

The Escalating Food Crisis in South Africa

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Abstract

The world is currently experiencing escalating crisis in food availability. Generally, cutting edge research shows that the crisis of food availability is exacerbated by multiple factors which can be tied to governments' inadequate policy frameworks. This paper argues that food shortages are not natural occurrences in many countries, but deliberate consequences of policies driven by belligerent contestations which often result in exclusion and domination. This is evident in South Africa's current policies which are rendered less potent by powerful pressure groups, who seem to have benefited from apartheid. The purpose of this article is to investigate the causes of the escalating crisis in food availability. First, the article utilizes rich theoretical analysis from current literature to situate the discourse on existing body of knowledge on food shortages in South Africa. Second, data is drawn from poor people who receive low salaries to record their actual struggles in getting food. The findings reveal that food availability is complicated by policy disjuncture and environmental degradation. Third, practical suggestions are advanced to help remedy the crisis.

Keywords: Food crisis, globalization, food production, capitalism, food price index, food system, inflation, minimum wages, vulnerability, hunger, agricultural activities

1. Introduction

1.1. Overview

The world is increasingly running short of food (Roberts, 2008). Roberts (2008) attributes the declining food economic system to development and capitalist glut and competition that often disregard issues of sustainability. Roberts argues that the modern food system was celebrated as a monumental triumph since the innovative and enterprising emergence of the *homo sapiens*. Roberts demonstrates that modern human beings embraced spectacular innovations of *homo sapiens* marked by production of tools and artifacts (Meredith, 2011). The toolkits inherited from the *homo sapiens* were developed into useful technologies that help in the proliferation of food production.

Advancements in technologies helped in increased production. It also changed the economics of food production. The proliferation of agricultural production necessitated for the expansion of agricultural markets. Many farmers who engaged in the production at subsistence level now produced for national markets and international markets. The internationalization of the agricultural sector brought with it challenges and victories.

The victories can be equated to the increase in food availability and accessibility where food production is weak. Countries that have massive tracks of land and appropriate technologies took advantage of the market expansion to produce more for local and international needs. For this reason globalization and technological innovations are celebrated as a panacea to poverty stricken countries. Globalization created a huge network of food production, distribution and retailing that convey millions of tons food to the billions of consumers.

Currently, it is becoming more obvious that the triumphs celebrated by modern human beings are never complete. For instance, the supply chain that undergirds our global supermarkets, making fresh produce and food availability in every hemisphere and every season has created perfect opportunities for malevolent forces to use the food production system to harm others. Today food safety has become the number one priority of every government.

In the same vein, food narratives (Parenti, 2011) reveal a sad story of un-managed greed permeating the agricultural industry and ultimately unleashing unprecedented deprivation in poor communities. A closer scrutiny of the problem reveals that food is used as weapon to fight political fights. The study seeks to investigate the causes of the escalating crisis in food availability in South Africa. I used qualitative meta-interpretive approach in this study. The inductive and iterative nature of meta-interpretive design allowed me to focus on a research area rather than on a research question (Weed, 2005). The research area identified for the study was well suited for method chosen. Commence the arguments with a reflection on international perspective regarding the food crisis and immediately focus on the South African context.

1.2. Background to the food crisis

In 2007 and early 2008 the prices of grain, including wheat, corn and rice, rose by over 100%, then fell back to prior levels by late 2008. A similar rapid increase occurred again in the fall of 2010. These dramatic price changes have resulted in severe impacts on vulnerable populations worldwide (Lagi et al, 2011a).

Historically, there are ample examples of food riots, with consequent challenges to authority and political change, notably in the food riots and social instability across Europe in 1848, which followed widespread droughts. While many other causes of social unrest have been identified, food scarcity or high prices often underlie riots, unrest and revolutions. Today, many poor countries rely on the global food supply system and are thus sensitive to global food prices (Lagi et al, 2011b). This condition is quite deterrent from the historical prevalence of subsistence farming in undeveloped countries, or even a reliance on local food supplies that could provide a buyer against global food supply conditions.

It is an example of the increasingly central role that global interdependence is playing in human survival and well-being. We can understand the appearance of social unrest in 2011 based upon a hypothesis that widespread unrest does not arise from long-standing political failings of the system, but rather from its sudden perceived failure to provide essential security to the population. In food importing countries with widespread poverty, political organizations may be perceived to have a critical role in food security (Lagi et al, 2011b). Failure to provide security undermines the very reason for existence of the political system. Once this occurs, the resulting protests can react to the wide range of reasons for dissatisfaction, broadening the scope of the protest, and masking the immediate trigger of the unrest.

The role of global food prices in social unrest can be identified from news reports of food riots. Figure 1 below shows a measure of global food prices, the UN Food and Agriculture Organization (FAO) Food Price Index and the timing of reported food riots in recent years. In 2008 more than 60 food riots occurred worldwide in 30 different countries, 10 of which resulted in multiple deaths (Lagi et al, 2011b), as shown in the figure 1. After an intermediate drop, even higher prices at the end of 2010 and the beginning of 2011 coincided with additional food riots (in Mauritania and Uganda), as well as the larger protests and government changes in North Africa and the Middle East known as the Arab Spring. There are comparatively fewer food riots when the global food prices are lower. Three of these, at the lowest global food prices, are associated with specific local factors affecting the availability of food: refugee conditions in Burundi in 2005, social and agricultural disruption in Somalia and supply disruptions due to floods in India (Lagi et al, 2011b). The latter two occurred in 2007 as global food prices began to increase but were not directly associated with the global food prices according to news reports. Two additional food riots in 2007 and 2010, in Mauritania and Mozambique, occurred when global food prices were high, but not at the level of most riots, and thus appear to be early events associated with increasing global food prices.

