

Extreme weather, trade and fertilizer subsidies

February 2023

Welcome to the monthly food price tracker. This is an initiative of the African Market Observatory (AMO) of the [Centre for Competition, Regulation and Economic Development](#), at the University of Johannesburg, and its partners. It summarises key trends in prices in East and Southern Africa (ESA) for selected staple food products, focusing on highlighted areas. Please also see the [previous trackers](#).

This issue of the AMO price tracker looks at fertilizer subsidies in the ESA region, the ongoing effects of extreme weather, as well as positive developments in cross border trade in line with those that we have been calling for.

Key developments

- Extreme weather continues to hit the region: Tropical Cyclone Freddy has killed [over 500 people](#) in Malawi, Mozambique and Madagascar, and crops will be affected
- Below-normal rainfall is expected to persist in the [Horn of Africa](#) over the next three months, affecting harvests
- Trade is essential to mitigate the effects, with increased exports from areas with good growing conditions:
 - Uganda's [maize export revenue](#) increased with a good harvest and demand from drought affected neighbours
 - Tanzania has committed to importing 100,000 metric tonnes of [soybeans](#) from Malawi in 2022/23
 - However, Zambia continues to restrict maize exports, adding to regional shortages, while prices to farmers in Zambia have fallen to \$235/t
 - On positive side [Kenya has agreed](#) to invest in maize production in Zambia given its good land and water, and meeting Kenya's demand through regional trade.
- High fertilizer prices have placed great pressure on subsidy programmes, with e.g. Kenya continuing the programme of subsidised [fertilizer](#) for the 2023 long rains season

Tropical Cyclone Freddy

In February 2023, Tropical Cyclone Freddy hit southern Africa as a direct result of climate change. Climate change has resulted in warmer oceans and the heat energy from the water's surface has caused [stronger storms](#). Cyclone Freddy's accumulated cyclone energy, which is an index that is used to measure the energy released by a tropical cyclone, is equivalent to that of an [average full North Atlantic hurricane season](#).

The death toll due to this cyclone has exceeded 500 in Malawi, Mozambique and Madagascar, with Malawi being the [hardest hit](#) country accounting for 438 of the deaths, as at 19 March 2023. This month-long storm is likely to be the [longest lasting cyclone](#) in the southern hemisphere. Nearly 90 000 people have been displaced as their homes were swept away. The severe flooding and landslides have [swept away roads and led to power outages](#), hindering rescue efforts and medical assistance.

The Intergovernmental Panel on Climate Change (IPCC) previously warned that tropical cyclones would likely become [more severe with greater wind speeds](#) and more intense precipitation. These recent developments in the region will have a significant impact on crops. It serves as a caveat for future storms which will impact on food security. This illustrates the urgent need for actions to tackle the climate emergency.

It is imperative that concerted actions are taken to improve the workings of agricultural markets so that they can be resilient in the face of climate change. Regional trade in fair and competitive markets is essential to this as the region has the potential to substantially expand agricultural production.

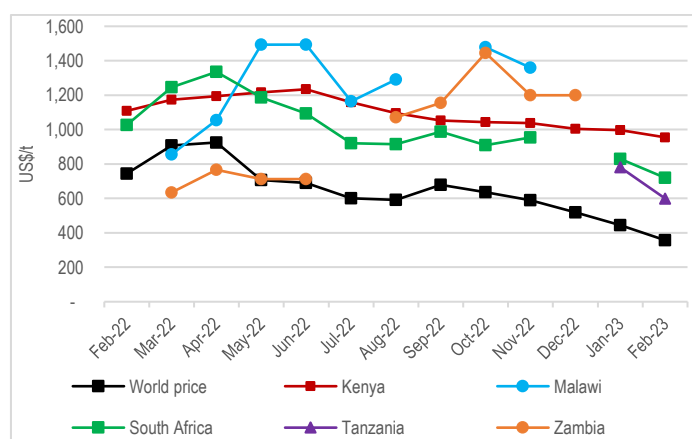
High fertilizer prices and challenges to subsidy programmes

Africa's agricultural yields lag the rest of the world, making the continent largely reliant on food imports. Over the past decades, Africa's food import bill has more than tripled, reaching about [US\\$35 billion annually](#). Much of these imports could be produced in Africa, creating much needed jobs and incomes for countries, and African youth and smallholder farmers.

Nitrogen, Potash, and Phosphate are important plant nutrients and, contained in appropriately applied fertilizer products, they enable increased production. Fair pricing of fertilizers [is necessary for food production in many developing nations](#), yet prices have been extremely high over the past 18 months.

