibility.....	66
7.2.3	Policy Outcome 3: Food Utilization.....	67
7.2.4	Policy Outcome 4: Stability of Food.....	68
7.2.5	Policy Outcome 5: Agency .....	69
7.2.6	Policy Outcome 6: Sustainability of Food .....	70
7.3	What are the main policy and planning powers and instruments available to the CoCT to influence food? .....	70
7.3.1	Recommendation 1: Food Charters.....	71
7.3.2	Recommendation 2: Zoning and Ordinances.....	71
7.3.3	Recommendation 3: Food Policy Councils.....	72
7.4	How is Food & Nutrition Security understood in these powers and instruments?.....	72
7.4.1	Missing Urban FSN Mandate .....	72
7.4.2	Agricultural Productionist Approaches.....	73
7.4.3	Informal Trader Regulation.....	73
7.5	What opportunities are there for CoCT to increase its influence on Food Security & Nutrition?.....	74
7.6	Summary.....	75
<b>References</b>	.....	<b>77</b>

## Chapter 1. Introduction

### 1.1 Background

With African cities and towns expanding at rapid rates, the United Nations – Department of Economics and Social Affairs ( UN DESA 2012) estimates that a total of 41% of people in the continent now reside in urban areas. This number of urban dwellers is expected to rise as African towns and cities attract more people. Recent statistics in the case of South Africa reveal that over 60% of the population already stays in urban areas (Battersby et al, 2014). While urbanization as a process is believed to bring about social and economic development, the rapid urbanization experienced by Africa’s urban areas has come to be characterized by negative externalities such as unemployment, poverty, and food insecurity. Matuschke (2009) highlights that when areas become densely populated; a greater demand for food is created. This realization has aided international development organisation calls for the food security of urban dwellers to be prioritized by development planners and given specific attention outside of the global rural framing (HLPE, 2020)

Crush and Payne (2010) presenting an African Food Security Urban Network (AFSUN) study, report levels of food insecurity to be at approximately 76% across the 11 African Cities reviewed. The City of Cape Town according to this study has a total of 80% of its households which are food insecure (Crush and Payne, 2010). The collected AFSUN (2008) data further reveal what Battersby (2011) and others highlight to be disproportionately high levels of food insecurity in South African cities. Shisana et al (2013) documenting these high levels of urban food insecurity in SA highlights those levels are higher among urban informal areas. This posits a major developmental challenge for the country’s urban areas (Battersby, 2011). Yet as Satterthwaite (2011) notes, “the issue of hunger in urban areas has long been neglected as part of the more general neglect of urban poverty”.

Noting the seriousness of the food and nutrition security challenge in South Africa, at a national level the country’s National Planning Commission (NPC) regards Food Security as a “key shaping force” for South Africa (NPC, 2011, p 6). The NPC (2011) articulated by the then Minister in the Presidency (Planning, Monitoring and

Evaluation) Trevor Manuel, further noted “Food security, water security and rural development along with exercise, diets, nutrition and other preventative health areas” to be priorities for the NPC (p. 6).

Crush and Frayne (2010) reflect on how food security and poverty is framed by FAO, ILO as well as numerous governments to be primarily a rural problem requiring interventions on agricultural production to ensure that food is available. This framing effectively neglects urban food and nutrition security and thus renders hunger of poor urban dwellers and the urban food insecurity challenge invisible. Solutions to the noted challenge of food security as Battersby (2013) highlights have tended to be informed by rural experiences and have maintained a bias towards agricultural production hence the support for urban agriculture as a food security and poverty alleviation tool by city governments.

Albeit arguments that municipalities without a mandate to deal with food and nutrition insecurity, the constitution, according to De Visser (2019) lists “Trading regulation, markets and street trading” as within the competency of local government. These three competencies as enshrined in the constitution allow for local authorities to plan and be able to influence urban systems in a ‘food-sensitive’ manner. Municipal planning according to Berrisford (2011) is a key tool for local governments to be able to zone and control land use within city districts. The Spatial Planning and Land-Use Management Act (SPLUMA), along with the Municipal Spatial Development Framework (MSDF) that each local government is supposed to adopt, are some of the policy instruments which guide municipal planning and empower local authorities to be able to realize their role towards achieving food and nutrition security.

Land-use planning as a power which local authorities are bestowed with, is one of the more crucial roles that municipalities’ have which links directly to ensuring food security. Through land-use planning, municipalities according to De Visser (2019) can developmentally ensure that agricultural lands are efficient and productively used for food production. They can also ensure that disadvantaged communities have access to affordable and healthy foods by easing regulations on informal traders therefore being ‘food sensitive’.

'Food-sensitive planning' on that note, to Battersby and Watson (2018), refers to the recognition of urban food security as within the competence and influence of City governments and urban planners. With such recognition, local government can proactively influence food systems to ensure an equitable access to adequate and nutritious food for urban dwellers and the poor in line with section 27(1) (b) of the RSA Constitution (1996). Donovan (2012) highlights food systems to refer to "the chain of activities beginning with the production of food and moving on to include the processing, distributing, wholesaling, retailing and consumption of food and eventually the disposal of waste" (pg. 2).

### 1.2 Problem Statement

Estimates of a SANHANES survey documented in Shisana et al (2013) reveal that the amounts of people experiencing food insecurity are higher in urban informal areas than in rural areas.

With the COVID-19 virus outbreak further exacerbating hunger, IPSOS (2021) has revealed that almost a half of South African households go to bed hungry. This is consistent with Stats SA (2017) estimates which found that a very large share (25%) of households in the City of Cape Town, Johannesburg, and Ekurhuleni had inadequate or severely inadequate access to food. AFSUN (2008) document in this regard reveals a pattern of high levels of hunger among the cities' poor and low-income households (Battersby, 2015). The estimates on prevalence of food and nutrition insecurity within South African cities, City of Cape Town in particular, provide us with evidence that food insecurity in urban areas is of large significance. These high levels of hunger have reintroduced the issue of urban food insecurity as a key developmental concern for national and local authorities who are directly responsible for ensuring that the 'right to food and nutrition' as enshrined in the RSA constitution is a reality for all South Africans.

Since food is linked to several developmental concerns like health, unemployment, and poverty, it is surprising to see that local governments are yet to include 'food sensitive' policies in their urban development planning. To Battersby and Watson (2018), urban planning decisions are a major influence and shaper of food systems in the cities. Since these decisions include responding to the informality occurring in

urban areas, land use zoning and the distribution of infrastructure, urban planning decisions are without doubt determinants to food and nutrition outcomes in City food systems. Government through its framing of food insecurity as a rural and agricultural production problem has in turn shown their misunderstanding of the urban food and nutrition insecurity challenge. Local governments have as a result according to De Visser (2019) used this rural framing of food to exonerate them from acting to address the issue.

De Visser (2019) and Johnstone (2020) argue that although ensuring the right of access to food is believed to be a competency of national government, it is as much of a responsibility of local governments too.

### 1.3 Rational of the Study

Urbanization in South Africa and in the broader developing world has brought major developmental challenges for cities. Hunger and urban poverty have as a result become defining features of our urban city regions.

The study's focus on urban planning, food policy governance and urban food systems contributes to a literature gap in urban food and planning policy. It importantly also makes the case for distinct urban planning by municipalities which will enable local authorities to regulate and govern food systems within metropolitan areas. Thereby, ensuring that food is not just available, but is also accessible to all people and is of adequate nutritional value.

Looking into the City of Cape Town (CoCT) metropolitan municipality, this paper importantly provides for a study into what should be 'food-sensitive' urban planning; effectively looking at how it affects food systems through the production, consumption, and access to nutritious food at a local scale.

### 1.4 Aims & Objectives

#### 1.4.1 Aim of the Study

The purpose of this research paper is to primarily investigate how food and nutrition security of urban dwellers is considered within development policy and planning in the City of Cape Town (CoCT).

#### 1.4.2 Objective of the Study

To undertake this study, the following objectives must first be accomplished. These relate to:

- Establish the main policy and planning powers and instruments available to the CoCT to influence food
- Investigate how Food and Nutrition Security is understood in these powers and instruments
- Determine opportunities that are there for CoCT to increase and influence Food and Nutrition Security

#### 1.5 Research Questions

This research study investigates and tries to primarily respond to the following questions:

- (a) What are the main policy and planning powers and instruments available to the CoCT to influence food?
- (b) How is Food and Nutrition Security understood in these powers and instruments?
- (c) What opportunities are there for CoCT to increase its influence on Food and Nutrition Security?

#### 1.6 Outline of the Dissertation

Chapter 2: This chapter provides for an in-depth discussion on the conceptual framework to be used in the study for a better understanding of food security and nutrition (FSN). The study in this chapter discusses various organization and author views on what is meant when referring to the concept food security and nutrition

Chapter 3: The chapter sets out to discuss the research methodology employed by the dissertation to conduct this research. The chapter provides for a discussion on desktop research and on policy analysis as the methods chosen to respond to the study's research questions. It also provides for a breakdown on the area chosen to conduct the study as well as the method used for data collection method. It

concludes with noting ethical considerations observed in the study in order to ensure that the research topic is not insensitive or harmful.

Chapter 4: This chapter follows with a review of literature on urban food and nutrition security as well as urban planning relevant to the dissertation's research question. The chapter begins by outlining according to United Nation organizations' what is meant when referring to the concept of food security and nutrition (FSN). After providing for a discussion on dimensions of FSN, the chapter discusses urban planning and the link to food and nutrition security of urban households.

Chapter 5: This chapter discusses urban planning guidelines which set out the role of the city in championing urban food security as a critical component of sustainable urban development. The chapter highlights the link between urban planning and food policy, highlighting planning approaches and instruments available for urban planner to influence food. It also discusses consequences of urban planning that negatively impact on food and nutrition security.

Chapters 6: Following the discussion provided in chapter 5 regarding planning approaches and powers available to urban planners. Chapter 6 provides for a review of implemented policy, programme and/or frameworks at a local level as they relate to urban planning and urban food security and nutrition within the City of Cape Town. The Chapter offers a critique of current food related strategies as they appear to be misaligned with other planning instruments.

Chapter 7: Using the Food and Nutrition Security (FNS) conceptual framework established in Chapter 2 and the policies reviewed in previous chapter 6, this chapter discusses how food and nutrition security of urban dwellers is considered within development policy and planning in the City of Cape Town which is the aim of this study.

Chapter 8: The final chapter responds specifically to the study's research questions in order to satisfy the objectives of establishing the main policy and planning powers and instruments available to the CoCT to influence food; investigating how Food and Nutrition Security is understood in these powers and instruments; and determining opportunities that are there for CoCT to increase and influence FNS.



## 1.7 Summary

This chapter, noting recent surveys, reveals a higher number of people experiencing food insecurity in urban informal areas than in rural areas. With food and nutrition security fast becoming a challenge in towns and cities, this introductory chapter has highlighted that governments along with international organisations like FAO and ILO still view food security as a rural phenomenon requiring interventions on agricultural production. This rural and agricultural bias as highlighted in the problem statement, has been noted to effectively neglect the food and nutrition security realities of poor urban households and thus exonerating municipalities from acting on powers held to influence urban food and nutrition security. This chapter has highlighted, zoning, land-use planning and trading regulations as some key policy and planning instruments available to municipalities in order for them to ensure food-sensitive planning.

In order to satisfy the study's noted research objectives, the chapter has importantly also presented the purpose of the study as investigating how food and nutrition security of urban dwellers is considered in development policy and planning in the City of Cape Town.



UNIVERSITY *of the*  
WESTERN CAPE

## Chapter 2. Conceptual Framework

### 2.1 Introduction

This chapter provides for an in-depth discussion on the conceptual framework to be used in the study for a better understanding of food security and nutrition (FSN).

This study explores the various definitions on what is meant when referring to the concept food security and nutrition. A discussion highlights why it is crucial for urban planners to consider 'food-sensitive' urban development planning for achieving food security and nutrition in our cities.

Firstly, in order to undertake our discussion, we establish primarily according to Gross et al (2000), Weingartner (2004) Von Braun (2014) and the United Nations High level panel report (HLPE, 2020) the six pillars, which make up the concept of food security and nutrition.

### 2.2 Food Security and Nutrition (FSN): A conceptual understanding

According to the Committee on world food security (CFS) (2012), "*Food security is a situation that exists when all people, at all times, have physical, social and economic access to sufficient, safe and nutritious food that meets their dietary needs and food preferences*" (p 14).

Food security and nutrition described in Gross et al (2000) is when all people within an area have access to adequate food in quantity, quality, safety and that is socio-culturally acceptable for an active and healthy life at all times,

The accepted definition of food security, according to Von Braun (2014) and the HLPE (2020), with its focus on nutrition importantly combines food security and nutrition. It also importantly makes an emphasis on the six related dimensions such as the availability, accessibility, utilization, stability, agency and sustainability of food to register the fact that nutrition is an integral part for realizing food security. The following section discusses each of these dimensions in detail.

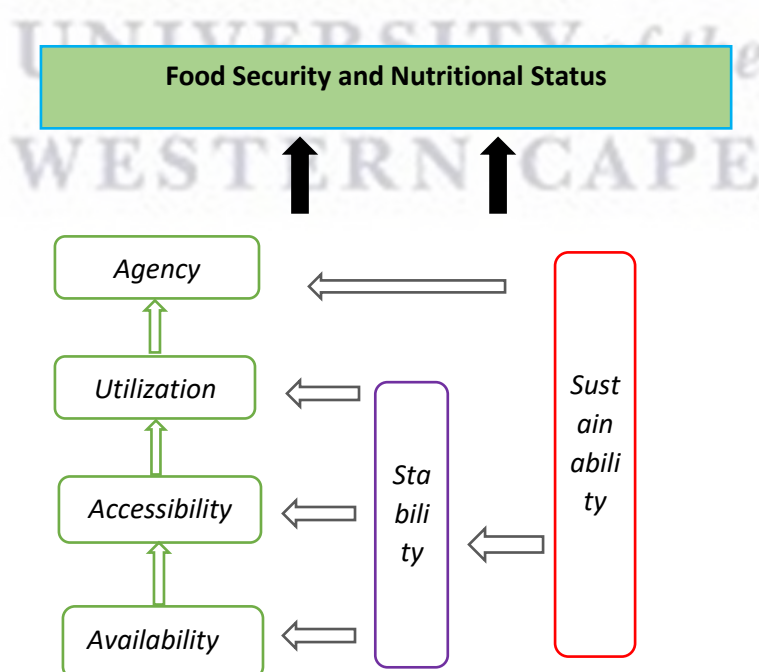
### 2.3 Food Security & Nutrition Status: Six dimensions of food security

According to Von Braun (2014) there exists a relationship among the dimensions of food security and nutrition. Observing this relationship is important to realizing food and nutrition security as a status, as May (2017) highlights, “food availability is necessary but not sufficient for access; access is necessary but not sufficient for utilisation; stability is necessary but not sufficient for utilization” (p 8). These four dimensions are crucial because they allow us to determine if an area is food and nutrition secure or if there is a lack thereof. To reinforce the internationally recognized ‘right to food’ and a ‘food-systems’ approach to food security and nutrition, the concept has evolved to include agency and sustainability as other dimension of food security (HLPE, 2020).

Agency and sustainability as new dimensions to widely accepted definitions of food security are however, according to the HLPE (2020), already implicitly considered in FSN definitions. The reference to ‘all people’ having food ‘at all times’ importantly signals for the dimensions of agency and sustainability within the food security and nutrition status.

Below figure 1 illustrates the food security and nutrition status

Figure 1: Food Security and Nutrition Status (Weingartner, 2004; HLPE, 2020)



Below we discuss all six aspects which make up the food security and nutrition framework.