1.3 Macro-perspective

According to the United Nations Food and Agricultural Organization (FAO) (2009) 870 million people go to bed hungry and are under-nourished. 234 million of the undernourished in the world come from SubSaharan Africa. Undernourishment affects the lives of these people in many ways, the most obvious being the agony associated with being hungry day after day. (FAO, 2003). Worse, a lack of nourishment causes physical and mental stunting and an increased susceptibility to disease. In addition, these conditions impair a person's ability to work and/or take advantage of development opportunities. As a result, hunger is both a cause and an effect of extreme poverty, making its eradication a vital step in alleviating poverty and inequality (Brigham, 2011).

FAO Food Price Index averaged 209 in December 2012, down 2 points (1.1 percent) from November and the lowest since June 2012, when the Index stood at 200.

The decline in December was led by drops in the international prices of major cereals and oils/fats. For 2012 as a whole, the Index averaged 212, 7.0 percent less than in 2011, with the sharpest declines registered by sugar (17.1 percent), dairy products (14.5 percent) and oils (10.7 percent). The 2012 price falls were much more modest for cereals (2.4 percent) and meat (1.1 percent).

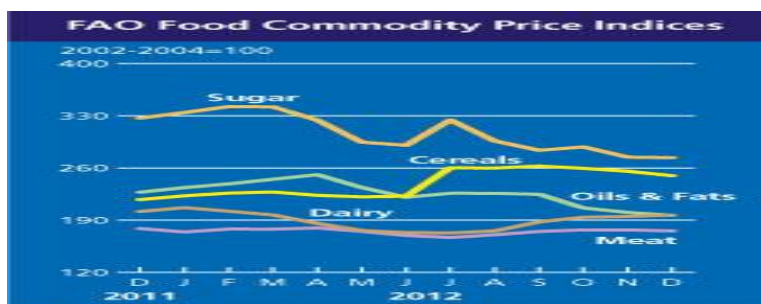


The FAO Cereal Price Index averaged 250 in December, down 6 points (2.3 percent) from November. In 2012, the index averaged 241, or 2.4 percent below 2011. After surging over the July to September 2012 period, on production uncertainties and tightening supplies, cereal export quotations dropped because of weaker demand for feed and industrial uses. In December, maize prices fell sharply, as large export supplies in South America relieved pressure from tight availabilities in the United States. Rice prices also dipped in December, on expectation of good harvests, but wheat values changed little under subdued trade activity.

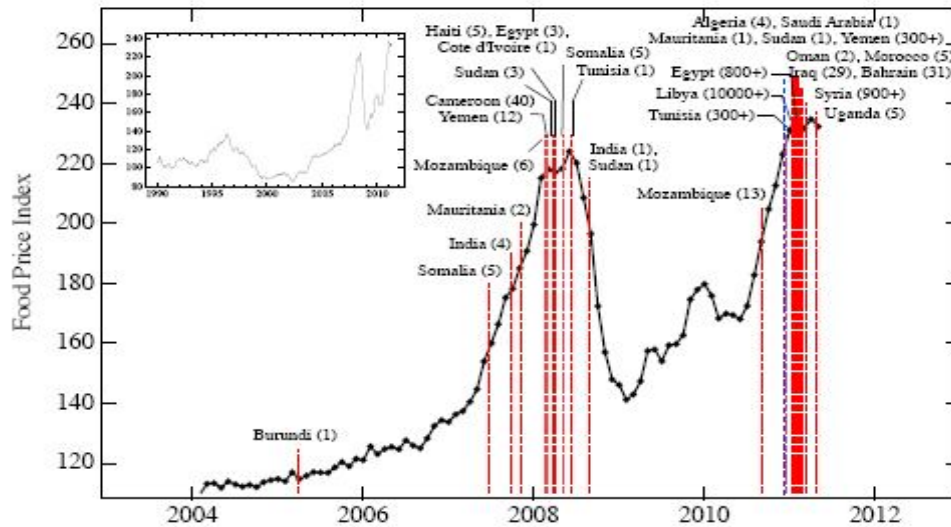
The FAO Oils/Fats Price Index averaged 197 in December, down 4 points (1.9 percent) from November, the fourth consecutive month of decline and the lowest level since September 2010. The main reason for the fall in December is the continued build-up of large global inventories of palm oil – as abundant production in Southeast Asia coincided with a protracted weakness of import demand. The decline in the index would have been even stronger without the prospect of both a tight global supply and demand situation for soybean oil during the next two to three months and lower than anticipated availabilities of sunflower-seed oil. For 2012 as a whole, the index averaged 225, which compares with 252 in 2011.

The FAO Meat Price Index averaged 176 in December, down marginally from November. Quotations of all meat categories remained close to their November level, except pig meat, which fell by 3 points (2.0 percent). The Index averaged 175 points in 2012, the second highest annual value after 2011 when it averaged 177 points. The most notable price change in 2012 was a fall of 8.3 percent in the index for ovine meat from the 2011 record. Overall, the meat sector has had to focus on productivity gains, as increased feed costs have not been associated with higher product prices.

The FAO Dairy Price Index averaged 197 in December, 2 points (0.9 percent) higher than in November. In the last quarter of 2012, dairy prices stabilized, after having risen from mid-year lows. The average value of the Index during 2012 was 189, down sharply from 221 in 2011. Overall, the dairy market remains well-balanced; however, it is increasingly susceptible to supply changes depending on pasture conditions – especially as southern-hemisphere producers assume an increasing role in supplying the world market - and on feed availability and affordability.



The FAO Sugar Price Index averaged 274 in December, down marginally from November and its lowest value since August 2010. The FAO index averaged 306 in 2012, down 17.1 percent from the previous year. The expectation of a third consecutive increase in global production and large export availabilities in the 2012/13 marketing season, notably in Brazil, have put international prices under downward pressure for much of the second half of 2012

Figure: Food price index according to regions

1.3. Micro perspective

Local prices of food seem to be on the upward trend mainly because the prices of most of South Africa's food products are derived from international prices. South Africa has moved from being a net exporter to a net importer of food, which could make the country vulnerable. At the moment, the price sting has been lessened by the stronger rand, but the rebound in the currency has also hurt farmers and their exports.

