

## The impact of the drought

on South African consumers and the agricultural sector

The impact of the 2015/16 drought has been far-reaching. Since the end of 2015, the severity of the drought has been evident across the key summer crop production regions. The greatest shock occurred in the white maize market where the total area under production plummeted by more than 25%. This has caused the local market to move from export to import parity price levels.



he effect of the depreciation of the rand also had a significant impact on commodity and food markets. The exchange rate not only shifted the level of the import and export parity price band, but also impacted on every stage of the food value chain.

Average white maize prices increased by more than 60% over the past year. Consequently, by June 2016, the cost of a typical staple basket (maize meal, bread, rice and potatoes) of a low-income household had increased by approximately 29% year-on-year.

## **Food price inflation**

The last official publication by Statistics South Africa reported an overall food price inflation rate of 10,8%. The Bureau for Food and Agricultural Policy (BFAP) Baseline projections suggest that food price inflation will peak at 14% by the end of 2016, as the inflationary cost components within the value chain are gradually feeding through to retail prices (*Figure 1*).

Figure 1: Outlook on food price inflation. (Source: BFAP Baseline 2016)

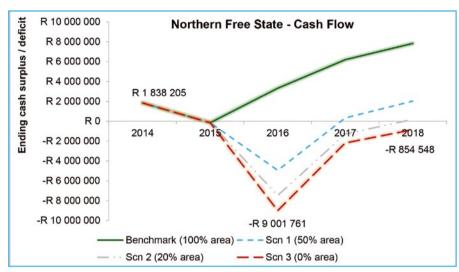


Whereas low-income consumers are faced by high staple food prices, producers in drought-stricken areas are facing financial distress. The drought has not only affected the current production season, but will also have financial and debt implications for farm businesses in the near future.

The cash flow position of a prototype farm in the Northern Free State producing

maize, soya beans and sunflowers is presented in *Figure 2*. In a scenario where the producer was unable to plant in the 2015/16 production season, it will take more than two years to return to a positive cash flow position if he has access to credit in order to finance the input costs in the following production season.

Figure 2: Cash flow projections of different scenarios for a Northern Free State prototype farm. (Source: Baseline 2016.)



Yellow maize, soya bean and sunflower prices have also increased sharply, resulting in considerably higher feed costs and placing profit margins of intensive livestock operations such as poultry, pork and dairy under severe pressure.

### **Higher feed costs**

While the impact of the drought on intensive industries has resulted in higher feed costs, the impact on extensive livestock industries that depend on grazing has been even more profound. The number of cattle slaughtered increased over the second half of 2015. The national cow herd has declined by as much as 15% from 2013 levels.

Figure 3 illustrates that the sharpest decline occurred in the North West and the Free State, where cow numbers in early 2016 dropped by approximately 17% from 2015 levels. The four provinces presented alongside the national average (Eastern Cape, Free State, KwaZulu-Natal and North West) jointly account for more than 70% of the national cattle herd.

Figure 3: Index of cow herd numbers. (Source: UFS and RPO with BFAP calculations, 2016)



The drought has not only impacted South Africa but also most of the countries in the region, causing white maize prices to increase sharply. *Figure 4* compares the maize crop over the past three seasons for countries in the Southern and Eastern African regions and presents the percentage increase in white maize prices since 2015. South Africa, Mozambique, Malawi and Zimbabwe were affected the most severely.

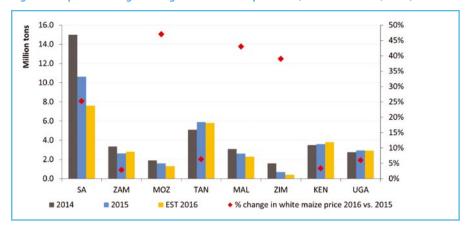
## **Dependence on imports**

Although Zambia is currently expected to have surpluses of approximately 600 000 tons available to export into the region due to favourable rainfall in the northern parts of that country, a number of deficit countries such as Swaziland, Lesotho, Namibia, Botswana and southern Mozambique will remain dependent on white maize imports from South Africa.

By June 2016, the cost of a typical staple basket (maize meal, bread, rice and potatoes) of a lowincome household had increased by approximately 29% year-on-year.



Figure 4: Impact of drought on regional trade flow patterns. (Source: ReNAPRI, 2016)



Based on the latest estimates by the South African Supply and Demand Estimates Committee (SASDEC), the country would have to import approximately one million tons to supplement local supplies and ensure sufficient carry-over stock until the early deliverers enter the market in February and March 2017.

By August 2016, South Africa had only imported 140 000 tons of white maize. However, the question remains where the maize will derive from. The United States (US) and Mexico are the only potential sources of white maize on the global market.

Although American farmers have responded to premiums on white maize and have greatly expanded the area under production, genetically modified (GM) white maize cannot be imported from the US as the required registration of specific genetically modified organism (GMO) events present in the seed planted in the US has not taken place in South Africa.

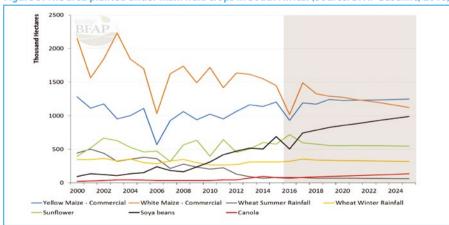
### **Food security vulnerable**

This issue is currently being dealt with by the Department of Agriculture, Forestry and Fisheries (DAFF), and until it has been resolved the white maize, and therefore food security, situation in South Africa will remain vulnerable.

Over the next 18 months, if rainfall in the 2016/17 season returns to normal, BFAP projects (*Figure 5*) that the area under production will increase significantly as a result of higher grain and oilseed prices. Average white maize prices for 2017 could be 36% lower than in 2016. This should result in average maize meal prices being roughly 19% lower than in the current year.

Similarly, the area under soya beans is also expected to greatly increase to approximately 750 000ha from its current level of just over 500 000ha. With higher availability of feed grains and oilseeds, prices are expected to decline and profit margins in the intensive livestock industries are expected to improve.

Figure 5: The area planted under main field crops in South Africa. (Source: BFAP Baseline, 2016)



The agricultural sector has demonstrated its resilience in the past, and with well-informed, timely reactions it will recover. There are a number of lessons to be learned regarding actions that have to be taken not only in order to improve the country's resilience in times of drought, but also to bring the industry back on the growth path of the National Development Plan (NDP).

# Average white maize prices for 2017 could be 36% lower than in 2016.

For instance, as a result of climatic risks, international reinsurance companies are considering a partial withdrawal and restructuring of local agricultural insurance. This would have a detrimental effect on future growth and broad-based development of agriculture in South Africa.

## **Crop insurance**

Local government needs to consider the crop insurance programmes offered by various other countries, where the state provides an agricultural insurance guarantee of last resort to reinsurance companies, ensuring cost-effective availability of crop insurance.

Another action to be considered is the development of a drought early warning system, which provides monthly reports on seed sales, planting progress, crop estimates via the Crop Estimates Committee (CEC), household food consumption per district, dam levels and water availability in rivers, infrastructure conditions and the utilisation of key infrastructure such as ports, railways and water canals.

Response to the current drought must continue to foster an enabling environment where investment can flourish, in order for the sector to demonstrate growth.

Contact BFAP on 012 420 5021 or admin@bfap.co.za for more information.