### 2.3.1 Availability

In context of the conceptual framework of food security, availability of food according to Weingartner (2004) is commonly known to refer to there being enough food or food supplies physically at both national and regional level. FANTA (2006) which is the Food and Nutrition Technical Assistance and authors Madziakapita et al. (2004) all relate food security to there being consistently proper foods available in close or in reasonable proximity to the person and/or household. Simply analysed, food availability relates to the provision of food to all people at all times, to the HLPE (2020) availability means having the quantity and quality food needed to fulfil dietary requirement of individuals and/or households. Food availability is considered as achieved when there is enough food available for all people in an area on a consistent basis.

### 2.3.2 Accessibility

The HLPE (2020) describes food access as having the personal and/or household financial means needed to ensure that dietary needs of people are satisfied and not compromised or threatened in any way. Food access in this regard relates to there being enough resources for households and individuals to be able to obtain the right foods to meet their required daily nutritious intake. This dimension according to Riely et al. (1995) cited in Weingartner (2004) depends on both the level of household resources and on market prices for food. It basically refers to people having enough income or resource to be able get the required levels of nutritious food to maintain an adequate diet (FANTA, 2006). Tweeten and McClelland (1997) highlight here that food accessibility relates plainly to people being effectively able to acquire available food using earnings or whatever acceptable method of exchange. Food security in this regard is affected by a people's inability to access food, for instance should a people not be able to afford food or the necessary resource to grow their own then we are likely to experience a state of food insecurity.

The second crucial aspect of the accessibility of food dimension refers to the physical pillar of food accessibility. Here food accessibility is dependent on the presence of markets and the availability of infrastructure. Access to markets is one of the factors, which influence food security (Swartz, 2019). Caspi et al., (2012) considers poor physical access to food as a risk factor to food security, health and dietary outcome. This physical pillar of food accessibility has largely been conceptualised in reference to the poor geographic accessibility of low-income areas to grocery stores (Wrigley, 2002). As Wrigley (2002) posits, low-income individuals living in poorer areas or areas classified as food deserts have less access to affordable sources of healthy foods and as such are less likely to consume healthy foods. This highlights the connection between physical and economic access for food accessibility (Swartz, 2019).

Shaw (2006) also importantly adds that people with disabilities struggle with satisfying the physical pillar of food accessibility. While neighbourhood distance to food sources is by noted as a common barrier Suarez-Balcazar et al., (2016), people with disabilities as reported by Shannon (2016) frequently raised transportation as a barrier

### 2.3.3 Utilization

Food utilization according to FANTA (2006) happens when food is processed in an acceptable way and kept in proper storage. It is also when people are knowledgeable on child care and what constitutes a proper nutrition. Madziakapita et al. (2004) understands food utilization to simply be about the consuming of food which contains the adequate quality and quantity that has necessary nutrients in order to give energy to people. Benson (2004) notes in this regard that for people to enjoy healthy, activity filled and productive life, they must receive a sufficient and balanced diet which include “carbohydrates, protein, fat or calories, vitamins, and mineral fibre in their diets” (p 8). The above definition points to food utilisation to mean a food being used properly. Summarised by the HLPE (2020) utilization refers to “having an adequate diet, clean water, sanitation and health care to reach a state of nutritional well-being where all physiological needs are met” (HLPE, 2020, p.28)

#### 2.3.4 Stability

The fourth dimension making up the food and nutrition security framework is the temporal determinant of food stability. Stability refers to the duration that individuals or households experience shortages in food (Gross et al. 2000). To Klennert (2009) food stability is observed when household food and resource levels remain constant for the year and for longer periods. This definition considers insurance from transitory food shortages which may come as a result of droughts, floods or conflicts which have an impact on food security (Weingartner, 2004).

#### 2.3.5 Agency

Agency is a new addition to the evolving concept of food security and nutrition. It according to the High level Panel of Experts (HLPE) on food security and nutrition, refers to an individual and/or group's capacity to make own informed decisions on what foods they consume and what or how food is produced and processed for distribution in the entire food system (HLPE, 2020). In all, agency refers to a peoples' ability to influence and engage in the processes which inform food policies and govern the food system. Sen (1985) defines Agency as "what a person is free to do and achieve in pursuit of whatever goals or values he or she regards as important" (p 203). This addition of agency in this regard extends the definition of food security beyond the dimension of access signified by material resources needed to access food but also towards being empowered to make better choices about food and enabled into shaping the food system to meet their individual or group food preferences.

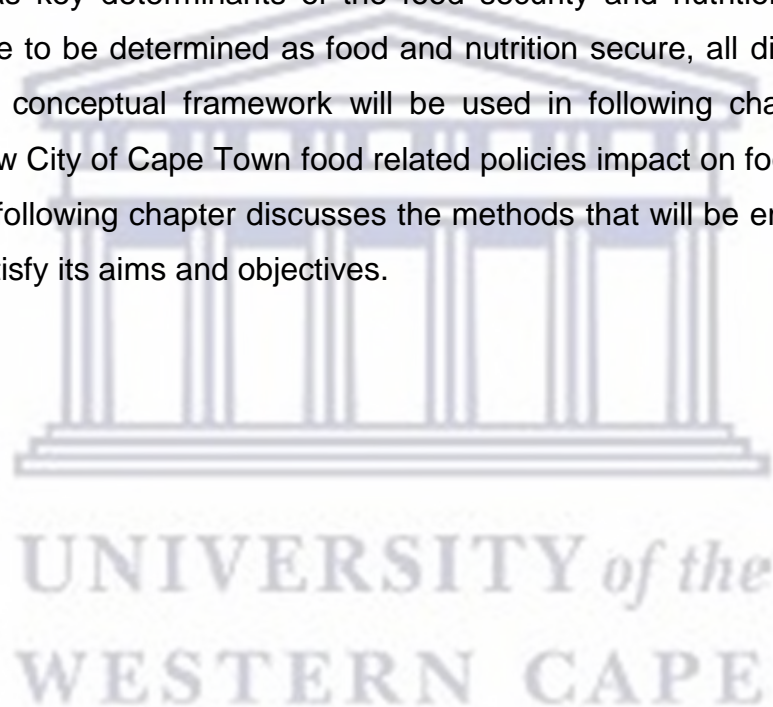
#### 2.3.6 Sustainability

Sustainability as the sixth aspect of the food and nutrition conceptual framework is widely documented in various food security literature as being integral to ensuring food security (HLPE, 2020). Sustainability as a dimension of food security is often a lead idea behind many policy programs; it refers simply to ability of food systems to provide food security and nutrition daily for a long-term without degrading the environment or undermining economic and social bases, which are also integral to ensuring food and nutrition security. The addition of sustainability to FSN is vital

because unlike the stability dimension, it stresses the longer-term ability of food systems to be able to resist disturbances like climate change that can compromise the food and nutrition realities of future generations. In all, sustainability to the HLPE (2020) is about ensuring that food requirements of current times are attended to in a way that will not in compromise food and nutrition security for future generations.

#### 2.4 Summary

This conceptual framework chapter has defined and presented the revised dimensions of food security and nutrition. The chapter as can be seen on figure 2 presents the six dimensions of availability, access, utilization, stability, agency and sustainability as key determinants of the food security and nutrition status. For a people or place to be determined as food and nutrition secure, all dimensions must be met. This conceptual framework will be used in following chapters to better understand how City of Cape Town food related policies impact on food and nutrition security. The following chapter discusses the methods that will be employed by this research to satisfy its aims and objectives.



## Chapter 3. Literature Review

### 3.1 Introduction

Below, this literature review provides for an in-depth discussion of literature relating to urban food and nutrition security, the causes, consequences as well as FNS' relationship to urban planning. Moreover, the chapter discusses urban planning roles for food and nutrition security.

To undertake this literature review, the chapter begins by following on the conceptual understanding of food and nutrition security as provided in the study's chapter 2, section 2.2 which describes food security as "a situation that exists when all people, at all times, have physical, social and economic access to sufficient, safe and nutritious food that meets their dietary needs and food preferences" (CFS, 2012, p 14).

### 3.2 Urban Food & Nutrition Security: A definition

According to the Breckenkamp et al (2015), the term 'Urban Area' though not clearly defined is mostly used to refer to cities, towns or built-up areas where dense populations reside in highly developed houses, with sophisticated buildings and good roads.

Urban food and nutrition security in the above sense simply implies that the particular city or town in question and its residents have access to safe and nutritious foods on a constant basis. The definition is consistent with the World Health Organization who notes food security to refer to the economic and physical access to food by all people and/or households so that they are enabled to sustain their daily needs and lead healthy and active lives (WHO, 2014). The above definition of WHO (2014) importantly categorizes food and nutrition security to include the ability for persons to access what is both culturally and personally acceptable foods, thus suggesting that people should be able to get access to food in socially fair and equitable ways which do not encroach on their human dignity. Ziervogel & Frayne (2011) understand food security to include broader components which extend further



than just the production of food, but also socio-economic factors which both directly and indirectly affect the food security reality of urban dwellers. The six aspects of food security in total discussed in previous sections include availability, food access, food stability, food utilization agency and sustainability (HLPE, 2020). An absence in one of these fundamental aspects of food security means that the area or person is not or cannot be classified as food secure.

### 3.3 Urban Food & Nutrition insecurity: Stunting, Obesity and NCDs

Urban Food & Nutrition insecurity continue to pose a clear challenge for the developing world. Some of the consequences of food insecurity include malnutrition, which according to Hamelin et al (1999) can lead to a number of effects like low energy levels, impaired cognitive abilities and weak immune systems.

With highly processed and/or pre-prepared fast foods making up a larger portion of urban diets, a triple burden of malnutrition exists which according to Frayne, Crush and McLachlan (2017), poses a significant threat to peoples' health. This triple burden of malnutrition as noted by Modjadhi (2019) refers to a contradictory coexistence of under nutrition, over-nutrition and micronutrient deficiencies in the same community observed at same periods. Under nutrition respectively categorizes adults and children who are underweight, stunted or thin, while over-nutrition is a state of obesity and being overweight as a result suffering from diet-related non-communicable diseases (Modjadji, 2019). In other words, the triple burden of malnutrition can be understood to refer to when there are underweight and/or obese adults and children in a community with various nutrient deficiencies as a result of their food choices and not necessarily food consumption or quantity. According to UNICEF (2018) in South Africa 27% of children below the age of 5 are stunted while 13% are overweight. The Western Cape Government (WPG) notes stunting rates in the province to be five times higher than in societies with equal levels of income and that non-communicable diseases are fast making up big portions of diseases in the province (WPG, 2018).

Spiers et al (2016) highlight non-communicable diseases (NCDs) to be a leading cause of death to people in both low- and middle-income countries. NCDs according

to WHO (2015) refer to strokes, cancer, heart diseases, diabetes and other respiratory diseases which are caused mainly by unhealthy diets, obesity and other risky behaviour such as tobacco use and no physical activity. Spiers et al (2016) documents how NCDs continue to impose an increasing burden to not only South Africa's health but on also its economy and development. The country was as a result part of the UN countries who in 2011 adopted a declaration classifying non-communicable diseases as not only a health concern but a major developmental challenge (Spiers et al, 2016).

Some of the adverse health related complications as presented by the triple burden of malnutrition which pose further developmental issues include individuals being unable to perform adequately or to actively participate in income generating activities. This automatically impacts on the urban economy and on the individual's ability to access food. As Battersby (2012) points out, in urban areas food insecurity is also a result of mostly the urban poor's difficulty with accessing adequate, nutritional and affordable food. Kroll (2017) notes in this regard that the accessibility and affordability of fresh and nutritious food is extensively informed by spatial positioning and the geographic layout of communities. This systematically disadvantages poor households who must spend more money and time on travel in order to get nutritious food.

#### 3.4 Urban Food insecurity determinants

As supermarkets rapidly expand to reach low-income communities, the issue of urban food insecurity is taken for granted as the assumption is that supermarkets provide people with access to a large range of cheap and nutritious food (SACN, 2015). Supermarkets and fast-food outlets in this regard are seen as supporting urban food security. However, what is overlooked in the availability of food in stores and markets is that this food is not as accessible to poor urban households as it is to middle- and upper-income residents. This according to Battersby (2016) is because supermarkets are inconveniently located far from the poor and that they sell highly processed foods in unit sizes which are not affordable to the poorest. As a result, to the Southern African Cities Network (2015) supermarkets are regarded as less responsive to urban poor household food needs than informal food retailers in form

of spaza shops and street vendors who are conveniently located in close proximity, sell affordable unit sizes, offer foods on credit and operate for longer hours (Battersby, 2016). AFSUN data on sources of food in Cape Town reveal that an overwhelming majority of citizens frequently get their food from small shops, takeaways and informal traders. This further exacerbates the challenge of food insecurity because these street vendors sell highly processed ready to eat foods which can lead to obesity (SACN, 2015).

Policymakers and urban planners tend to view the availability or supply of food items provided by supermarkets and fast-food outlets to mean that food is accessible to all. What they fail to take into account in this regard is that the constant supply of food is not accessible to all urban dwellers nor is it necessarily healthy. Furthermore, food access in this regard is often misunderstood to depend on household income. This consideration fails to appreciate food insecurity as a multi-faceted challenge affected by a wide range of determinants like food prices, geography, and the nature of urban food systems. As Eriksen (2008) reflects, urban food systems accordingly refer to the “set of activities and outcomes ranging from production through to consumption, which involve both human and environmental dimensions. While an insufficient income as noted in Battersby et al (2016) is a key determinant of food insecurity, it is not the only one causing a hindrance; below we discuss some of the determinants of urban food and nutrition security.

#### 3.4.1 Household Income

A clear indicator of food insecurity, as noted in previous chapters and highlighted by Peyton (2013) and Battersby (2012) is an individual and/or household's annual income. Income serves an important indicator because of the direct relationship it has with food insecurity as the other variable. As observed by Crush & Frayne (2010), in cities and towns most of the food is accessed through both formal and informal markets via cash transactions thereby meaning that urban residents need an income to be able to obtain food. Higher household incomes in this regard enable for households to be empowered to make better choice on types of foods to buy and/or where to buy them (Battersby et al, 2016). These choices are not the same for poorer households with less to no household incomes and as Battersby

(2011) highlights most urban poor dwellers spend the bulk of their monies on getting food. This is particularly the case in the City of Cape Town where it was noted that the urban poor spend approximately 53% of their household incomes on securing food (Battersby, 2011).

The high percentage of income spent on food and high prices of adequate and nutritional food certifies income as a key determinant to food insecurity in urban areas. As registered by Tacoli, Bhukari & Fisher (2013), a decline in terms of household incomes or an increase in food prices is bound to make a significant impact on urban food and nutrition insecurity.

#### 3.4.2 Food Price Stability

With access to food regarded only as an issue involving incomes, the second part of economic access to food which relates to food prices is often less acknowledged (Battersby et al, 2016). Food price stability is important since urban households purchase most of their food. This according to the SACN (2015) puts poor urban dwellers at risk of becoming food insecure should price increases erode their purchasing power. Battersby et al (2014) notes in this regard that inflation and food price increases tend not to be complemented by wage increases at the same rate. Heltberg et al (2012) also highlight that food price increases are awfully felt by low-income urban residents who mostly are employed in informal sectors which provide low and irregular pay.

The above makes the point as noted by Battersby et al (2014) that food prices are too an important determinant to urban food and nutrition security.