But local exports and imports and their prices were affected by the international food commodity prices and food price indices, depending on the magnitude of the international price increases. Imports were more expensive. Local consumers have been relatively shielded from price increases and buyers have been in a strong position thanks to strong wage increases and relatively benign price core inflation. We are, however, seeing that producers are under more and more pressure to pass these increases on to consumers as inflation is no longer just contained to increases in fuel and administered prices.

Another factor that contributes to higher costs for producers is the higher duties charged on imported commodity items such as olive oil. This is perhaps a sign of increased protectionism in the global economy, but producers are not in the position to absorb these costs and there are indications they will have to pass these increases on to consumers.

2. Theoretical Argument

The profit driven food industry is a problem particularly for the developing world. Today's food crisis is fundamentally linked to political and ideological crisis facing the world. Food companies operate for maximization of financial gains. Food crisis is political in the sense that our food system can be understood in relation to political (in) stability. To think of it, food was our first form of wealth and its production our first economic enterprise. Agriculture gave rise to rudimentary economic organization and specialization as well as explicit economic paradigm – capitalism. When surging population growth exceeded existing production methods and threatened famine, there was a shift to technologies that led to larger production scales and ultimately to the creation of a global system of food trade. These processes accelerated the industrial revolution.

Farms came to be run like factories turning inputs of seed, feed, and chemicals into steady outputs of grain and meat. Individual shopkeepers such as the butcher, the baker and the greengrocer are consolidated into huge retail supermarkets.

At every level the food industry has become an industrial economy with raw materials handled like any other commodity: produced at the lowest costs, shipped to where demand is high, through resources extracted from the earth with no regard for future and via contracted structures.

This is the paradox of the food economic system, and cause of most of current problems. The profit driven food production undermines the eco-system. Hence, Roberts (2008) argue that physically food is unsuited to mass production. When engineer plants and livestock to make them readily available for the next supply, we are forced to put preservatives, flavorings and other additives to make them usable like naturally produced food.

This comes at the cost of our health. Mass production, cheapness, uniformity and heavy processing work for agricultural capital. Much of what is standard practice today brings perverse consequences to the world. The drive towards lower costs, higher production scales and larger markets remains a serious challenge facing the world.

The problems of the modern food system lie in capitalism. Capitalism has locked many producers into a vicious cycle. The more food they produce the more they must continue to produce. To grow wheat at a competitive price, a farmer has to continually lower the cost of production. Generally he does this by adopting a better technology, which enables to harvest each acre more quickly. The costs of the machine are built in the overall price of bushels of wheat. This has the effect of increasing the total supply of wheat. And if supply rises faster than demand, the prices will fall. This will mean that farmers must invest in more technology to produce more bushels.

Roberts (2008) identified this challenge as technology treadmill. Success is now determined by the farmer's capacity to continually cut their per unit costs, which typically means moving more numbers of units. This volume imperative leads to food safety problems – as seen in pathogens and contaminants.

The modern food system with its abundance has not come close to elimination of hunger. Hunger and starvation are daily experiences across the world.

Table: Percentage of children under five who are underweight, by developing region, 1990 and 2007

Region	1990	2007
Developing regions	31	26
Sub-Saharan Africa	31	28
North Africa	11	7
South-East Asia	37	25
South Asia	54	48
Latin America and Caribbean	11	6

Source: UN (2009: 4).

There is great variation in the levels of food insecurity across the regions. North Africa and Latin America and the Caribbean are approaching levels in the developed world, but the situation is far grimmer in sub-Saharan Africa, South-East Asia, and especially in South Asia. While there was progress in all regions from 1990 to 2007, the decline in underweight children under five has been substantial in South-East Asia, but very slow in sub-Saharan Africa and South Asia. All in all, capitalism has caused immense inequality and general deterioration of the standards of living as national interests are pushed to the periphery (Danaher, 2011). Danaher (2011) argues that 150 years ago there was not great inequality between the standards of living between the north and Africa, Asia, and Latin America. But self-interest propelled slavery and unleashed colonialism which increasingly transferred wealth from the south to the north. Danaher (2011:1) points out that:

“Now the richest 20% of the world's population receives 83% of the world's income, while the poorest of the world receive just 5.6% of the world's income. The richest 20% of the world's population in northern industrial countries uses 70% of the world's energy, 75% of the world's metals, 85% of the world's wood, and 60% of the world's food”.

On the whole capitalism destroys society by putting interest of merchandisers and manufacturers at the center of policy making (Polanyi, 1944). Polanyi's (1944) demolition of society treatise argues for the fact that in capitalism the interest of capital dictates the direction of policy in capitalist countries.

3. Findings

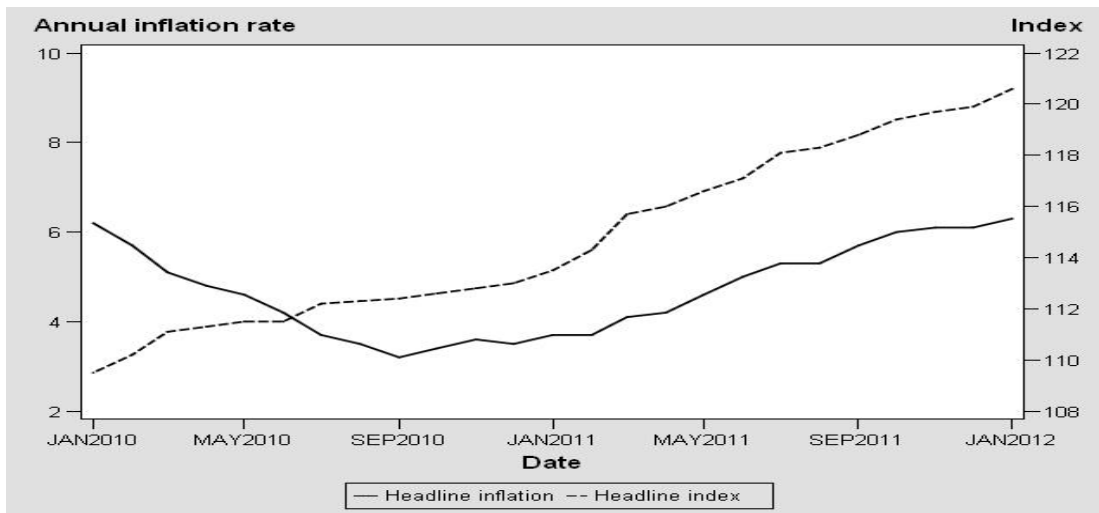
3.1 The cost of living

The escalating food and fuel prices are rapidly eating into the previously reasonably priced South African lifestyle.

Alongside accommodation, transport and education costs, groceries will dominate the next largest chunk of a family budget. There has been a large increase, of roughly 8 to10 percent, in the cost of food in the last two years, and the prices continue to skyrocket. A typical food bill for a family of two adults and two school-going children who take lunch to school every day, eat a home-cooked meal at night, and only indulge in luxury items such as sweets, chocolates and ice creams every so often, will amount to about 5,000 ZAR a month and upwards.

For a family of four, who eat out once a month, and eat home cooked meals for the rest, are still looking at a high food bill.

An example of a food bill for a family of two adults and two school-going children, who take lunch to school every day, and who eat a home cooked meal at night, and who only indulge in luxury items such as sweets, chocolates and ice creams every so often, spend about 5,000 ZAR a month and upwards. Most families on a budget prefer to buy groceries from large supermarkets that stock a wide variety of different brands, including local produce and imported goods,



Most retailers use 10% benchmark in increasing prices while the CPI is lower than that threshold.

The table below illustrates the monthly or weekly earnings of worker by different sectors of the labour market. Farm workers remain the lowest paid. At R69.00 per day their earning is the lowest. Construction workers, security guards, cleaners, forest workers and domestic servants earn within the R1 300 threshold. Teachers and police are better than these groups. Their earnings are higher because of the training and qualifications that are set as minimum requirement for the entry level. Farm workers, construction workers, security guards, cleaners, forest workers and domestic servants are likely not to afford private education, which hovers at R60 471.80 per annum. Only teachers and police can try, but they will still struggle. It will require a huge sacrifice from them.

Table 4: Minimum wages for different sectors

	Sector	Weekly/Monthly Earnings
1	Construction workers	R1 345
2	Mineworkers	R3 750
3	Municipal workers	R4 100
4	Teachers	R9 537
5	Nursing assistant	R5 000
6	Internship doctors	R16 500
7	Transport workers	R4 000
8	Security guards	R1 200
9	Cleaners	R1 100
10	Clothing machinist	R479 per week
11	Retail workers	R2 084.39
12	Hotel keepers	R1 981.48
13	Farm workers	R69 per day
14	Forest workers	R1 316
15	Domestic servants	R1 237.60
16	Police	R8 760

Source: Maile, 2013

In terms of this table the highest household expenditure is housing, water, electricity, gas and other fuels. The second highest (17%) expenditure group is transport. Many South Africans spend a considerable amount of money on transport. The largest 32% portion of income is spending on housing, electricity, water and fuel.

Table 6: Total and average annual household consumption expenditure by main expenditure group

Main expenditure groups	Rand		Percentage contribution
	Total (in millions)	Average	
Food and non-alcoholic beverages	159 973	12 200	12,8
Alcoholic beverages and tobacco	13 697	1 045	1,1
Clothing and footwear	56 170	4 284	4,5
Housing, water, electricity, gas and other fuels	399 991	30 505	32,0
Furnishings, household equipment and routine maintenance of the dwelling	63 944	4 877	5,1
Health	17 794	1 357	1,4
Transport	213 977	16 319	17,1
Communication	35 431	2 702	2,8
Recreation and culture	38 020	2 900	3,0
Education	33 355	2 544	2,7
Restaurants and hotels	30 332	2 313	2,4
Miscellaneous goods and services	183 614	14 003	14,7
Unclassified items	1 760	134	0,1
Total	1 248 058	95 183	100,0

* Due to rounding, figures do not necessarily add up to totals

Source: Statistics South Africa, 2012

3.2 Food prices

Consumers have been facing food price increases significantly higher than the rate of inflation. From April 2011 to April 2012, the price of basic food items like milk, bread, margarine, rice, maize meal and meat rocketed. The poorest South Africans are most affected food price increases. Urban consumers paid R8.23 for a 700g loaf of brown bread and R9.19 for a loaf of 700g white bread during April 2012 – increases of 12.74 percent and 11.66 percent respectively, compared with the same time last year. The price of 5kg of special maize meal leapt by 56.01 percent. However, despite being worse off than their urban counterparts, rural consumers paid even more, with statistics showing that the same basket of food cost them R14.89 more.

If you look at the cost of the food basket expressed as a share of the average monthly income of (this portion of the population), it increased from 34.1 percent in April 2011 to 38.7 percent in April 2012. But we should not be misled by this percentage change. If you look at the individual items, it is rather concerning that the most basic commodities are far above the inflation rate.

Breaking down the statistics for both rural and urban customers, we found that individual price increases for rural consumers, although mostly less than urban consumers, were not relative to the difference in the incomes of both groups. In the case of 750ml Sunflower Oil, rural consumers were paying R1.17 more, while urban consumers only 21 cents more. The case was the same with 2.5kg white sugar, where rural consumers were paying R2.70 more and urban consumers R1.98 more. It can be stated that significant price inflation of 10 percent or more – experienced for important products such as maize meal, bread, cabbage, tomatoes, chicken, milk and margarine – would have a negative impact on household food security.