#### 3.4.3 Spatial Access & Transportation

According to Battersby (2012), some of the other determinants of food insecurity among urban dwellers include spatial access and transportation costs incurred by residents. Crush et al (2011) records a high estimate of urban dwellers household that get their food from supermarkets on a monthly basis. Supermarkets, through their low prices are believed to provide the urban poor with affordable and nutritious food. Thus assisting with household and individual food security of urban residents. This belief however undermined by the fact that even with the heavy supermarket

presence and expansion in the developing world; a majority of poor urban dwellers still rather source their food from informal markets and spaza shops on a daily basis (Crush et al, 2011). This according to Battersby (2012) is because supermarkets offer large quantities whereas in informal markets the poor are able to purchase in smaller quantities since storing of food for them is a challenge. Also, since informal markets work on credit systems, poor households are still able to access food albeit them not currently having the money to purchase (Battersby, 2012).

Because informal markets are unregistered or unrecorded food distributors, they are reasonably located close to where urban poor dwellers reside or work. Crush et al (2011) documents in this regard how food choices in the main are determined by several factors such as time, distance to be commuted and convenience in terms of what is cheap or readily available for consumption. Research according to Southcombe (2008) and Battersby & Peyton (2014) reveals that people who live in remote areas not well serviced by shops are most at risk to being food insecure. Roberts (2001) notes in this regard that food choices or habits are as a matter of fact influenced by spatial planning and the layout of our cities.

### 3.5 Urban Food Security & Planning

With food security having previously been conceptualized as a rural problem, government responses according to Battersby (2012) have mainly focused on increasing agricultural production through rural household farming. Of recent times however, governments have started to appreciate that although food security has been considered as a rural problem, rapid urbanization in the case of Southern Africa has meant that population growth in the urban far exceed rates in rural areas (UN-Habitat, 2010). These population growths have re-introduced the issue of food and nutrition insecurity as an urban challenge as much as it is a rural problem.

Consistent however with the framing of food security as a production and food shortage problem, the solution to the noted challenge of urban food and nutrition insecurity has been noted to revolve around urban agriculture. Crush et al (2014) highlights that urban agriculture is often advocated as an effective strategy for development because it carries the potential to serve as a poverty alleviation tool by

helping households be food secure while concurrently creating economic opportunity for members involved. In the face of widespread poverty, the growing of food is thus considered as a best strategy by lobbyists and agriculturists to addressing not just the poverty but also its far-reaching implications such as food and nutrition insecurity (Crush et al., 2014).

This approach in recent debates of food security has however been noted as inadequate because the food and nutrition insecurity challenge faced by urban areas has proven to be not just on production but also on the distribution and access of nutritious foods to all people. To Crush and Frayne (2011) strategies centred on agricultural production thus miss the point because they do not fully appreciate urban realities. Furthermore, as AFSUN (2008) data reveals, in the 9 surveyed SADC cities like the City of Cape Town, it is the wealthier citizens who benefit from urban agriculture and not the urban poor (Crush et al, 2014).

Coupled with the above, urban agriculture has also been criticized as an effective strategy for the poor because of the complex pre-conditions which must be met that come with a person growing their own food such as land, money and time (Battersby et al, 2014).

Due to the rural and production framing of food security, urban planners have not adequately engaged the issue of urban food insecurity (Morgan, 2009). City governments have as a result according to De Visser (2019) used this rural framing of food to exonerate them from acting to address the issue. Frayne et al (2014) argues in this regard that it is this misunderstanding of the food security which leads to a belief that the issue can be addressed via urban agriculture.

Denoon-Stevens (2016), Morgan (2015) and Steele (2008) aside from the traditional urban agricultural policies, note a recent emergence of food planning and spatial planning tools being used to address the challenge of urban food insecurity. As observed by Battersby (2012) and Cohen (2006) cities and food are now becoming increasingly understood to be important in the urban agenda.

### 3.6 Food Security Absence in Urban Planning

While Steele (2008) highlights, “in order to understand cities properly, we need to look at them through food” (pg. 10), and that planners have previously concerned themselves with necessities like water, food, shelter and air. Morgan (2010) argues that food and urban food insecurity are invisible to urban planners and policy makers leading to their exclusion from the global planning agenda. It is believed further that part of the reasons why urban planners have failed to address the issue of urban food security and the potential of food planning aside from the obvious traditional rural and productionist conception of food security is because “food is too big to see”.

Maxwell (1999) highlights that in African cities urban food security has been particularly invisible for three main reasons, the first being due the relative importance of food to what urban planners and policy makers consider as more immediate and pressing concerns such as unemployment, dilapidated infrastructure and poor social services. It is due to this reason that food security has gone unnoticed in the urban agenda.

Second reason why food has remained relatively ignored on the planning agenda relates to the systematic socio-economic manifestation of food insecurity in urban areas (Maxwell, 1999). Because urban food insecurity is not the direct result of agrarian seasonal changes like droughts but rather is affected by certain financial circumstances like a household having a stable income or not. This automatically also aides to the issue of urban food security being invisible to planners due to the glaring other socio-economic manifestations linked to it.

Thirdly, due to the traditional conceptions noted earlier of food insecurity and poverty being rurally focused and therefore requiring increases in food production to resolve. Current urban food policy interventions looking to alleviate the urban food insecurity challenge have all focused on addressing the issue of food supply through productionist approaches and have thus ignored an important dimension of food security which is food access to all people living in the urban context (Maxwell, 1999). Even if urban supply based productionist approaches to food security make a

significant impact, they importantly neglect a crucial aspect therefore not solving the insecurity challenge faced by urban dwellers.

Aside from the three reasons of why urban food security remains a stranger to urban planning, Morgan (2009) note various ways in which planning commissions like the American Planning Association have started to make amends for what is described as a puzzling omission of food in the urban planning agenda (Morgan, 2009). However, as Battersby et al (2014) notes with the issue of urban food security becoming more visible in the planning agenda, responses to urban food insecurity need to equally address the systematic nature of political and socio-economic contexts in our cities as well as the spatial realities of each city.

### 3.7 Summary

The study in this literature review has extensively discussed urban food security and nutrition, its causes, and the adverse health related developmental challenges presented by food insecurity.

Among the determinants of urban food insecurity, the vast scholarly contribution on the subject list spatial access and transportation as a cause. This clearly makes the case for food to be integrated into planning. Urban spatial planning involves city decisions on land-use, zoning, and transportation among other capabilities which help shape the functioning of municipalities. Literature discussed in chapter 3 further document how food has historically remained puzzlingly absent in the urban planning agenda, it also importantly establishes urban food and nutrition insecurity as a major developmental challenge facing urban areas as much as it does rural areas.



## Chapter 4. Research Methodology

### 4.1 Introduction

The following section provides an outline of the main research approach and methods used to conduct this study. This part, otherwise known as the research methodology, is simply described by Kothari (2004) to refer to the plan for collection, measurement and analysis of data in a way that enables for the objectives of the study to be met. Research methodology to Mouton (2001) is the part in the research process which describes the tools used and procedures followed in order to undertake data collection.

To fully recognize the research objectives and to respond adequately to the research questions discussed in the previous section, this dissertation uses a qualitative approach research and employs a policy analysis approach to compare and ascertain strengths and weaknesses of the various policy options which directly affect food and nutrition security realities of people in the City of Cape Town. The chosen approach allows for the study to identify which policies should be given preference to better address food needs of citizens in relation to food and nutrition security.

### 4.2 Study Area

The study has been conducted in the City of Cape Town (CoCT) (see figure 2) with a specific attention on low income households.

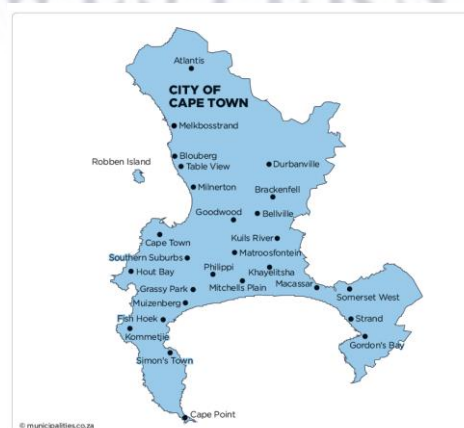


Figure 2: City of Cape Town Municipality (CoCT, 2020)

### 4.3 Data Collection

Data in this qualitative approach is collected via desktop research, and through a policy analysis as the second method.

Desktop research is a research method that involves the use of already existing data (Hox, 2005). Existing data is summarized and collated to increase the overall effectiveness of research. Goodwin (2012) suggests that it is data gathered from important sources without doing fieldwork.

To further support our desktop research and to strengthen the study, a policy analysis has been selected to provide the researcher with another efficient and effective way of gathering data. This method has been chosen in the study for its ability to provide background information and supplementary research data which will prove useful in contextualizing our research within its topic. To Browne et al (2018) policy analysis provides researchers with an understanding on how and why certain policies are enacted by governments. As Oluwole-Oni (2016) notes, a policy analysis is an enquiry whose main purpose is to guide decision-makers into selecting better policies. It does this by generating detailed information on existing or proposed policies so it can provide well informed recommendations that deal directly with noted challenges.

### 4.4 Policy Analysis

The information gathered from the study's policy analysis will be categorized in order for themes and similar patterns to be illustrated using the conceptual framework of food security and nutrition as discussed in chapter 2. Policy outcomes which focus on key dimensions of food security and nutrition, like the availability, accessibility, utilization, stability, agency and sustainability of food are analysed in the study's policy analysis chapter. This technique allows for the data gathered to be interpreted for meaning. Information gathered from the policy analysis guides and equips the study with better understanding on which policies work best and are better suited for the varying contexts in the City of Cape Town.

#### 4.5 Ethical Considerations

Prior to conducting this research, an ethics consent form was submitted to the Higher Degrees Committee of the University of the Western Cape to ensure the research topic was not sensitive or harmful to human research subjects. The study obtained ethical consent to do semi-structured interviews, however due to the none response of the CoCT to providing research participants, the study in the end only conducted a policy analysis, which does not require research involving human subjects.

#### 4.6 Scope and limitation of Dissertation

This study undertakes to investigate how the food and nutrition security of urban dwellers in the City of Cape Town is considered within development planning in the city.

To arrive at an understanding, purposive sampling for semi-structured interviews with City Officials whose function impact food and nutrition security of Cape Town households was envisioned. The study applied for ethical permission to conduct semi-structured interviews with CoCT officials but however did not receive a response. The outbreak of COVID-19 further made conducting of face-to-face interviews difficult and may have diverted the attention of city officials to other matters.

The study owing to this conducts only a policy analysis of all relevant policy and strategies which relate to urban planning and food & nutrition security of urban households.

#### 4.7 Summary

This methodology chapter has extensively discussed the research methods employed by the study to conduct our research and meet research objectives as discussed in chapter 1. While semi-structured interviews had been originally chosen for the study, this chapter discusses the used method of Desktop research/secondary data which enabled for background information to be gathered

on the subject, and a policy analysis which allowed for recommendations to be made in order in order to guide future City of Cape Town policy decision making.

The following chapter uses secondary data as our first method of data collection to ascertain how urban planning and its planning approaches can be leveraged to influence food and nutrition security realities of urban dwellers.



## Chapter 5. Planning instruments & powers for Food Security and Nutrition

### 5.1 Introduction

As Haysom (2014) highlights, food has remained absent in the urban political agenda due to National and Provincial governments being the authority entrusted with implementing food policy. This is coupled by the productionist approach adopted through support of Urban Agriculture. This chapter below provides for a discussion on how food can effectively be added on to the urban planning agenda.

This chapter discusses urban planning guidelines like the New Urban Agenda (NUA, 2016) which set out the role of the city in championing urban food security as a critical component of sustainable urban development (Battersby and Watson, 2019). The NUA takes on a state led approach to planning that assumes laws and policies are better suited to controlling markets and communities (Watson, 2016). Since spatial planning decisions of urban authorities are some of the biggest influencers behind what people choose to eat. Spatial planning decisions on land-use zoning can easily lead to specific areas dominated by fast food outlets, convenience stores and/or fresh food markets.

As Battersby (2012) notes, the location of these fresh food markets or food stores play a leading role in shaping urban dweller food habits which are most often based on what is cheapest among the food stuffs sold. The influence which spatial planning has on food choices among urban dwellers identifies the fact that urban planning plays a key role in urban food security and nutrition.

### 5.2 Urban Planning for Food and Nutrition Security

Urban planning according to Pothukuchi & Kaufman (2007) is often claimed as an all-encompassing, future orientated and comprehensive exercise driven by the public's best interest to improving lives of all in the community. Included in urban planning's all-encompassing capability are decisions on land use planning, zoning, transportation planning, environmental planning, and economic development. Urban

planning in all to Pothukuchi & Kaufman (2007) encompasses how the various planning functions in the city all interact with each other.

Evident however in what is regarded as urban planning has been the clear absence of food in the planning agenda. As identified by Pothukuchi & Kaufman (2007), the urban food system is not regarded in city planning agendas and as such municipalities are believed to not hold a clear mandate on urban food issues. Battersby (2012) registers in this regard that a lack of mandate in urban food security makes it difficult for city authorities to respond to the food and nutrition insecurity challenge. De Visser (2019) however highlights various ways in which municipalities through urban planning and other competencies can influence and change food realities of urban citizens on a daily basis. Morgan (2009), Pothukuchi & Kaufman (2007) all agree that the urban food system because it is entrenched to other systems on the urban planning agenda like public health, energy, social justice, land and economic systems, is able to provide vital support towards life in the city.

If the noted claims of urban planning being future orientated and comprehensive in its approach to urban development are to be taken seriously, then urban planners must realize their responsibility of ensuring that food requirements of urban citizens, as well as access, and their distribution needs are met.

### 5.3 Municipal Planning & Food Security

As the RSA constitution section 151 to 164 details, it is the role of municipalities “to ensure the provision of services to communities in a sustainable manner, to promote social and economic development; to promote a safe and healthy environment; and to encourage the involvement of communities and community organisations in the matters of local government...” (RSA, 1996) The above competencies allocated to local governments as they relate to the urban food system include offering the following public services; energy and gas reticulation, water and sanitation services, municipal public transportation, refuse removal, solid waste disposal and municipal planning. Local governments are also equipped with a competency of regulating of private markets, through introduction of measures for street trading, licensing of informal food traders (De Visser, 2019; Haysom, 2014). Municipal planning or town

planning as noted by Berrisford (2011) involves the power by local authorities that enables them to plan and manage the use of urban land. It is regarded by De Visser (2019) as one of the most important competencies of local government. Town planning according De Visser & Poswa (2018) is a municipal function which provincial and national governments may not interfere with. For instance, in South Africa, the Spatial Planning and Land Use Management Act of 2013 (SPLUMA) is one of the more critical pieces of legislation which categorises and regulates the division of power between the national, provincial and local branches of government (De Visser, 2019). Municipal planning as highlighted in SPLUMA (2013) contains two important components of municipal planning which relate to realising the right to food and more directly the role that municipalities are to play in achieving food and nutrition security.

The first component relates to the local adoption of what are regarded as forward-looking spatial development plans, this is in form of a Municipal Spatial Development Framework (MSDF). The MSDF which is essentially a policy document details the spatial development vision of that specific municipality (De Visser, 2019). It further serves to inform land-use decisions and guide future infrastructural investments to be consistent with the MSDF.

The second component relates to municipal power to determine land use in a municipality (De Visser & Poswa, 2018). This is when municipalities determine what is permissible in areas through zoning and land use restrictions. Basically, with this second component of municipal planning, local authorities are empowered by SPLUMA (2013) with determining land use rights. According to De Visser (2019) municipal decisions on determining and enforcing of land use rights are an important tool for urban municipalities to improve on urban food insecurity.