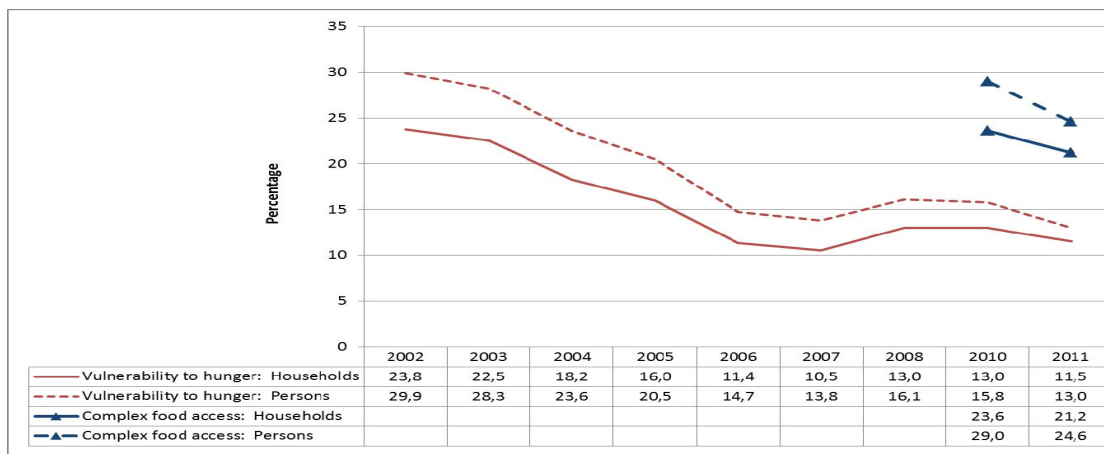
Table: Percentage of food price increase 2011-2012

	Food item	% of increase 2012
1	Canned tuna	17.4 percent
2	Whole fresh chicken	10.1 percent
3	Stewing beef	7.8 percent
4	Special maize meal	56 percent
5	Super maize meal	34.6 percent
6	Brown bread	12.7 percent
7	White bread	11.7 percent
8	Rice	8.6 percent
9	Cabbage	34.9 percent
10	Tomatoes	19.7 percent
11	Milk	11.9 percent
12	Eggs	4.5 percent
13	Margarine	10 percent
14	Peanut butter	25.5 percent
15	Butter beans canned	9.9 percent
16	Coffee	15 percent
17	Ceylon/black tea	6.4 percent

3.3 Access to food

The figure below shows that the percentage of households that experienced hunger decreased from 23,8% in 2002 to 10,5% in 2007, before rebounding slightly to 13% in 2008. The percentage dropped to 11,5% in 2011. The percentage of persons who were vulnerable to hunger reflects the pattern of households. The percentage of households that were vulnerable to hunger declined from 29, 9% in 2002 to 13% in 2011, including a spell during which the percentage increased to 16, 1% in 2008 before continuing its decline. The figure below shows that the percentage of households that had limited access to food decreased from 23,6% in 2010 to 21,2% in 2011. Simultaneously, the percentage of persons with more limited access to food declined from 29,0% in 2010 to 24,6% in 2011.

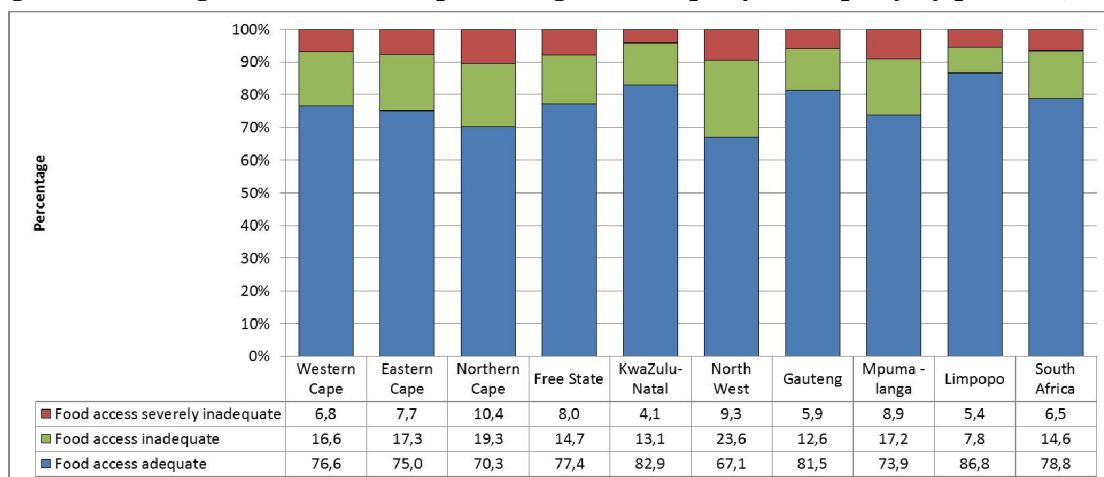
Figure: Vulnerability to hunger and access to food, 2002-2009; 2010-2011



Source: Statistics SA, 2012

This figure shows that food access problems were the most serious in North West where 32,9% of households had inadequate or severely inadequate food access. They were followed by Northern Cape (29,7%), Mpumalanga (26,1%), Eastern Cape (25%), Free State (22,6%) and Western Cape (22,4%). Put differently, the percentage of households experiencing food adequacy or inadequacy shows an overwhelming 78,8% having adequate access to food. Only a small portion of households, 14,6%, experience inadequate food access. Similarly, only 6,5% severely experience inadequate food access. What this data tells us is that access to food is not major problem in South Africa. Many people have adequate access to food.