#### 5.4 Food Policy and Urban Planning: The Link

De Schutter (2014) exploring the link between food and urban planning highlights how before the 2000s, the food system had previously been foreign to cities and local government's urban planning agenda. Sonnino (2009) reaching this same conclusion asserts how it is the rural-urban divide among other factors like the lack of a holistic approach towards sectoral planning and decision-making, which have

been responsible for misleading urban planners and policymakers. This consequently causing a disjuncture between Cities, urban planning, and the needs of urban residents, which include the need for nutritious food as an essential ingredient of life. According to Raja et al (2017), national surveys conducted on members of the American Planning Association (APA), which is the biggest association of urban planners in the United States, revealed that urban planners were starting to view food as a high priority issue in urban planning. Hodgson (2012) agreeing with the above highlights that although a few urban planners are actively involved in the planning and strengthening of food systems, Cities and regions had now begun the integration of food in official planning. Neuner et al. (2011) highlights how municipalities in this regard can implement these plans and strengthen food systems through the building of physical infrastructure and an increase in public expenditure which is related to food. This according to the authors can also be done through the enactment of bylaws (Neuner et al. 2011).

To Cabanness and Marocchino (2016) some cities, particularly in the global north have come to better understand the benefits which come with integrating food and planning. Local governments with this growing recognition of food as a key priority for urban citizens, instead of just making financial investments and/or building physical infrastructure, have started incorporating food into their planning agenda through making and prioritising comprehensive plans such as zoning and regulation (Cabanness & Marocchino, p. 48, 2016). There are several policy and planning documents which have been created internationally like the Milan Urban Food Policy Pact. The pact which has 209 Cities including Johannesburg and Cape Town as signatories provided a significant milestone in fostering the gap between food and urban centres. By starting with policy and planning, the pact importantly proposes a set of 'interdisciplinary and inter-institutional' measures which cities can undertake to curb persistent rates of food insecurity (Cabanness & Marocchino, 2016). As noted in the Milan Urban Food Policy Pact (2015), food policies share a close link with many other challenges faced by urban citizens like poverty and health. Secondly, the pact by highlighting signatory cities' intentions to, "provide healthy and affordable food to all people in a rights-based framework, that minimise waste and conserve biodiversity while mitigating impacts of climate change", importantly introduces a



rights-based approach to food security that had only previously been advocated by food-advocacy organizations, and not considered by cities and/or local governments.

The second of important milestones reached at an international level in bridging the gap between food policy and urban planning is the New Urban Agenda (NUA) adopted in 2016. The NUA as adopted in Quito proclaimed food and nutrition security as an essential part in the Declaration on Sustainable Cities and Human Settlements. Some key topics relating to food security that feature in the NUA included the promotion of urban planning and design instruments in order to strengthen food system planning and the promoting of public spaces to booster urban food and nutrition security (Cabanness & Marocchino, 2016).

The two milestones achieved in relation to urban food and nutrition security as discussed above provide us with evidence that food is less foreign to urban planning as was before the year 2000. Planning guidelines like the NUA as noted by Battersby and Watson (2019) further make a link between urban planning and urban food security policy. The NUA (2016) in paragraph 51 specifically advocates for the use of urban spatial frameworks, urban planning tools and policy in order to strengthen food systems. Albeit this, food system planning has however remained uneven across cities of the global south and north. The one challenge which remains regarding better integrating food into urban planning is converting the noble intentions listed in declarations into practical solutions on the ground which influence better food systems.

### 5.5 Urban Planner Roles in Food-System Planning

Food Systems as noted by the City of Hamilton (2014) and Tendall et al. (2015) comprise of the complex set of activity and relationships within the food circle which involve the growing, production, distribution, marketing, retail, preparation, consuming and disposal of food. Food systems according to FAO (2013) are also importantly about people and institutions who in main are the ones who initiate and inhibit changes within the food system. This aspect therefore makes inclusive food-system planning an essential part. Blay-Palmer et al. (2015) explaining City Regions Food Systems' (CRFS) conceptualization of urban food system planning, details how the approach is driven by planning-related policies that prioritize health

and sustainable development. As highlighted in previous sections and noted by Morgan (2009), there is a deep connection between health and food. This connection in context of urban food systems leads to the realization that urban planners have an important role to play with regards to designing sustainable measures that address obesity. This for instance can be done by availing and making accessible nutritious food outlets and creating public spaces where physical activity like running, walking and cycling can happen. This, as noted by Cabanness and Marocchino (2016) is one way to facilitate planning towards influencing urban food systems so that non-communicable diseases in totality are addressed.

Iliev (2016) adding on the above registers how food system planning has turned into a social innovation that brings different people in form professional planners, architects, researchers and social activists so as to engage the food system and achieve its main purpose of caring for people in cities. The noted characterization of urban food systems as complex and multi-scalar leads to the realization that challenges faced cannot solely be addressed by urban planners, but rather as could be seen in Bangkok, it required a cooperation among the different actors all involved in different stages of the food cycle. Bangkok's food system, according to Boossabong (2017) is made up and driven by relevant actors from public agencies, planning think-tanks, food corporations and informal sectors. The coming together of different actors in Bangkok, prove how food system planning is indeed about multi-stakeholder participation, with the community being as active in the process as professional urban planners.

This understanding about urban food systems planning is important because it registers the point about urban planners not being solely responsible for coming up with measures and tools in form of policy documents. Rather, that their more central role is that of being guardians who formalize and connect the myriad of actors and sectors in a participatory way that produces outcomes in in form of food charters, strategies, land use plans and zoning regulations which are widely accepted and can be passed and Implemented at a city of municipal level.

## 5.6 Planning approaches and instruments for addressing urban FNS

As Cabbennes and Morrachino (2016) note, there have been over the years several planning tools designed to influence food systems. These tools and instruments, discussed below, provide with evidence that there is sufficient technical expertise to address food and nutrition security challenges. The instruments highlighted in this section offer to urban planners planning steps which can be taken to address challenges faced at different stages in the food system (Cabanness & Marocchino, 2016).

### 5.6.1 Food Charters

Since emerging in Canada, Toronto (2000) and Vancouver (2007), food charters have stretched to several cities in the United States like North Carolina with the Durham Region Food Charter (2010) and in Michigan with the Good Food Charter (2010). In the United Kingdom, the London Food Charter (2010) was formulated while in Australia the Victorian Good Food Charter (2013).

Food Charters according to Battersby and Watson (2014) assist with framing food planning interventions within “an overall initiative to address food system governance at a local level”. They according to Cabbennes and Moracchinno (2016) are crucial tools for food systems planning. This is because food charters detail mid-term or long-term goals of the City. To the City of Hamilton (2014), the food charter is a summary of the “vision of values, principles and priorities”, which have been noted and accepted in a collaborative and inclusive process with different actors of the food system. This vision formulated through consensus building among actors, importantly then helps with noting the basic tenants which serve as a guide to the formulation of food strategies/plans. In Simcoe County, aside from the city’s food charter working as a food policy document, it also serves as a guide for decision-making as far as improving local food systems are concerned (Simcoe County, 2012).

### 5.6.2 Food Asset Mapping

Food asset planning to Baker (2014) is a strength-based approach towards food and nutrition security. Its main goal is documenting a community's existing resources such as land, institutions, individuals, and other food networks which serve as positive assets in the food system.

As noted by Baker (2014), food assets relate to existing food infrastructure within a municipality which is used for maintaining the food and nutrition security of that region. This food infrastructure within cities often includes farms, food processing and distribution networks, food enterprises, markets, food retail, community gardens, nutrition programmes and community food-based organizations and centres (Baker, 2014). Food asset mapping is about providing an overview of the city's strengths with regards to food and nutrition security. This is important because it not only provides crucial data needed to fully understand food systems, but also highlights the different roles and contributions made by private, public and community actors. Food asset mapping and land mapping have proved as useful tools in several cities where they have been tested and developed. Mazzuza et al. (2009) testifies that in Rosario, Argentina land mapping not only identified areas in which food activities could take place but also informed municipal plans. Baltimore's food environment map, developed with the intention of addressing inequalities in the access to nutritious foods is another example of food asset mapping. As noted by Misiaszek et al. (2018) the process used in Baltimore included identifying geographical areas

### 5.6.3 Spatial indicators

Another set of instruments which could serve as useful to planners and assist food actors in decision-making are what Carey (2011) refers to as deprivation maps. The multiple deprivation maps as used in Bristol spatialize areas or wards in order to visually reflect which areas are most deprived and which areas can be considered as well off. This approach as highlighted by Cabanness and Marocchino (2016) is similar to Belo Horizonte's Index of Urban Life Quality, there only difference being that spatial indicators deprivation maps detail a community's quality of access to nutritious foods.

As suggested above, the maps are very useful because they equip planners with the necessary information to better inform municipal decisions around food zoning and land use planning. They also play a key role in informing both public and private sectors of where their financial investments are most in need. Lastly, spatial indicators are beneficial because they allow for monitoring effectiveness of municipal food plans in implementation and for enabling us to judge if the access to nutritious food is improving.

#### 5.6.4 Zoning, Regulations and Land use planning

Zoning and land use planning are some of the practices most known to urban planners. They according to the World Bank (2016) represent planning instruments of control which serve to regulate built environments by dividing land and sanctioning certain land uses on specific sites. This allows for planners to structure the layout of towns and cities. Zoning as an instrument of land-use planning in New York is used for determining locations, sizes and use of buildings in the city (City of New York, 2015). The main purpose of zoning is to empower relevant authorities with the ability to control and make land regulations which guide property markets and make sure there are complementary uses of land (World Bank, 2016). Zoning and planning processes as highlighted by De Visser (2019) are a competency of local governments in form of municipalities in South Africa. This according to the World Bank (2016) is the same in both Australia and the United States. Municipalities in this regard are the ones responsible for creating legal frameworks in form of zoning regulations or zoning ordinances. Zoning ordinances according to the World Bank (2016) refer formally to land-use policies which apply to the different parts of land in a municipality. They importantly distinguish what is permissible or not among the different land types and can serve as safety regulation to limit people building on flood plains and wetlands. By formally categorising permitted land for residential, commercial, and manufacturing use, city authorities according to the Victorian State Government (2008) are able to achieve desired planning outcomes and support policy directions.

### 5.6.5 Multi-stakeholder Policy Formulation & Action Planning (MPAP)

Highlighting the role of regional and city planners in engaging urban food systems, Morgan (2013) notes that it has become clear that for cities and local governments to address urban food and nutrition insecurity, the involvement of not just professional planners, but a wide range of people from various sectors, social movements, research centres and government departments is a necessity. As noted in the discussion on Food systems planning, this participatory approach to planning is because challenges faced in the food cycle require the different actors as mentioned to resolve. Participatory planning as an approach has been used in countries like South Africa, Zimbabwe and in Zambia.

The multi-stakeholder policy formulation and planning (MPAP) approach is a broad community and multi-stakeholder process designed as an instrument for planning and policy formulation (Bellwood-Howard et al. 2016). It includes among stakeholders; urban planners, NGOs, researchers, informal traders and different parties who reflect the various actors of the food system (Dubbeling et al. 2011). The MPAP approach by bringing together the various competing interest within the food system to identify challenges and plan for solutions importantly gives a sense of ownership to all stakeholders on the city's urban agenda. While assessments done on MPAP's validity in cities like Beijing, Bulawayo and Cape Town reveal the approach to be beneficial (Veinhuzen, 2016), one of the challenges which remains as noted by Cabanness and Marocchino (2016) is maintaining the same energy displayed in the planning and policy formulation stages right to the stage of implementation.

### 5.7 Unintended Consequences of Planning on Food

While it has been highlighted in previous sections that multi-stakeholder led policy and planning interventions in food systems are necessary for ensuring the urban food and nutrition security of citizens, the participatory approach in countries like China, Zambia and South Africa has been concerned more with regulating informal traders for food safety reasons. Cohen (2014) highlights that urban planners often tend overlook the negative consequences which come from zoning, regulations, and

land use planning on food. As noted above, planning and policy approaches of urban planners as excised through zoning and spatial planning has focused overwhelmingly on three approaches. Below we discuss each of the planning and policy directions which have been pursued by local governments which have been deemed not suited to the task. The first of these approaches relates to urban government's heavy reliance on urban agriculture as a policy tool for achieving urban food and nutrition security.

#### 5.7.1 Overreliance on Agricultural Production

As discussed in earlier sections of this study, the framing of food insecurity as shortage and rural problem has resulted in government responses being centralised around agricultural production. This has thus led to urban agriculture (UA) being an official policy in a number of cities in Africa like Cape Town, Johannesburg and the world (Battersby, 2012). Mougeot (2005) defines UA as the industry in and/or on outskirts of towns and cities, which produces processes and distributes a diversity of food and non-food products. It is broadly defined by the City of Cape Town (2007) as "the cultivation, processing, marketing and distribution of food crops and products in an urban environment and for the benefit of urban residents" (p. 3). UA activities as noted by Cabannes (2012) take place in houses, pavements, balconies, on vacant plots, around residential areas, near railways.

Due to its potential to positively contribute on not just food security, but to income generation, social inclusion, economic development and to environmental conservation (Dubbeling et al, 2010), (Thom & Conradie, 2012), UA receives many endorsements from local governments as a dominant policy and planning approach to the challenge of urban food insecurity.

Battersby et al., (2015) however highlighting AFSUN (2008) surveys notes that the percentage of urban dwellers engaged in farming activities are extremely limited with around only 5% in Cape Town and 9% in Johannesburg of people sourcing their food from self-production. Secondly, as suggested by Burger et al. (2009) and Warren et al. (2015), evidence supporting claims that urban agriculture makes a significant impact on food and nutrition security is too little. Battersby et al. (2015) looking at case studies of UA in South Africa, concludes that UA is of limited

importance, this is further supported by Frayne et al (2014) who argue that UA for low-income households is not an effective food security strategy as only 2.3% of low income areas sourced any food from own production opposed to 10% of high income areas which did.

The limited evidence of UA's contribution to urban food and nutrition security along with the small percentages of low-income citizens participating and benefiting from it leaves one considering if indeed urban agriculture as a dominant policy position is not a sign on inappropriate planning. Cabanness and Marocchino (2016) suggest here that we instead consider UA as a catalyst in the early stages of food system planning.

### 5.7.2 Retail Expansionism

As noted in the above discussion on urban agriculture as a primary planning and policy tool, Zezza and Tasciotti (2010), Crush and Frayne (2011) highlight that despite continued focus on it by policymakers and urban planners, evidence backing its central claims to address food insecurity, improve nutrition and increase dietary intake is weak. Battersby and Watson (2016) highlight that although overwhelming policy and planning support is on UA, a vast majority of urban residents source their food from retail outlets. The food retail sector is made of both formal and informal trading markets, with formal traders in form of supermarkets while informal retail is in form of street traders and small general stores located typically in residential areas (Spazas) (Battersby & Watson, 2016).

Research noted by Crush and Frayne (2011) highlight a rapid supermarket growth in Southern African countries. Tustin and Strydom (2004) suggest in this regard that post 1994 improvements to physical infrastructure brought by government's intention to develop townships economically, along with market deregulations, have made large retail trading feasible in many townships. To van Wyk (2004) the growth in disposable incomes among African consumers has contributed in making township markets appealing for formal retail in form of supermarkets. This to Acquah et al. (2014) has led to a transformation in the way urban residents source their food. Weatherspoon and Reardon (2003) reveal that as supermarkets expand into urban Africa; their products are distributed to both high-income and food-insecure



households. The AFSUN survey as noted by Battersby and Watson (2016) highlights how in an area of Gaborone for example, 92% of a low income residents used supermarkets as a source of food.

While supermarkets have made it easy for urban poor citizens to get a large range of goods at bulk and low prices which are produced and distributed under safer standards, Battersby and Peyton (2014) highlight that the increased presence of supermarkets has altered urban food diets by selling highly processed foods and not necessarily fresh produce. Battersby (2012), Wiggins and Keats (2015) document in this regard that low income households are getting more exposed to high-energy foods which are however nutritionally deficient. The fact that increased access to food means urban households maybe consuming enough food is undermined by the type of food they consume which as noted by Battersby and Watson (2018) may lack the required protein and micro-nutrients needed for good health and development. Further, as noted in earlier discussion on urban food and nutrition security, it is owing to these diets that malnutrition, obesity and non-communicable diseases like diabetes are increasing (Battersby & Watson, 2018).

Formal traders often enjoy more implicit privileges in terms of regulation and planning than do informal traders (Bamu & Theron, 2012). Supermarkets according to Ledger (2013) also have an additional government-sanctioned market advantage whereby social grant recipients receive monies at supermarkets. However, despite the rapid increase in supermarkets, the implicit privileges in planning and the state-sanctioned financial advantages that they receive, informal food retailers remain important in supporting urban food security (Abrahams, 2010).

### 5.7.3 'Clean-Up' Programmes: Informal Trader Relocations

Cardoso et al. (2004) argues that policy and planning approaches to informal trading have been driven by ideological and normative perceptions about urban poverty and informality. As Song and Taylor (2016) note, street vendors have in some cities across the globe been associated with filth, degeneration, and backwardness. As such a common policy and planning response to them in African Cities has been the removal and relocations from central areas (Battersby & Watson, 2014). This approach has had a negative consequence to urban food and nutrition security,

leading to calls for planning to move beyond forcing street vendors to vacate public spaces (Song & Taylor, 2016). Spatial planning and rezoning decisions are concerned with cleaning up cities, promoting urban agriculture and locating retail supermarkets in food insecure areas. These decisions have not generated positive outcomes as expected on the food system. This is due to the fact as documented by Crush & Frayne (2011) that a vast majority of urbanites source their food informally.

Informal traders as noted by Battersby and Crush (2014) are extremely flexible in nature and thus are able to occupy all sorts of spaces. Street traders as noted by Battersby et al (2011) are well dispersed in and around low-income areas, transport interchanges and outside shopping centres. Further research noted by AFSUN reveal that in light of heavy supermarket presence in cities, along with low outputs presented by UA as primary policy, informal traders play a critical role towards food availability (Battersby & Watson, 2018). The clustering of informal traders outside shopping centres and around transport areas testifies to the fact that supermarkets are not offering low priced goods in form of fresh produce or meat (Bamu and Theron, 2012). The ability of informal traders to provide affordable and suitably packaged products (general, meat, fresh produce, prepared meals and livestock) to low incomes households is often underestimated. Informal traders as noted by Battersby and Watson (2018) as a result are most targeted by government regulations which attempt to disperse or expel them from public areas. This is often done under clean-up programmes which in Hangzhou as highlighted by Zhou (2016) are concerned with replacing informal street food retailers with formalised markets which are organised and placed in specific locations.

The above to Battersby and Watson (2018) is associated with continuing attempts in African cities that seek to formalize, modernise, and relocate informal traders. These planning approaches according to Skinner and Haysom (2016) usually undermine the feasibility of informal traders. In Blantyre when large scale informal trader evictions begun, Riley (2014) notes that households could no longer access cheaper food retailers, this immediately reshaping urban poverty.

## 5.8 Summary

This chapter building on the established importance of integrating food into the urban planning agenda, has presented according to literature key tools and approaches available for urban planners to positively influence food and nutrition realities of urban households.

Since food choices and urban diets are influenced by spatial planning decisions, this chapter argues that urban planners need to play an active role in identifying best ways for fostering healthy food choices by using spatial planning to ensure that all people have access to adequate and nutritious foods. Despite clear evidence that food is central for urban life and that urban food security is impacted by urban planning decisions like transportation and land use planning as discussed above. Urban planners according to Morgan (2009) have not fully understood the consequence of their planning decisions on the food system, and as such have not yet developed functional mechanisms to deal with the challenge. This chapter as a result presents food charters, food asset mapping, spatial indicators, MPAP along with better zoning, regulation, and land use planning as some key planning approaches which can be taken to address challenges faced at different stages in the food system. The chapter also importantly documents potential negative consequences of urban planning like the extensive support for agricultural production, supermarkets' and the formalization/relocation of informal traders.

Empirical studies conducted on three cities reveal that poor household obtain their food for different sources, such as asking from neighbours, informal stores or local supermarkets (Battersby and Watson, 2019). Battersby and Watson (2019) reveal that there is little reliance on urban agriculture or on self-grown food supplies. Dynamics effecting formal and informal traders are further documented by Battersby and Watson (2019) as largely influenced by urban planning and governance issues which can be addressed by local governments.

## Chapter 6. Cape Town Policy Context

### 6.1 Introduction

Following the discussion provided in chapter 5 regarding planning approaches and powers available to urban planners for positively influencing food and nutrition security, chapter 6 provides for a review of policy, programme and/or frameworks at a local level as they relate to urban planning and urban food security and nutrition within the City of Cape Town.

The City of Cape Town (2019) has come to acknowledge that systemic risks and possible disruptions in the food system are not adequately addressed in current policy and planning program interventions, this as noted by Haysom (2014) is due to the absence of a consolidated municipal food governance vision. The City attempting to better understand the complex nature of the urban food insecurity challenge, commissioned a study on Cape Town's food systems and the extent of food insecurity in the city (Battersby et al., 2014). With this study the city was hoping to gain oversight on all the key actors involved in food security and to understand 'what role local government needed to play in the food system'. While many of the findings of this report have been extensively discussed in previous chapters, particularly the determinants of urban food insecurity and fact that many poor communities sourced their food from both formal and informal retailers. The study report revealed that through better management of spatial planning and decisions involving land use, economic development, the informal sector, and community health services there were various ways in which the CoCT could directly and indirectly influence the food system in its entirety (Battersby et al., 2014).

The following section, cognisant of the local governments constitutional mandate, importantly discusses the Spatial Planning and Land-Use Management Act of 2013 (SPLUMA), the CoCT Integrated Development Plan (IDP), the CoCT Municipal Spatial Development Framework (MSDF), along with land-use systems as adopted by City of Cape Town. The study below documents some of the policy objectives which guide municipal planning and empower local authorities to be able to realize their role towards achieving food and nutrition security in the City of Cape Town.

## 6.2 Spatial Planning and Land Use Management Act (SPLUMA)

The Spatial Planning and Land Use Management Act of 2013 is the legislation which places responsibility for municipal planning on the hands of local government (SPLUMA, 2013). As a national framework law, SPLUMA highlights planning powers held by the different levels of government and serves as the legislative instrument to regulate spatial planning and land use management. The DRDLR (2014) which is the custodian government department for SPLUMA highlights that the introduction of the act brought about several crucial changes to municipal planning and land use management. The reiterating of the sole mandate of municipal planning being placed with municipal authorities is example to some of the fundamental changes which came with SPLUMA (DRDLR, 2014)

As it relates to Food Security, SPLUMA has five development principles, namely the principle of spatial justice, the principle of spatial sustainability, the principle of efficiency, the principle of spatial resilience and the principle of good administration (WCG, 2016).

The principle of spatial justice according to the WCG (2016) is mainly about equity and justice, it therefore focuses on redress and inclusion, emphasising redress for disadvantaged areas and informal areas which are specifically vulnerable to food insecurity (Johnstone, 2020). The Informal food sector which as discussed in chapter 5 as particularly restricted and excluded from public spaces, is protected under the principle of spatial justice. The second principle which of spatial sustainability takes on an environmental focus and is about increasing the capacity of the state, sustainable food systems and functional land markets. This principle requires that unique and prime agricultural land be protected when spatial planning and land use decisions for land developments are taken. This crucial consideration thus makes the important link to food security. The third principle of efficiency is mainly about good governance, optimising the use of resources and limiting negative impacts. This principle requires that municipalities make best use if existing resources and infrastructure, thus resonating with a food systems approach (Johnstone, 2020). The principle of spatial resilience according to the WCG (2016) is about sustainable livelihoods and the resilience against economic and

environmental shocks. The principle demands that spatial plans, policies and land use systems be flexible to ensure that communities are viable. SPLUMA according to Johnstone (2020) with the principle of spatial resilience envisions less stringent regulations and mixed land use in township areas. The last development principle of the SPLUMA is the principle of good administration; this principle is premised on the White Paper on local government (1998) and focuses on procedural fairness. The principle prescribes the use of integrated planning and adherence to the spatial planning and land use management act. The principle of good administration as contained in SPLUMA instructs municipalities to take decisions which give effect to IDPs and MSDFs as forward planning instruments.

Several concerns regarding SPLUMA have however been raised, the SACN (2015) for instance documents how insufficient capacity among certain municipalities causes a challenge in terms of implementing requirements of SPLUMA. Another challenge which limits the legislation's full effectiveness is fact that SPLUMA'S development principles are broad and unlike ordinances are perceived less stringent so therefore cannot be legally enforced. Municipal Planning Tribunals which are a requirement of SPLUMA are also noted to have a few potential limitations ranging from funding challenges, administrative burdens and the legal status of the planning tribunals (SACN, 2015). The wording of specific clauses contained in SPLUMA is raised as another concern because legal challenges can be mounted to hamper the implementation of the legislation.

### 6.3 CoCT Integrated Development Plan

The Integrated Development Plan (IDP) is a five-year plan known as local governments' main planning tool. The White paper on Local Government (1998) refers to the IDP as a central planning tool for transformation. The integrated development plan is regarded by the CoCT (2013) as the city's main planning document which overlooks all planning and development happening in the municipality. As noted by Battersby et al (2014), it aligns the political mandate of local government to the objectives as set out in the National Development Plan. Goals relating to food security enshrined in the NDP include addressing all identified obstacles in food value systems. Past and present Cape Town IDPs have however

only tended to engage food security in the city ‘through the lens of urban agriculture’ (SACN, 2015, pg. 62). Owing to fact that a food systems approach requires integration and bottom-up planning and involvement, municipalities are instructed by the Municipal Systems Act (2000), to consult with local communities in developing the Five Strategic Focus Areas (SFA). The SFAs serve as guideline pillars to how municipal officials are to develop the City of Cape Town. These pillars refer to the Opportunity City, the Safe City, the Caring City, the Inclusive City and the Well-Run City. ‘The Caring City’ strategic focus area of the City of Cape Town according to SACN (2015) is one pillar which considers food through the urban agricultural policy (2007). The food gardens policy (2013a) which envision that food gardens will have a positive impact on food security by providing nutritious foods to urban communities at early childhood development facilities (CoCT 2013a, pg. 4). While ‘The Opportunity City’ strategic focus area aligns with the CoCT Informal Trading policy adopted in 2013 sets out how authorities respond to informal trade sector which plays are vital role on urban food and nutrition security

The participation of communities in IDP planning has however been questioned, with plans criticized as not reflecting the needs and aspirations of communities (Alebiosu, 2006). This is coupled with other implementation challenges such as integrating and coordination among levels of government (Drimmie, 2016). Drimmie (2016) further documents that there appears a lack of alignment between municipal IDPs, Strategic Development Frameworks and other core municipal plans. This is particularly the case in the CoCT wherein city housing developments are approved on land classified in municipal plans as areas of agricultural significance. Having the right capacity and resource needed to oversee IDP interventions also remains a challenge.

#### 6.4 CoCT Municipal Spatial Development Framework (MSDF)

As required by legislation set out in SPLUMA, each sphere of government must compile Spatial Development Frameworks (SDFs). A Municipal Spatial development framework (MSDF) as noted by SPLUMA is the local direction-giving and coordination mechanism. MSDFs provide the mechanism whereby the development principles of SPLUMA should find expression and applied in the spatial context. In

essence, each municipality is required by SPLUMA to prepare SDFs that are representative of all relevant policies and plans, that provide a guide for planning and development decisions of all sectors of government. Municipal SDFs must further provide the direction for strategic developments in the municipality, guide infrastructural investments and highlight areas which must be prioritised for investment in land developments (SACN, 2015). Thirdly, MSDFs are required by SPLUMA to “determine a capital expenditure framework for the municipality’s development programmes depicted”.

In all, municipal spatial development frameworks at a local scale are required to guide and contribute in the integration, coordination and alignment of development principles and plans coming from the various sectors of government. Due to SDFs forming part of the Integrated Development Plan as an essential component and being legislated by both SPLUMA, and the Municipal Systems Act of 2000, SDFs are no longer regarded as just guidelines, but are legally recognised policy documents.

As City of Cape Town MSDF 2017/2022 relates to food and nutrition security, policy statement 26 prescribes that for the city to promote food security, it should “protect valuable agricultural areas, viable farmed areas from urban encroachment, and support urban agriculture” (CoCT, 2017, pg. 147). The CoCT (2018) identifies the Phillippi farming area as an ‘Area of Agricultural Significance’ (AAS) due to its unique soil and high potential for contributing towards food security. As such the CoCT municipal spatial development framework makes a case for urban agriculture to be given a formal status by being included in land use management and physical planning of the city.

The MSDF binds and guides municipal authorities from taking any planning and land-use decisions which depart from the MSDF.

De Visser and Poswa (2016) however document that municipalities are often slow and sometimes do not follow their own regulatory planning instruments. The CoCT has not been able to protect the Phillippi Horticulture Area from urban encroachment as prescribed by the MSDF. This is a challenge particular for urban food security in the City of Cape Town which is supported by the Phillippi farming area.



## 6.5 Land-Use Management Systems

Land use Management refers to the systems which determine how land is used and developed in an area. Land use management systems are a collection of formal policies, processes and procedures used to oversee development in the city. The purpose of land use management systems is to provide guidance to decision-makers ensuring that development decisions are consistent and comply with relevant policies. It is a responsibility of municipalities and simply ensures what gets built and/or developed in a certain area. According to the City of Cape Town's Development Management Unit, the department which manages and directs development within Cape Town, each property in the City is subject to a set of regulations in form of planning by-laws. This responsibility is carried out by the City through zoning as one of the ways.

Land in the city for planning purposes is zoned; zoning as described in chapter 4 determines what is permissible on land units in an area. It also makes it possible for municipalities to regulate the use and development of land, ensuring that development happens in an organised and sustainable way. The collection of land and development rights and regulations are referred to as zoning schemes. The zoning scheme is important because it involves a zoning map informing of all zoning for individual properties, a zoning register indicating what is permissible where and lastly the Municipality's development management scheme. It is through a zoning scheme that City officials can control the way in which Cape Town will grow and develop while also allowing for the protection of the natural environment. As it relates to food and nutrition security, land-use management, and physical planning in the CoCT as briefly mentioned in above sections, are geared towards supporting and promoting urban agriculture and food gardens.

However similar with limitations identified in SPLUMA, the CoCT IDP and MSDF in previous sections, the municipality's capacity to adhere and enforce own zoning regulations remains a challenge. The second limitation is based on land use systems only focussing on the production aspect of food.