Figure: Percentage of households experiencing food adequacy/inadequacy by province, 2011



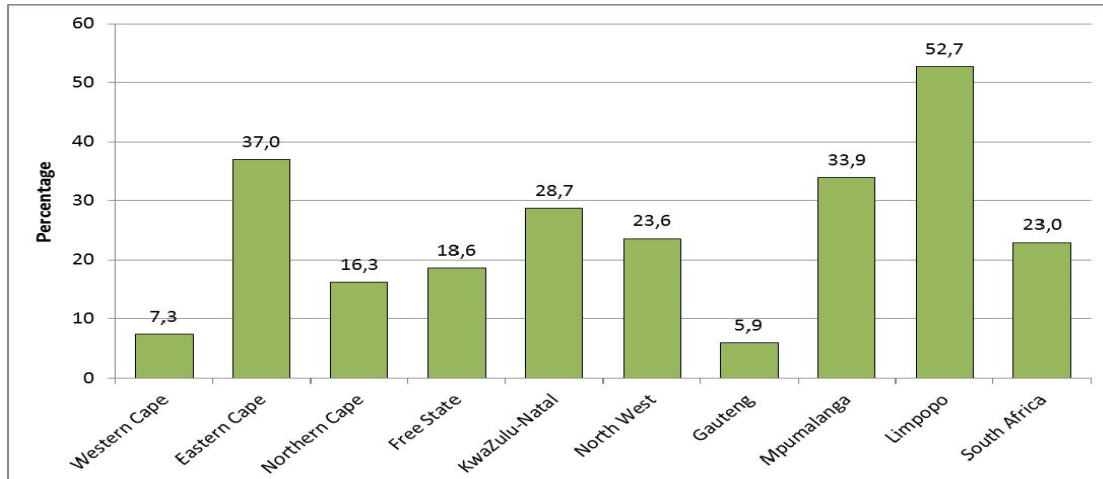
Source: Statistics SA, 2012

3.4 Involvement in agricultural activities

The figure below shows that almost a quarter of South African households (23%) were involved in agricultural production. Of these, 9,1% cultivated farmland while 89,5% created backyard gardens.

Nationally, 84,1% of households that were involved in agriculture were involved in an attempt to secure an additional source of food. It is also clear that 94,6% of households in Limpopo and 90,6% of households in Eastern Cape wanted to augment their existing sources of food. According to Figure 41, 31,3% of households in Western Cape used it as a leisure activity. In Northern Cape, 28, 9% of households attempted to create an additional source of income through agriculture.

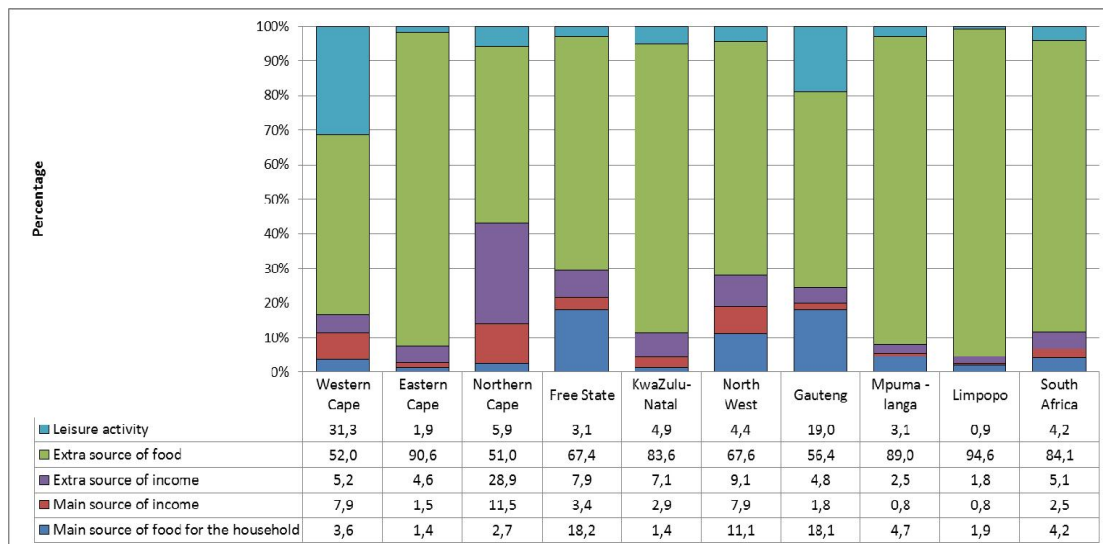
Figure: Household involvement in agricultural activities by province, 2011



Source: Statistics SA, 2012

The figure below demonstrates that 84,1% of households are engaged in agricultural activities to produce food for their families. It means that subsistence farming is still regarded as the source of food. Only 4, 2% do agriculture for leisure reasons. Those who farm for income purposes constitute only 5,1%. Similarly, only 2, 5% are engaged in agriculture as the main source of income.

Figure: Main reason for agricultural involvement by province, 2011



Source: Statistics SA, 2012

The figure below shows that of the households that were engaged in agricultural production, 41, 9% cultivated food and grains, while 40,6% grew fruit and vegetables. Poultry was produced by 45, 8% while 43,9% also produced livestock. Only 12, 3% of the households involved in agriculture reported getting agricultural-related support from the government during the year preceding the survey. The only provinces where significant support was provided were Eastern Cape (26, 9%), KwaZulu-Natal (17,6%) and Western Cape (12,7%). Nationally, three per cent of the households reported receiving training and 6, 4% received dipping services. The most frequently used services in Eastern Cape and North West were dipping services, whilst visits by the agricultural extension officer were the most commonly mentioned services in Eastern Cape and Gauteng.