## 6.6 City of Cape Town Informal Trading Policy

The CoCT Informal Trading Policy approved by the city council in September 2013 defines informal trading as “the trading of goods and services in the informal sector by persons/enterprises who are not registered or incorporated in terms of the corporate laws of South Africa” (City of Cape Town, 2013b). Battersby et al., (2018) document that 40% of retail sales in South Africa are handled by informal markets, marking the informal sector’s contribution to the country’s GDP to between 8% and 10%. Evidence noted by Skinner and Haysom (2016), Rogan and Skinner (2017) suggest that the informal retail is made up of 67% of street traders who sell food. In Cape Town, a Charman et al., (2012) study in Delft mapping over 800 small businesses found that 64% were selling food. Under apartheid informal trading was prohibited from city streets. It has however come to be acknowledged in South Africa and is given recognition in the City of Cape Town through the CoCT Informal Trading Policy which “recognizes the key role that informal trading plays in poverty alleviation, income generation and entrepreneurial development” (City of Cape Town, 2013b).

The CoCT Informal Trading policy envisions a “thriving informal trading sector that is valued and integrated into the economic life, urban landscape and social activities within the City of Cape Town”, while its mission is for the city to “facilitate access to job and entrepreneurial opportunities within the informal trading sector” (City of Cape Town, 2013b, 8). As far as the functions of spatial planning and urban design, along with land use planning are concerned, the policy requires city officials to identify suitable trading areas for the allocation of space for informal trading in line with CoCT spatial development frameworks. Due to the principle of ‘proper use of City property’, the policy advocates for an appropriate level of regulation enforcement by the CoCT while expecting informal traders to “abide by laws for the comfort, health and safety of the public” (City of Cape Town, 2013b, 13). Laws as noted by the CoCT (2013b) include the registration and paying of permit fees by all informal traders in order for them gain permission to operate within the city.

The informal Trading policy has been widely criticized and noted by informal traders as a policy focusing on regulating rather than empowering informal traders

(Battersby et al., (2018). The policy is also exclusionary in the sense that it introduces an economic barrier to trading in the form of permit fees which every trader must pay in order to get an informal trading permit. Despite overwhelming evidence on the importance of informal food retailers to urban food and nutrition security, the CoCT informal trading policy focuses only on it as a livelihood strategy (Battersby et al., (2018).

#### 6.7 Urban Agricultural Policy for the City of Cape Town

Urban Agriculture in the City of Cape Town (CoCT) is widely accepted as the state's main intervention on urban food and nutrition security (Battersby, 2012). Since the adoption of Urban Agriculture as a policy in 2007, the CoCT has supported and promoted urban agriculture because of their belief it can play an important role in poverty alleviation and economic development. "This will be done through the inclusion of urban agriculture as a multifunctional component in municipal land planning and standard development processes concerning land use and environmental protection, i.e. land use plans, zoning schemes and site development plans should provide for urban agricultural activities" (CoCT, 2007, 4). The city as a result employs this dual approach to urban agriculture where on the one side its focus is on improving household food and nutrition security while simultaneously on the other side contributing towards job creation and income generation (CoCT, 2007).

Urban Agriculture as a result of its noted benefits (job creation and income generation), is formalised in the City of Cape Town and included in the City's Land Use Management and physical planning. Strategically the policy links and is integrated with other programmes and strategies like the urban gardens for poverty alleviation strategy, urban renewal initiatives and other skills development and farmer support programmes. Understanding the importance of coordination and integration in order to achieve food security, the policy establishes urban agricultural consultative forums, which consists of all relevant stakeholders of urban agriculture. To eliminate contradictions among the various sectors of government and their policies, this policy advocates for the building of strategic partnerships. Lastly, the policy enables for the releasing of municipal land for agricultural use.

While the above all assist with improving urban agriculture and making it more sustainable, surveys (AFSUN, 2008), (Battersby et al., 2014) discussed in earlier chapters reveal that percentages of urban dwellers involved in urban agriculture are extremely limited with approximately only 5% in the City of Cape Town. Evidence supporting claims of urban agriculture making a significant impact on food and nutrition security is also not enough to suggest that it should be the dominant food policy position.

Since its implementation, the urban agricultural policy (2007) has been criticised for failing to even realize the key objective of ensuring the provision of urban land for agricultural use. This according to Battersby and Haysom (2012) is evidenced by the rezoning of valuable agricultural land in the Phillippi Horticulture Area (PHA) for housing developments. The City of Cape Town Council as noted by Swart (2012) has also acted against the urban agricultural policy (2007) by approving housing plans on prime agricultural land, specifically in the valuable area where the PHA is located.

#### 6.8 City of Cape Town Resilience Strategy (2019)

The City of Cape Town in 2019 developed a resilience strategy for the city to protect its citizens against acute shocks such as drought, fires, and floods which are sudden events that threaten a city. This Resilience Strategy aims to also address underlying chronic stresses like “high unemployment, inadequate public transport systems, endemic violence, food insecurity and substance abuse” (CoCT, 2019, p 6). Resilience according to the CoCT (2019) refers to “the capacity of the individuals, communities, institutions, businesses and systems in a city to survive, adapt and thrive no matter what kind of chronic stresses and acute shocks they experience” (CoCT, 2019, p 7).

Noting that the ability to put food on the table is a challenge for many poor and vulnerable people, the CoCT Resilience Strategy identifies the challenge of food insecurity as a chronic stress threatening the day-to-day functioning of these citizens (CoCT, 2019). The Resilience strategy importantly identifies economic and

environmental shocks and stresses as key determinants for access to affordable and nutritious foods. The Strategy as a result further notes the need for a better understanding of the complex nature of the food system, aiming soon to develop an Integrated Food Systems Programme along with a food vision and strategy that will be developed through collaborating with civil society and government at all levels.

The prioritising of food as key policy objective in the CoCT Resilience Strategy is a major step for improving food governance in the city. To achieve Goal 1.4 which is to “promote a culture of health that increases well-being and decreases trauma”, the Resilience strategy aims to ‘establish a food systems programme to improve access to affordable and nutritious food’, with the desired outcome being the strengthening of the food system so that vulnerable groups have access to affordable and nutritious food (CoCT, 2019, p 50). Secondly through the Live Well Challenge, which is a current initiative focusing on educating, supporting, and promoting healthy living, the CoCT aims at increasing the number of citizens participate in regular exercise and healthy eating (CoCT, 2019). This goal is crucial as the CoCT believes that increased exercise and healthy eating habits are essential to decreasing the high rates of non-communicable diseases (NCDs) within Cape Town communities (CoCT, 2019).

The Resilience Strategy is important to realizing the status of food security and nutrition in the City of Cape Town, the prioritisation of food in the strategy is a step in the right direction to shifting the perspective on urban food security. As it relates to food security and nutrition the Resilience Strategy’s focus is based only on increasing health and wellness through access to nutritious foods (CoCT, 2019). What is lacking environmentally in the strategy however is the sustainability of diets and the food system. The Strategy however remains just a statement of intent in engaging urban food security.

### 6.9 Summary

Despite the City of Cape Town’s adoption of urban food and nutrition related policies like the urban agricultural policy and their intention of engaging urban food and nutrition security through city commissioned food security study report (Battersby et

al., 2014). This chapter's review of existing urban planning and food policies in the City revealed that the challenge of food insecurity is still not adequately addressed or understood. The review has revealed that the municipal spatial development framework and land use managements systems like zoning and by-laws are available for urban planning to influence food realities in the CoCT. Instead, they have been underutilised and used rather in policies like the CoCT Informal Trading policy to regulate and systemically exclude informal food retailers in the City. The bias on production-driven and targeted approaches for resolving urban food and nutrition insecurity in the City of Cape Town has been noted to particularly neglect other key pillars by focusing only on food availability. The following chapter discusses possible impacts of CoCT urban planning food related policies to food and nutrition security.



## Chapter 7. Discussion & Findings

### 7.1 Introduction

This chapter discusses the themes food availability, food accessibility, food utilization and stability of food, agency and food sustainability as policy outcomes and dimensions of food security and nutrition. These themes will be analysed in this chapter within the context of CoCT food related policies and the desired policy outcome of each as they relate to the dimensions of food security and nutrition. While the conceptual framing of food security has evolved over the years to include the multiple dimensions of food security and nutrition (HLPE, 2021),

The research themes discussed in section 7.2 below present us with a background of how the City of Cape Town city officials through policy and planning attends to the challenge of food insecurity and nutrition.

As this discussion relates to this study's research aim, the chapter from section 7.3 further unpacks how development planners in the City of Cape Town reflect on food security and nutrition of low-income households in their development planning. The study does this by specifically responding to our research questions in order to satisfy the objectives of establishing the main policy and planning powers and instruments available to the CoCT to influence food; investigating how Food and Nutrition Security is understood in these powers and instruments; and determining opportunities that are there for CoCT to increase and influence FNS

### 7.2 Research themes: Food Policy Outcomes

Using the Food and Nutrition Security (FNS) conceptual framework established in Chapter 2 and the policies reviewed in previous chapter 6, this section unpacks how food and nutrition security of urban dwellers is considered within development policy and planning in the City of Cape Town.

Table 1 below of CoCT food security and nutrition interventions, lists relevant food related policies/strategies as discussed in previous chapter, their objectives and the food and nutrition outcome, which each policy potentially affects.

Table 1: CoCT Food Security & Nutrition Programmes

Title	Objectives	Potential Policy Outcome
Integrated Development Plan (IDP)	Provide access to social services for vulnerable people; Collaboration between business and individuals for poverty alleviation (Corporate Social Investment)	Availability Stability Sustainability
Municipal Spatial Development Framework (MSDF)	Coordinate, Align and integrate sectorial policies; Guide spatial planning and land-use management; Give effect to 5 development principles of SPLUMA	Availability Sustainability
Land-Use Management Systems (LUS)	Grant land-use rights; Promote economic growth and efficient development of land; Give effect to land-use schemes and rezoning objectives of both MSDF and the IDP;	Availability Stability Sustainability
City Development Strategy (CDS)	Realize objectives listed in the regional OneCape 2040 Strategy: 'Settlement Transition', Building of healthy, accessible, liveable and multi-opportunity communities	Accessibility Utilization Stability
CoCT Informal Trading Policy	Facilitate access to job and entrepreneurial opportunities within the informal trading sector" (City of Cape Town, 2013b, 8).	Accessibility
CoCT Urban Agriculture Policy	Urban Agriculture for poverty alleviation; Improve household food and nutritional status, Support food security through food gardens.	Availability Utilization Agency



CoCT Food Gardens in support of Poverty Alleviation and Reduction Policy	Direct Work of Social Development and Early childhood Directorate (SDECD) in improving quality of life; Outline procedure for establishment of sustainable food gardens; Better direct resources towards developing food gardens	Availability Utilization Stability Agency
CoCT Resilience Strategy	Establish a food systems programme to improve access to affordable and nutritious food; strengthen food system so that vulnerable groups have access to affordable and nutritious food; increase the number of citizens participating in regular exercise and healthy eating	Availability Accessibility Utilization Stability Agency

Table 3: Key Local Policy Programmes

#### 7.2.1 Policy Outcome 1: Food Availability

Food Availability as discussed chapter 3 refers to there being enough food or food supplies physically at both national and regional levels (Weingartner, 2004). As noted by the HLPE (2020) food availability means having the right quantity and quality of food required to fulfil dietary needs of individuals and/or households. Food availability as such is achieved when there is enough food available for all people in an area on a consistent basis. As such, food availability is known as always relating to the provision of food for all people. Availability of food is dependent on road infrastructure and existing food outlets to attain food from. Simply described by Pieter's, Guárico and Vandeplas (2013), availability refers to extent to which food in local shops and food markets is reachable to households. In general, as noted by Barret and Lentz (2009), food availability reflects the supply of food and is therefore positively affected by policies which subsidise agricultural production, create space for agricultural investments and food aid.

The City of Cape Town (CoCT), evident from the policy analysis in previous chapter 5 attends to food availability through several policies like the integrated development plan, land-use management systems, social development strategy, the CoCT urban agriculture policy and the Food Gardens in support of poverty alleviation and

reduction policy. The mentioned policies all contain outcomes which attend to availability of food as a key dimension of food security and nutrition. The Urban agriculture policy through its objectives of supporting food security through food gardens tries to improve household food and nutritional status and critically lists urban agriculture as a tool for alleviating poverty. Land use Management systems on the other hand attend to the dimension of food availability through granting land-use rights which promote economic growth and the efficient development of land in line with the City's IDP and MSDF, both which prescribe zoning objectives of the CoCT and guide special planning and land use management. The City of Cape Town Resilience Strategy dedicated at establishing a food systems programme is another policy approach with attends to the availability of food as a dimension.

### 7.2.2 Policy Outcome 2: Food Accessibility

Food accessibility as noted in chapter 2 describes a situation whereby people or households have the financial means required for them to access quality foods with the required dietary intakes for them to be productive. Food accessibility relates to there being enough resources for households and individuals to be able to obtain the right foods to meet their required daily nutritious intake. While availability to food is dependent on road infrastructure and existing food outlets to attain food from, accessibility of food is dependent on purchasing power of households and on prices of food in the market. Accessing food clear from above definitions noted in chapter 2 means basically having enough income or household resources required to be able to get the right amount of nutrition food to maintain an adequate diet. Food security as such is affected by a peoples' inability to access food, for example when people are not able to afford food using their earnings or other acceptable method of exchange or the required resources to grow their own food then we are likely to experience a state of food insecurity. As such at household level, the household's ability to spend on food is often seen as an adequate indicator of food access (Babu & Sanyal, 2014). As noted by Pieters, Guariso and Vandeplass (2013), access to activity which generate income is a big determinant behind a household being able to buy food, while domestic food prices also determine the quantity and quality of the food purchased.

The City of Cape Town through the provincial OneCape 2040 linked City Development Strategy, envisions “a resilient, inclusive and competitive Western Cape with higher rates of employment producing growing incomes, greater equality, and an improved quality of life”. The above is an example of a policy which attends to accessibility of food as a dimension of food security and a policy outcome in the CoCT. Through the Resilience Strategy adopted in 2019, which focuses on strengthening the entire food system and improving food access to vulnerable and poor communities, the dimension of food access is also affected. The Informal Trading policy however, as reviewed in chapter 6 has been revealed to negatively undermine food accessibility in the city.

### 7.2.3 Policy Outcome 3: Food Utilization

As noted by FANTA (2006), food utilization is about the proper processing and storage of food. It also is about people being knowledgeable about what constitutes proper childcare and adequate nutrition. As discussed in chapter 3 of the study, proper food utilization is about consuming foods which contain the adequate quality and quantity of nutrients needed in order to give energy to people. As chapter 3 details, for people to be able to enjoy a healthy, activity filled and productive life, they must receive a sufficient and balanced diet with that includes “carbohydrates, protein, fat or calories, vitamins and mineral fibre in their diets” (Benson, 2004, p 8). Food utilization as summarised in chapter 3 refers to “having an adequate diet, clean water, sanitation and health care to reach a state of nutritional well-being where all physiological needs are met (HLPE, 2020, p.28). Food utilization as noted by Pieters, Guariso and Vandeplass (2013) relates to not only a quantity of food (availability), but also the quality of food consumed. Adequate food utilization in all leads to nutrition security.

In relation to city policies which consider to the theme food utilization, the City Development Strategy with its aim of realizing the provincial OneCape 2040 objective of “building healthy, accessible, liveable, and multi-opportunity communities, is an example. Both CoCT Urban Agriculture policy and the Food Gardens in support of poverty alleviation and reduction policy with aims of improving household food and nutritional status affect food utilization. Lastly, the recently

adopted resilience strategy with its primary goal to “promote a culture of health that increases well-being and decreases trauma” attends to the theme food utilization through its focus on ensuring access to affordable and nutritious food, and through increasing the number of citizens participating in regular exercise and healthy eating (CoCT, 2019). The ‘Live Well Challenge’ which focuses on educating, supporting, and promoting healthy living considers the dimension of food utilization.

#### 7.2.4 Policy Outcome 4: Stability of Food

The fourth theme identified in the study’s policy analysis refers to the dimension of stability. The theme described in chapter 3 refers simply to the stability of food availability, accessibility, and utilization. Stability relates to the ability of the above-mentioned determinants of food security and nutrition to remain resilient to shocks and stresses which cause temporary disruptions in the food system. Resilience according to the CoCT (2019) refers to “the capacity of the individuals, communities, institutions, businesses and systems in a city to survive, adapt and thrive no matter what kind of chronic stresses and acute shocks they experience” (CoCT, 2019, p 7), As noted by the HLPE (2020), stability refers to “having the ability to ensure food security in the event of sudden shocks (e.g. an economic, health, conflict or climatic crisis) or cyclical events (seasonal food insecurity)” (HLPE, 2020, p 28). The dimension of stability is in all cross cutting and demands that food be available, accessible and that food utilization be adequate all times in order for households to not worry about the risk of food insecurity.

As the theme stability relates to CoCT policies, the City of Cape Town (2019) resilience strategy which was developed for the municipality to protect its citizens against acute shocks and stresses, aims at addressing unemployment, inadequate transport systems and food insecurity. Its focus on improving access to affordable and nutritious food whilst also educating and promoting healthy living, are some of the measures that affect the stability of food. The provincial government’s OneCape 2040 policy envisions “a highly skilled, innovation-driven, resource-efficient, connected, high-opportunity and collaborative society” (CoCT, 2012 p. 31). The City Development Strategy which aligns with the above under the goal of health and wellness aims for citizens to lead a healthy life and for them to receive basic

services. The CoCT Integrated Development Plan under its goal for a caring city aims at creating integrated and inclusive communities where people have access to services. The above-mentioned policies both directly and indirectly attend to the dimension of stability.

#### 7.2.5 Policy Outcome 5: Agency

Agency as a dimension of food security and nutrition is one of newest identified themes of the FSN conceptual framework. Agency as noted in chapter 3 refers to a group or individual's capacity to make their own informed decisions and meaningfully participate on aspects relating to the food system on their own terms (Burchi & De Muro, 2016; HLPE, 2020). Enhanced agency as noted in Clapp et al. (2021) increases individual/community autonomy and a gives them greater voice for participating in the food system. Food policy literature notes a positive influence on food security "when agency is enhanced via improved access to education and greater land ownership" (Clapp et al., 2021, pg. 4). In order to enhance agency using food policies, authorities are required to take action, which ensures greater participation in the food system, by both communities and individuals.

As the theme relates to policies in the City of Cape Town, the CoCT Resilience Strategy adopted in 2019, through its 'live well challenge' under goal 1.4 as discussed in previous chapter touches on the FNS pillar of agency. The live well challenge as an initiative of the CoCT's Social Development Directorate involves "running a holistic eight-week programme for communities, including exercise, education and support to promote healthy living" (CoCT, 2019, pg. 27). The resilience strategy with its intentions of creating 'cohesive and engaging communities' attends to agency as a dimension of food security. As Clapp et al. (2021) attests, increased land ownership, particularly for disadvantaged women improves "diet quality and childhood nutrition outcomes" (pg.4). Land use systems in Cape Town and the CoCT urban agricultural policy (2007) with its intentions of securing and protecting agricultural land in the city, is an example of a policy which indirectly attends to the dimension of FNS.

### 7.2.6 Policy Outcome 6: Sustainability of Food

'Sustainability' according to the HLPE (2020) accounts for "food system practise that contribute to long term regeneration of natural, social and economic systems, ensuring the food needs of the present generations are met without compromised food needs of future generations" (HLPE, 2020, pg. 10). It is different from the FNS pillar stability in sense that stability focuses on insulating food security from temporary disruptions like natural disasters and/or market fluctuations which may undermine it. While sustainability as emphasizes on the long-term ability of the food system to resists disturbances. The HLPE (2020) notes that sustainability is met when food requirements of current times are attended to in a way that will not in compromise food and nutrition security for future generations

Several urban planning and food strategies as reviewed in this study as a result were found to consider the aspect of sustainability of eco-systems related to food. The CoCT informal trading policy for example considers the sustainability by highlighting development interventions and identified trading areas need to improve the sustainability of informal traders (CoCT, 2013b). The Food garden in support for poverty alleviation policy on the other hand, sets out a guide to be followed for sustainable food gardens to be established. While the urban agriculture policy of the City of Cape Town considers the theme sustainability only in terms of the policy creating sustainable economic opportunities in form of jobs and income generation.

#### 7.3 What are the main policy and planning powers and instruments available to the CoCT to influence food?

The findings of this research revealed that the City of Cape Town, albeit argument of a missing urban food security and nutrition mandate, does contain a set of policy and planning powers which could be used to effectively influence food security and nutrition. The constitution of South Africa describes the role of local government as ensuring the provision of public services such energy, water and sanitation services, municipal public transportation, refuse removal, solid waste disposal and municipal planning (Johnstone, 2020). Along with these competencies the CoCT is also empowered by legislation to regulate private markets through introducing measures

which attend to street trading and the licensing of food traders (Haysom, 2014; De Visser, 2019).

The literature discussed along with the food policies and programmes reviewed in this study reveal that planning approaches to food security and nutrition included the compiling of food charters, establishment of multi-stakeholder partnerships and zoning and ordinances. These are three key ways in which the CoCT could use municipal planning powers to influence the food security and nutrition of low income households. Below subsections discusses each of the methods.

#### 7.3.1 Recommendation 1: Food Charters

Food charters, which are reflective of a City's vision, principles and priorities, as noted by Hardman and Larkham (2014) can be a positive mechanism for encouraging engagement between various key actors of the food system in the City of Cape Town. Battersby et, al., (2015) argues that the development of a food charter and a multi-stakeholder engagement platform would lead to an urban food strategy being agreed on. According to Even-Zehav, Drimie and Haysom (2020) food charters offer a signal of a united way of dealing with challenge of urban food and nutrition security. It is with this in mind that this study makes the recommendation for food charters to be formulated and agreed on in order to guide city officials and society as a whole to make a significant impact to food and nutrition security.

#### 7.3.2 Recommendation 2: Zoning and Ordinances

Zoning and land use planning are another way in which the study revealed that the CoCT could direct and indirectly influence food security and nutrition. Zoning and planning as noted by De Visser (2019) are a competency of local government; municipalities like the CoCT as a result are responsible for creating zoning ordinances, which distinguish what is permissible on the different land types. The study revealed that the through the Food Security Policy (FSP) developed by national government, municipalities were instructed to address food insecurity in peri-urban and urban areas by using municipal planning powers.

### 7.3.3 Recommendation 3: Food Policy Councils

The establishment of food policy councils which are comprised of wide range of people from different sectors, social movements, academic institutions and government departments is emphasized in both literature and in policies which stress the need for multi-stakeholder collaboration among all actors in the food system. As multi-stakeholder collaboration relates to local government, the research revealed that policies like the National Development Plan, the National Policy for Food and Nutrition Security, Western Cape Household Food and Nutrition Strategic Framework and the CoCT Resilience Strategy all recommended the establishment of a multi-stakeholder in order to draw consensus on best interventions in the food system.

### 7.4 How is Food & Nutrition Security understood in these powers and instruments?

With food security and nutrition having been noted as absent in the urban planning agenda or particularly under the competence of national and provincial governments, the study revealed the most used planning and policy approaches to food security and nutrition which are also deemed inadequate to resolve challenges faced in the food system and thus hinder the successful realization of FSN. The below subsections discuss the identified lack or absence of an urban food security and nutrition mandate, inadequate municipal planning through zoning, regulations, and land-use planning, and often tend to be centred around three approaches pursued by local governments.

#### 7.4.1 Missing Urban FSN Mandate

Noting the missing urban food security and nutrition mandate as a significant barrier, literature discussed in this study's chapter 3 all highlight the need for local municipalities to be mandated to deal with food security as a competency of local government.

Due to the food mandate lying in the hands of the Department of Agriculture, Forests and Fisheries (DAFF), the study's finding further revealed that current urban food policy interventions at a national, provincial, and local level all focused on addressing the issue of FSN by improving food supply through productionist approaches, thus



ignoring other important dimensions of food security such as food access to all people living in the urban context. The lack of an urban food security and nutrition mandate means that local food policies and programmes tend to be dependent on interventions coming from national or provincial government. This, as revealed in chapter 5, has led to these interventions being disintegrated and scattered across the different departments in the City.

#### 7.4.2 Agricultural Productionist Approaches

While the study comprehensively reveals several planning and policy approaches for positively influencing the food security and nutrition realities of poor urban households, a few of the approaches as facilitated by the City of Cape Town have been noted in both literature (Battersby et al, 2014) and findings to in fact been negatively affecting the food security and nutrition of urban households. The City's main food policy interventions as revealed by the study have revolved around urban agriculture/food gardens and informal trader regulation. While both the CoCT Urban Agriculture Policy and the Food Gardens in support of poverty alleviation and reduction policy attend to food availability as a necessary dimension of food security and nutrition, research as discussed in previous chapters have shown the uptake of UA to be particularly low among low-income households. Coupled with this, research has revealed The City of Cape Town has also worked against one of the urban agriculture policy's primary objective of protecting land for agricultural use by approving housing plans on prime agricultural land.

Discussion in previous chapters also importantly notes that food security and nutrition is made up of six dimensions, all which must be met for an area to be determined as food and nutrition secure. The preferred approach by the CoCT to engage with the challenge of food insecurity through productionist interventions has been revealed as inadequate by this study.

#### 7.4.3 Informal Trader Regulation

As the study unpacks in chapter 5, spatial planning and rezoning decisions are concerned with promoting urban agriculture, cleaning up cities and locating retail supermarkets in food insecure areas. Informal food traders as revealed in the study,

account for a significant contribution to food security. According to Battersby et al., (2016) 70% of poorer households in South Africa obtain their food from informal traders. This is as revealed in the study is because the informal food sector made up of street traders, hawkers and spaza shops is ideally located in close proximity to where people work and live, they provide affordable and suitably packaged products and operate long flexible hours which are convenient (Wegerif, 2020). Despite the informal food sector being essential to urban food security and the food system in its entirety, informal food traders are often subject to ideological and normative perceptions which view supermarkets as more desirable than spaza/hawkers who are associated with filth and degeneration (Cardosa et al., 2004; Wegerif, 2020). Informal traders as a result are most targeted by government regulations which attempt to disperse or expel them from public areas. This planning approach has been revealed in the study to particularly misunderstand undermine food and nutrition security realities of poor urban households who source their foods from informal traders.

The City of Cape Town through its Informal trading policy as discussed in chapter 6 is particularly guilty of neglecting potential benefits that informal traders have to better food security.

The following section discusses other opportunities available for the CoCT to enhance food security and nutrition in the city.

#### 7.5 What opportunities are there for CoCT to increase its influence on Food Security & Nutrition?

Findings documented in the study present several ways in which the CoCT municipality can through urban planning and better land-use management further food security and nutrition of urban dwellers. The study has discussed urban planning and food policies in the city of Cape Town, linking relevant CoCT policy outcomes to food security and nutrition dimensions as noted by the HLPE (2020). The study's review of city policies and how they affect food and nutrition dimensions has allowed for this research to document other key opportunities aside from urban agriculture, which can be considered to further food and nutrition security of urban dwellers. While urban food and nutrition security has come to be accepted as a

competency of local governments, adopted approaches as discussed in previous section, reflect a misunderstanding on how planning influences food.

Findings of the study advise that key policy and planning powers available for municipalities like multi stakeholder food policy councils present opportunities where food system interventions of the CoCT can be drawn from different needs of all food system actors. Zoning, ordinances, and land use systems are also suggested by the study as presenting an opportunity for the CoCT to consider food-sensitive policies when implementing or enforcing planning regulations in the city. As such, the CoCT is required to go beyond supporting urban agriculture and regulating the informal food sector in order to further food and nutrition security of Capetonians. Lastly, the presence of food charters in the form of city food visions, has been noted as presenting an opportunity for municipalities to frame food planning interventions within “an overall initiative to address food system governance at a local level” (Battersby and Watson, 2014).

#### 7.6 Summary

The discussion above has provided for a better understanding on how food and nutrition security is considered in development planning and policy in the City of Cape Town. In order to adequately address the aim of this study and respond to research questions, the paper has provided firstly the conceptual understanding that “*Food security is a situation that exists when all people, at all times, have physical, social and economic access to sufficient, safe and nutritious food that meets their dietary needs and food preferences*” (CFS, 2012, p.14). From this widely accepted definition of food and nutrition security, six dimensions which make up the status of food security and nutrition are identifiable (see figure 2). The chapter has discussed the six dimensions of food and nutrition security as potential outcomes of the policies reviewed by this study. Thus determining how each policy may affect urban food and nutrition security.

While table 1 and the discussions above illustrate CoCT urban planning policies touching on several dimensions of Food and nutrition security, the dimension and theme of ‘food availability’ resonated most across the various policies of the CoCT. This agreeing with literature that suggested policy approaches as employed by

CoCT urban planners revolved around food production thus neglecting other key components of food and nutrition security.

With regards to recommendations to city officials, this study has noted the importance of food charters for guiding decision making towards the agreed upon vision. The study has also noted that multi-stakeholder engagement forum like food councils also have a role to play in ensuring that the various interests are considered in agreed upon food invention strategies. Lastly, the study has advised on zoning and ordinances as among the most crucial of municipal planning powers available to city officials for influencing food and nutrition realities of urban households. Considering discussions provided by this chapter, this research thesis has satisfied all objectives as listed in chapter 1.



## References

- Abrahams, C. (2010). 'Transforming the Region: Supermarkets and the Local Food Economy', *African Affairs* 109(434): 115–34.
- Acquah, B., Kapunda, S. and Legwegoh, A. (2014). 'The Dimensions of Urban Food Insecurity in Gaborone, Botswana', *Urban Forum* 25: 217–26.
- Alebiosu, O. A. (2006) An Investigation of Integrated Development Planning (IDP) as a Mechanism for Poverty Alleviation in Grahamstown in the Makana Municipality, Eastern Cape, South Africa. Unpublished Master's Thesis, Rhodes University.
- Battersby, J. and Peyton, S. (2014) 'the Geography of Supermarkets in Cape Town: Supermarket Expansion and Food Access', *Urban Forum* 25(2): 153–64.
- Battersby, J. and Watson, V. (2018) 'Addressing Food Security in African Cities', *Nature (Sustainability)* 1 (February): 153–5. <https://rdcu.be/LTXX>
- Battersby, J. (2011) 'The State of Urban Food Insecurity in Cape Town', Urban Food Security Series No. 11, Queen's University and AFSUN, Kingston and Cape Town.
- Battersby, J. (2012) Urban Food Security and the Urban Food Policy Gap, Paper Presented at 'Towards Carnegie III' Conference, University of Cape Town, 3-7 September 2012.
- Battersby, J. (2014) the need for a diverse, responsive food system, *Urban Agriculture Magazine*, 27 (Urban Agriculture and Climate Change), pp. 10-12
- Battersby, J. & Marshak, M. (2013) Growing communities: Integrating the social and economic benefits of urban agriculture, *Urban Forum* 24 (4) 447-461.
- Battersby, J., Haysom, G., Kroll, F., and Tawodzera, G. (2014). A study on current and future realities of urban food security in South Africa. Report for the South African Cities Network.

Berrisford S (2011). 'Unravelling Apartheid Spatial Planning Legislation in South Africa - A Case Study' *Urban Forum* 22:247–263 at p 254.