Table: Nature of agricultural production activities per province, 2011

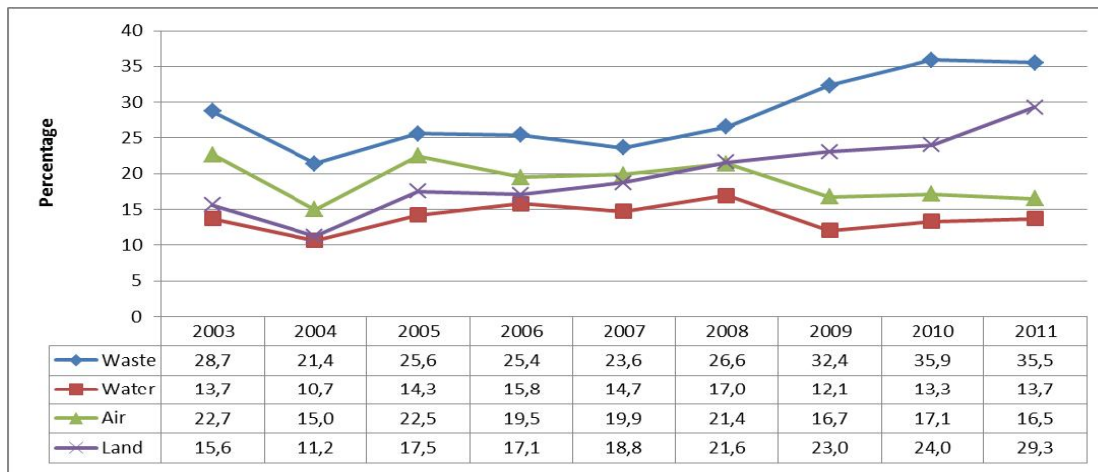
Production activity	Statistic (Numbers in thousands)	Province									
		Western Cape	Eastern Cape	Northern Cape	Free State	KwaZulu-Natal	North West	Gauteng	Mpumalanga	Limpopo	South Africa
Livestock production	Number	56	421	37	48	408	104	107	90	208	1 479
	Percentage	48,6	63,0	70,6	28,4	51,2	44,0	47,5	25,5	27,6	43,9
Poultry production	Number	10	470	20	49	413	123	24	173	260	1 542
	Percentage	8,8	70,3	38,2	29,3	51,8	52,0	10,8	48,9	34,5	45,8
Grains and food crops	Number	1	371	2	21	372	11	11	170	450	1 410
	Percentage	1,2	55,4	3,0	12,5	46,7	4,8	5,1	48,1	59,8	41,9
Industrial crops	Number	1	2	0	0	2	0	0	2	2	9
	Percentage	1,0	0,3	0,0	0,0	0,2	0,2	0,0	0,6	0,3	0,3
Fruit and vegetable crops	Number	54	278	11	111	181	98	106	236	292	1 367
	Percentage	47,2	41,6	21,3	66,0	22,8	41,5	47,1	66,6	38,7	40,6
Fodder grazing/pasture grass of animals	Number	2	5	1	2	4	2	3	4	3	24
	Percentage	1,3	0,8	1,6	1,0	0,6	0,7	1,1	1,1	0,4	0,7
Forestry	Number	1	0	0	0	5	0	2	1	1	9
	Percentage	0,4	0,0	0,0	0,0	0,6	0,0	0,9	0,3	0,1	0,3
Fish farming/aquaculture	Number	0	0	0	0	0	0	0	1	0	1
	Percentage	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,3	0,0	0,0
Game farming	Number	0	0	0	0	0	1	0	1	0	2
	Percentage	0,0	0,0	0,0	0,0	0,0	0,3	0,0	0,3	0,0	0,1
Other	Number	5	1	0	2	3	1	0	1	2	16
	Percentage	4,5	0,2	0,9	1,3	0,3	0,5	0,0	0,3	0,3	0,5

Numbers below 10 000 are too small to provide accurate estimates. Sensitive cells are indicated by an asterisk.
A particular household can be involved in more than one activity and percentages therefore do not add up to 100%.

Source: Statistics SA, 2012

3.5 Environmental challenges

Figure: Percentage of households who experience specific kinds of environmental problems, 2003–2011



Source: Statistics SA, 2012

The figure above reveals that waste removal problems and littering (35,5%) as well as land degradation and soil erosion (29,3%) were the two environmental problems that concerned the largest percentage of households. Strikingly, the percentage of households that considered land degradation and soil erosion a problem increased from 15,6% in 2003 to 29,3% in 2011. The proportion of households that felt that there were problems with littering and waste removal in their areas increased substantially since 2003 when 28,7% of households regarded this as a problem. The percentage of households that perceived water pollution as a problem has fluctuated significantly before settling on 13,7% in 2011, the same level as in 2003. Households that considered air pollution a problem decreased from 22,7% in 2003 to 16,5% in 2011.

Petrol	Reef			Coast		
	Unleaded		LRP	Unleaded		LRP
	93	95	93	93	95	95
05 December 2012	1178	1201	1178	1160	1166	1166
07 November 2012	1187	1210	1187	1169	1175	1175
03 October 2012	1197	1220	1197	1179	1185	1185
05 September 2012	1176	1197	1176	1158	1162	1162
01 August 2012	1083	1104	1083	1065	1069	1069
04 July 2012	1061	1082	1061	1043	1047	1047
06 June 2012	1150	1167	1150	1132	1132	1132
02 May 2012	1205	1222	1205	1187	1187	1187
04 April 2012	1177	1194	1177	1159	1159	1159
07 March 2012	1105	1123	1105	1188	1193	1193
01 February 2012	1077	1095	1077	1060	1060	1065
04 January 2012	1043	1061	1043	1026	1031	1031

3.6 Petrol increases

Table: Petrol price increases in 2012

Petrol	Reef			Coast		
	Unleaded		LRP	Unleaded		LRP
	93	95	93	93	95	95
05 December 2012	1178	1201	1178	1160	1166	1166
07 November 2012	1187	1210	1187	1169	1175	1175
03 October 2012	1197	1220	1197	1179	1185	1185
05 September 2012	1176	1197	1176	1158	1162	1162
01 August 2012	1083	1104	1083	1065	1069	1069
04 July 2012	1061	1082	1061	1043	1047	1047
06 June 2012	1150	1167	1150	1132	1132	1132
02 May 2012	1205	1222	1205	1187	1187	1187
04 April 2012	1177	1194	1177	1159	1159	1159
07 March 2012	1105	1123	1105	1188	1193	1193
01 February 2012	1077	1095	1077	1060	1060	1065
04 January 2012	1043	1061	1043	1026	1031	1031

Source: The AA of South Africa, 2013

The increase in fuel has trickle down effect on the economy. At production level the increase in fuel affect production costs which are effected in pricing the items produced to cover all costs incurred. Processing is also influenced by fuel increases. As prices increase, retailers also increase the prices of food items on the shelves. When the items reach the consumer it would have increased in price many times. For people with lower salaries their disposable income is reduced to the smallest slice.