Benson, T. (2004). Africa's food and nutrition situation: where are we and how did we get here? 2020 discussion paper 37. Washington, DC: IFPRI.

Boossabong, Piyapong. (2017) 'Food and Floods in the City: Lessons from Collaborative Governance within Policy Networks on Urban Agriculture in Bangkok' in *Environmental Justice and Urban Resilience in the Global South*, edited by Adriana Allen, Liza Griffin and Cassidy Johnson, 215–30. London: Palgrave Macmillan.

Bowen, G. A. (2009). Document analysis as a qualitative research method. *Qualitative Research Journal*, 9(2), 27-40. doi:10.3316/QRJ0902027

Bushara, M.O.A & Ibrahim, H.H (2017). Food Security Status for the Household: A Case Study of Al-Qadarif State, Sudan (2016). *J Socialomics* 6: 217. doi:10.1472/2167-0358.1000217

Blay-Palmer, A., Dubbeling, M. and Renting, H. (2015). 'Understanding the City Region (CRFS) Food System: Planning for a More Food Secure and Resilient City'. Accessed 30 January 2020. <http://www.ruaf.org/sites/default/files/City%20Region%20Food%20Systems%20literature%20review.pdf>

Cabannes, Y., Marocchino, C., & Fonseca, J. (2017). City Region Food Systems as Human-Centered Planning. *Smart Communities, Review*, 13, 74-83.

Cabannes, Y., & Marocchino, C. (Eds.). (2018). *Integrating food into urban planning*. UCL Press.

Caspi, C., Sorensen, G., Subramanian, I. Kawachi, 2012, The local food environment and diet: a systematic review *Health Place*, 18 (5) pp. 1172-1187, [10.1016/j.healthplace.2012.05.006](http://dx.doi.org/10.1016/j.healthplace.2012.05.006)

Cardoso, R. de C.V., Companion, M. and Marras, S.R. (2014) *Street Food: Culture, Economy, Health and Governance*. New York: Routledge.

Carey, J. (2011) Who Feeds Bristol? Towards a Resilient Food Plan. A Baseline Study of the Food System that Serves Bristol and the Bristol City Region. Bristol: Bristol Green Capital, NHS Bristol and Bristol City Council.

City of Hamilton. (2014) 'Food for All. A Food Charter for Hamilton'. Accessed 31 January 20. <https://hamiltonfoodcharter.files.wordpress.com/2014/01/food-for-all-2014.pdf>

City of Cape Town. (2007). Urban Agriculture Policy for the City of Cape Town. City of Cape Town.

City of Cape Town. (2007). Food Gardens Policy in Support of Poverty Alleviation and Reduction (Policy Number 12399c). City of Cape Town.

City of Cape Town. (2013) Informal Trading Policy (Policy Number). City of Cape Town

City of Cape Town. (2019). Resilience Strategy. Cape Town, South Africa.

Clapp, J., Moseley, W. G., Burlingame, B., & Termine, P. (2021). The case for a six-dimensional food security framework. *Food Policy*, 102164

Crush, J. and Frayne, B. (2010). The Invisible Crisis: Urban Food Security in Southern Africa. African Food Security Urban Network (AFSUN) Urban Food Security Series No.1.

Crush, J. and Frayne, B. (2011). Urban food insecurity and the new international food security agenda. *Development Southern Africa*, Vol.28 (4): pp. 527-544

Crush, J. and Frayne, B. (2011) 'Supermarket Expansion and the Urban Food Economy in Southern African cities: Implications for Urban Food Security', *Journal of Southern African Studies* 37(4): 781–807.

Committee on World Food Security (CFS). (2012). Voluntary guidelines on the responsible governance of tenure of land, fisheries and forests in the context of national food security. Rome. (also available at <http://www.fao.org/cfs/home/activities/vggt/en/>)

De Schutter, O. (2010) Report submitted by the Special Rapporteur on the right to food, Olivier de Shutter. UN Doc. A/HRC/16/49.

Dolan, D. 2014. 'South African "Spaza" Shops Suffer as Big Retail Rolls in', Reuters, Accessed 30 January 2020.  
<http://www.reuters.com/article/2014/04/20/us-safrica-retail-spaza-idUSBREA3J06420140420>

De Visser, J. (2019), "Multilevel Government, Municipalities and Food Security" *Food Security SA Working Paper Series No. 005*. DST-NRF Centre of Excellence in Food Security, South Africa.

De Visser, J & Poswa, (2018) X 'Municipal Law Making under SPLUMA: A Survey of Fifteen "First Generation" Municipal Planning By-Laws'

Denoon-Stevens, S.P. (2016). Developing and appropriate land use methodology to promote spatially just, formal retail areas in developing countries: The case of the City of Cape Town, South Africa. *Land Use Policy*. 54: 18 – 28.

Department of Agriculture (2002). *Integrated Food Security Strategy*, National Department of Agriculture Policy Document, Pretoria.

Drimie, S. & Ruysenaar, S. (2010). The Integrated Food Security Strategy of South Africa: An institutional analysis. *Agrekon*, 49(3), pp.316–337.

Drimie, S. (2015). Aligning Policy to Address Food Insecurity: Institutional Challenges and Political Will in South Africa, in Sakiko Fukuda-Parr and Vivienne Taylor (eds), *Food Security in South Africa: Bringing People's Human Rights and Entitlements to the Fore*.

FANTA. (2006). Food security. <http://www.fanta.com> [accessed on 13 July 2019].

Frayne, B., Battersby-Lennard, J., Fincham, R. and Haysom, G. (2009). *Urban Food Security in South Africa: Case study of Cape Town, Msunduzi and Johannesburg*. Development Planning Division Working Paper Series No.15, DBSA: Midrand.



Frayne, B., McCordie, C. and Shilomboleni, H. (2014) Growing out of poverty: Does urban agriculture contribute to household food security in Southern African cities? Urban Forum. Available at <http://link.springer.com/article/10.1007%2Fs12132-014-9219-3> (accessed 20 February 2020).

Healey, P. (2006) Collaborative planning. Shaping places in Fragmented Societies. New York: Palgrave Macmillan

HLPE. (2020) Food security and nutrition: building a global narrative towards 2030. A report by the High Level Panel of Experts on Food Security and Nutrition of the Committee on World Food Security, Rome

Food and Agriculture Organisation (FAO) (2012). FAO Statistical Yearbook – 2012. Food and Agricultural Organisation, Rome

Government of South Africa. (2014) The National Policy on Food and Nutrition Security for the Republic of South Africa, Department of Agriculture, Forestry and Fisheries, Government Gazette No. 37915, 22 August 2014.

Gross, R. et al. (2000): The four dimensions of food and nutrition security: definitions and concepts

Haysom, G. (2014). Food system governance for urban sustainability in the global south.

Healey, P. (2006) Collaborative planning. Shaping places in Fragmented Societies. New York: Palgrave Macmillan

HLPE. (2020). *Food security and nutrition: building a global narrative towards 2030*. A report by the High-Level Panel of Experts on Food Security and Nutrition of the Committee on World Food Security, Rome

Hodgson, K. (2012). Planning for food access and community-based food system. *US: American Planning Association*.

Johnstone S (2020) The role of local government in a food systems approach. PhD Thesis, University of the Western Cape

Klennert, K. (edt.) 2009: Achieving Food and Nutrition Security, Feldafingen/InWEnt

Local Government: Municipal Systems Act 32 of 2000

Ilieve, R.T. (2016) Urban Food Planning. Seeds of Transition in the Global North. New York: Routledge.

Ledger, T. (2013) 'Food Is Different: Morality and Modern Food Systems', Right to Food Seminar, Section 27, Johannesburg, 4 November.

Madziakapita, V; Abifarin, A and Asanta, E. 2004. Scale up transformed livelihoods in all communities covered by area development programmes in Africa

Matuschke, I. (2009). "Rapid Urbanization and Food Security: Using Food Density Maps to Identify Future Food Security Hotspots" Paper for International Association of Agricultural Economists Conference, Beijing, China, 16–22 August.

Maxwell, D. (1999). The Political Economy of Urban Food Security in Sub-Saharan Africa. *World Development*. 27 (11): 1939 – 1953

May, J. (2017), "Food security and nutrition: Impure, complex and wicked?" *Food Security SA Working Paper Series No.002*. DST-NRF Centre of Excellence in Food Security, South Africa.

Milan Urban Food Policy Pact. (2015). *Milan Urban Food Policy Pact*. Available: <http://www.milanurbanfoodpolicypact.org/text/> Accessed 20 April 2020.

Morgan, K. (2009). Feeding the City: The Challenge of Urban Food Planning. *International Planning 149 Studies*. 14 (4): 341 – 348.

Morgan, K. (2013) 'The Rise of Urban Food Planning', *International Planning Studies* 18(1): 1–4.

National Planning Commission. (2012). National Development Plan 2030, <http://www.info.gov.za/issues/national-development-plan/index.html> , Accessed 20 November 2019.

Newton, N. (2010) The use of semi-structured interviews in Qualitative research: Strengths and weaknesses in *Exploring Qualitative Methods*.

Neuner, K., Kelly, S. and Raja, S. (2011) Planning to Eat: Innovative Local Government Plans and Policies to Build Healthy Food Systems in the United States. Healthy Kids, healthy Communities Policy Brief 39.

Peyton, S. D. (2013) Geographies of Poverty and Retail: The Impact of Supermarket Expansion on Food Insecurity in Cape Town. Geography Department: Macalester College.

Popkin, B. (1999). Urbanization, Lifestyle Changes and the Nutrition Transition. *World Development*. 27 (11): 1905 – 1916.

Pothukuchi, K., and Kaufman, J. L. (1999) Placing the food system on the urban agenda: The role of municipal institutions in food system planning. *Agriculture and Human Values*, Vol. 16: Pp. 213-224.

Pothukuchi, K., and Kaufman, J. L. (2007) The Food System: A Stranger to the Planning Field. *Journal of the American Planning Association*, Vol. 66 (2)

Raja, S., Morgan, K., & Hall, E. (2017). Planning for equitable urban and regional food systems. *Built Environment*, 43(3), 309-314.

Republic of South Africa. (1996). Constitution of the Republic of South Africa, no. 108 of 1996. Pretoria: Government of South Africa.

Republic of South Africa. (2012). National Development Plan 2030. Our future - make it work. Pretoria: Government of South Africa.

Republic of South Africa. (2014). National Policy on Food and Nutrition Security. Pretoria: Government of South Africa.

SACN (2015). A study on current and future realities for urban food security in South Africa

SANHANES-1 (2013). South African National Health and Nutrition Examination Survey Research Findings Presentation. 6 August 2013, Human Sciences Research Council and the Medical Research Council of South Africa.

Satterthwaite, D. (2011): 'Why are the main means by which urban dwellers avoid hunger ignored?', *Latest blogs: provocative insights into sustainable development*, International Institute for Environment and Development 5 October [online document]. URL <http://iied.org/blogs/> [accessed 27 April 2019].

Skinner, C. and Haysom, G. (2016) 'The Informal Economy's Role in Feeding Cities: A Missing Link in Policy Debates?', PLAAS Working Paper 44, PLAAS, UWC and Centre of Excellence of Food Security, Cape Town.

Sen, A. (1985) Well-being, agency and freedom: The Dewey lectures 1984. *The Journal of Philosophy*, 82(4): 169-221.

Simcoe County. (2012) 'Food and Agriculture Charter'. Accessed 10 December 2019. [https://fpa.simcoe.ca/Shared%20Documents/PDF\\_Charter\\_Printable.pdf](https://fpa.simcoe.ca/Shared%20Documents/PDF_Charter_Printable.pdf)

Shannon, J., 2016, Beyond the supermarket solution: linking food deserts, neighborhood context, and everyday mobility *Ann. Assoc. Am. Geogr.*, 106 (1) (2016), pp. 186-202, [10.1080/00045608.2015.1095059](https://doi.org/10.1080/00045608.2015.1095059)

Shaw, H., 2006, Food deserts: towards the development of a classification *Geogr. Ann. B Hum. Geogr.*, 88 (2) pp. 231-247, [10.1111/j.0435-3684.2006.00217.x](https://doi.org/10.1111/j.0435-3684.2006.00217.x)

Suarez-Balcazar, A. Agudelo Orozco, M. Mate, C. Garcia, 2018, Unpacking barriers to healthy lifestyles from the perspective of youth with disabilities and their parents *J. Prev. Interv. Community*, 46 (1) (2018), pp. 61-72, [10.1080/10852352.2018.1386270](https://doi.org/10.1080/10852352.2018.1386270)

Swartz, N., 2019, Disability and food access and insecurity: A scoping review of the literature. pg 107-121

Sonnino, R. (2009) 'Feeding the City: Towards a New Research and Planning Agenda', *International Planning Studies* 14(4): 425–35.

Steele, C. 2008. *Hungry City: How Food Shapes our Lives*. London: Chatto & Windus.

- Tendall, D. M., Joerin, J., Kopainsky, B., Edwards, P., Shreck, A., Le, Q. B., ... & Six, J. (2015). Food system resilience: defining the concept. *Global Food Security*, 6, 17-23.
- Tustin, D.H. and Strydom, J.W. (2006) 'The Potential Impacts of the Formal Retail Chains' Expansion Strategies on Retail Township Development in South Africa', *South African Business Review* 10(3): 48–66
- Tweeten, LG and McClelland, DG. (1997). Promoting Third-World development and food security. New York: Praeger.
- UN DESA (2012). World Urbanization Prospects: The 2011 Revision.
- von Braun, J. (2014) Food and Nutrition Security: The Concept and its Realization. Pontifical Academy of Sciences, Scripta Varia 125, Vatican City
- Van Wyk, H. de J. (2004) 'National Personal Income of South Africans by Population Group, Income Group, Life Stage and Lifeplan', Research Report No. 333, Bureau of Market Research, University of South Africa, Pretoria.
- Veenhuizen, R. van. (2016). 'Multi-stakeholder Policy Influencing and Local Urban Food Initiatives', *Urban Agriculture Magazine* 31: 29–32.
- Wiskerke, J.S.C. (2015). 'Urban Food Systems', in *Cities and Agriculture: Developing Resilient Urban Food Systems*, edited by H. de Zeeuw and P. Drechsel, 1–25. New York: RUAF and Earthscan
- Warren, E., Hawkesworth, S. and Knai, C. (2015). 'Investigating the Association between Urban Agriculture and Food Security, Dietary Diversity, and Nutritional Status: A Systematic Literature Review', *Food Policy* 53: 54–66.
- Watson, V. (2016). Locating planning in the New Urban Agenda of the urban sustainable development goal. *Planning Theory*, 15(4), 435-448.
- Weingartner, L. (2004) The Concept of Food and Nutrition Security.
- Western Cape Government. (2018). FuturesCape Policy Brief: Double Burden of Malnutrition. Cape Town: WCG.

Weatherspoon, D.D. and Reardon, T. (2003). 'The Rise of Supermarkets in Africa: Implications for Agrifood Systems and the Rural Poor', *Development Policy Review* 21(3): 333–55.

Wiggins, S. and Keats, S. (2015) 'The Rising Cost of a Healthy Diet: Changing Relative Prices of Food in High-income and Emerging Economies', ODI Report, May, ODI, London.

Wrigley, N., 2002, 'Food deserts' in British cities: policy context and research priorities *Urban Stud.*, 39 (11) pp. 2029-2040, [10.1080/0042098022000011344](https://doi.org/10.1080/0042098022000011344)

Zeza, A. and Tasciotti, L. (2010) 'Urban Agriculture, Poverty and Food Security: Empirical Evidence from a Sample of Developing Countries', *Food Policy* 35(4): 265–73.