Table: Diesel price hikes 2012

Diesel	Reef		Coast	
		New		New
	0.05%	0.01%	0.05%	0.01%
05 December 2012	1139	1144	1114	1120
07 November 2012	1144	1150	1119	1126
03 October 2012	1134	1141	1109	1117
05 September 2012	1028	1033	1007	1013
01 August 2012	1026	1032	1001	1007
04 July 2012	1011	1016	986	992
06 June 2012	1074	1078	1049	1049
02 May 2012	1098	1103	1074	1074
06 April 2012	948	953	928	933
04 April 2012	1089	1094	1064	1070
07 March 2012	1037	1040	1017	1020
01 February 2012	1027	1031	1031	1031
04 January 2012	1028	1033	1007	1013

Source: The AA of South Africa, 2013

3.6 Summary of the main Findings

The following key findings emerged from the study:

1. Most retailers use 10% benchmark in increasing prices while the CPI is lower than that threshold.
2. Many salary thresholds in different occupations show patterns of inequality and inadequacy thus indicating inability to afford food.
3. Many South Africans spend a considerable amount of money on transport.
4. Significant price inflation of 10 percent or more would have a negative impact on household food security.
5. Vulnerability to hunger declining, while access to food has increased significantly.
6. The majority of South African are engaged in agricultural activities for food production.
7. The largest percentage of households are concerned with environmental problems such as waste removal problems, littering, land degradation and soil erosion.
8. Petrol hikes increase the cost of living, and locks many people in the poverty trap.

4. Discussion

All countries across the world are affected by the deepest and most serious economic crisis in at least the last 80 years. The crisis - caused by a range of factors including gross imbalances and inequities in the global economic system, the impact of the financialisation of economies, ineffectual regulation in several of the major world economies and poor business practices – has resulted in significant asset depreciation, closures of companies, rising unemployment and a sharp slowing down of economic growth, with most highly industrialised countries entering a recession. Like other developing countries which are strongly integrated into the world economy and significantly dependent on its good health, South Africa has been affected by the sharp fall in demand for its export products and the fall in prices of key export commodities. In addition, the international credit crisis has meant that funds have become scarce and expensive and that portfolio investors are wary of emerging markets, including South Africa.

According to Dorward, (2011) the 2008 spike in world grain prices is widely recognised to have had serious impacts on food security and poverty, but these high grain prices are commonly described as low in historical terms – an inconsistency resulting from the use of advanced- and global-economy price indices in calculating real prices. This ignores the high share of food in poor people's expenditures and the indirect effects of income growth on expenditure patterns of rich consumers. Poor consumers have not experienced the same falls in real food prices and are more vulnerable to price shocks. Different price indices must be developed to take account of differences between consumer groups.

Though South Africa produces sufficient food for its population, skyrocketing prices prevent the poor - most of them urban households - from getting adequate nutrition. The hungriest people are in Cape Town (80%) and Msunduzi, in KwaZulu-Natal (87%). A five-year study by the University of Cape Town's African Food Security Unit Network has exposed a food crisis that constitutes a "death sentence" for many and which the government has labeled as "serious". It found that, in Johannesburg, 43% of the poor faced starvation and malnutrition. Researchers believe the figure could be higher.

South Africa is in dire straights. The entire country is affected. It is not just rural areas. Every day millions of people go to be bed hungry. There are children whose daily food is half a white-bread sandwich. The plight of the hungry was highlighted in 2011 when four children, aged between two and nine, died in a farmer's field as they began an 18km walk in search of their mother and food in Verdwaal, North West. It was later discovered that they had not eaten for more than a week.

The challenge of food security in our cities is greater than imagined. This is because of poverty. People are simply too poor to buy food. On top of this, poor areas have seven times fewer supermarkets than rich areas, making it a struggle to access nutritional food. This forces households, especially those that run out of money before the end of the month, to borrow and buy food on credit. If supermarkets do move to these [poor] areas it often forces informal food traders out of business, making people more food insecure."

Though a higher proportion of rural households face food insecurity, when you look at the different scales of food insecurity - which range from mild to moderate and severe - more urban households fall within the severe food insecurity category. Severe food insecurity means households are forced to cut back on meal sizes and numbers, with people going hungry for days. Our urban population is facing severe malnourishment.

5. Conclusion

It can be concluded that most retailers use 10% benchmark in increasing prices while the CPI is lower than that threshold. This practice increases the strain on the households income. At work many employees receive salary increases that are based on the current inflation rate. The 10% increase is unfair and unfounded.

Many salary thresholds in different occupations are a legacy of apartheid. Transformation is not succeeding in many occupations. The majority of those underpaid are Blacks. This exacerbates poverty and such a salary becomes a poverty trap. Many salary thresholds in different occupations show patterns of inequality and inadequacy thus indicating inability to afford food.

Many South Africans spend a considerable amount of money on transport. This is a legacy of apartheid. Many people live far away from their workplace. Many commute to work everyday. Large amount of their salary is spent on taxis. With the regular increase in petrol, household are bound to pay more for transport. It is important for the government to subsidize taxis so as to bring relieve to the public.

Significant price inflation of 10 percent or more would have a negative impact on household food security. Inflation needs to be targeted so as to increase the benefits of economic growth to the working class.

Politically South African farming is fragile. Therefore needs careful management so that it does not fall apart. The current lack of certainty in land policy aggravates the fragility. While South Africa can be lauded for the decline in vulnerability to hunger and an increase in access to food, careful measures need to be put in place to arrest the current developments and sustain the positive elements of the current system.

Land should be made available to those who demonstrate the ability to produce more food. The fact that there are those who farm for leisure is a good sign. Government needs to harness the energies of those willing to farm by creating a support system that can attract farmers into the agricultural industry. The majority of South African are engaged in agricultural activities for food production.

Environmental challenges are serious from a global perspective. Everybody needs to do their bid. Serious penalties should be introduced to those who violate environmental regulations. The largest percentage of households is concerned with environmental problems such as waste removal problems, littering, land degradation and soil erosion.

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