The high prices are partly due to world market factors. Between September and November of 2021 world fertilizer prices more than doubled: prices of urea fertilizer increased from [US\\$420/t to US\\$890/t](#), largely due to high natural gas prices – an important input for nitrogen-based fertilizers. [This increase in prices presented challenges](#) for farmers in the region, coupled with limited fertilizer availability.

Prices in the region have, however, been much higher than on international markets and have squeezed farmers' margins. And, while international [fertilizer prices have eased over 2022 and 2023](#), they still remain at much higher levels within the region. From December 2022 to February 2023, prices of urea in Kenya were more than double the world price (even while declining slightly, Figure 1). We observe a similar picture in Malawi and Zambia, where prices have been even higher than in Kenya.

Figure 1. Urea prices

Source: World price is from the World Bank. Eastern Europe & South Africa prices are from Grain SA. Kenya and Uganda are from AfricaFertilizer. Malawi, Tanzania and Zambia are from AfricaFertilizer and from POKET app users.

Countries within East and Southern Africa have for many years attempted to alleviate the negative effects of high prices through fertilizer subsidies. The elevated prices in recent years have placed massive pressures on the subsidy schemes.

In late 2022, the government of [Tanzania revised the fertilizer subsidy programme](#), to pay US\$26.36 for every bag of fertilizer bought. This saw the price of a 50kg bag of urea fertilizer which sold at US\$56.29 reduced to US\$29.93 to farmers under the

subsidy programme. The Kenyan government has [committed to subsidise 500 thousand tonnes of fertilizer for the 2023](#) long rains to improve yields and ultimately lead to reduced food prices.

The Malawi government has faced challenges with the costs involved in the subsidy programme and have proposed redesigning the country's Affordable Input Programme (AIP) to [fix fertilizer prices](#). The claim is that with fixed fertilizer prices, there would be no need for an AIP – whose funds continue to be embezzled - however, there is instead likely to be shortages as a low fixed price will not incentivize suppliers.

To boost fertilizer supply to 850 000 smallholder farmers in Africa, the Africa Fertilizer Financing Mechanism (AFFM) [has accepted \\$10.15 million from Norwegian Agency for Development Cooperation](#). These funds will allow the AFFM to provide up to 36 months credit guarantees in Uganda, Kenya and Mozambique.

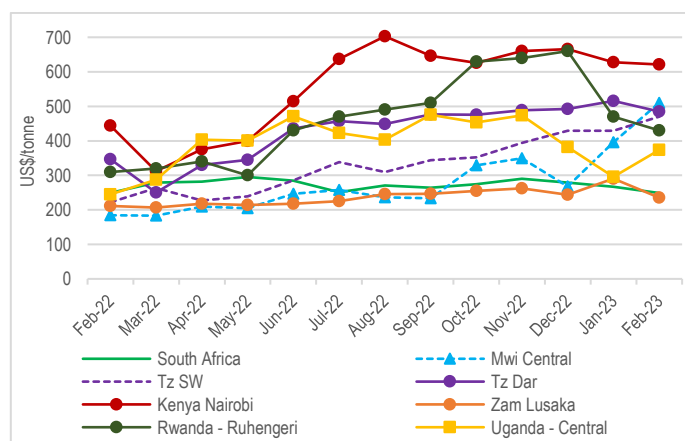
These are all attempts to reduce the impact of high fertilizer prices in the region. However, research has shown that fertilizer subsidies do not always achieve their intended outcomes in practice. Fertilizer subsidy programs are [often delayed](#) and sometimes they are [not targeted](#) to the [deserving beneficiaries](#).

Fertilizer subsidy programs can also have an effect of [reducing crop diversity](#). Fertilizer subsidies are normally targeted at certain crops – this provides an incentive for farmers to plant more of the subsidised crop and less of the others. [A study into the Zambia Farmer Input Support Program](#) found that the subsidy has largely failed to reduce poverty and improve food security as the costs of the subsidy programme outweighed the benefits. Reasons for this, among other things, were poor targeting, diversion, and leakage.

Maize prices

Maize prices in Malawi continued to increase in February and reached high levels of US\$510/t, surpassing Dar es Salaam prices (Figure 2). Users have informed us that this is due to the poor yields in the harvest season. Given high fertilizer prices and climate shocks, prices have been pushed to levels significantly above their February 2022 levels, with a year-on-year increase of 176%. Uganda prices also increased, averaging US\$373/t in the Central parts of the country, while prices in the Northern, Eastern and Western parts were at US\$405/t, US\$397/t and US\$361/t, respectively. This is due to increased regional demand, especially from Kenya amid the ongoing poor rains.

Figure 2. Maize prices, ESA and international



Source: based on price tracker data from multiple sources; South Africa is SA Futures Exchange price; USA is fob prices from SAGIS.

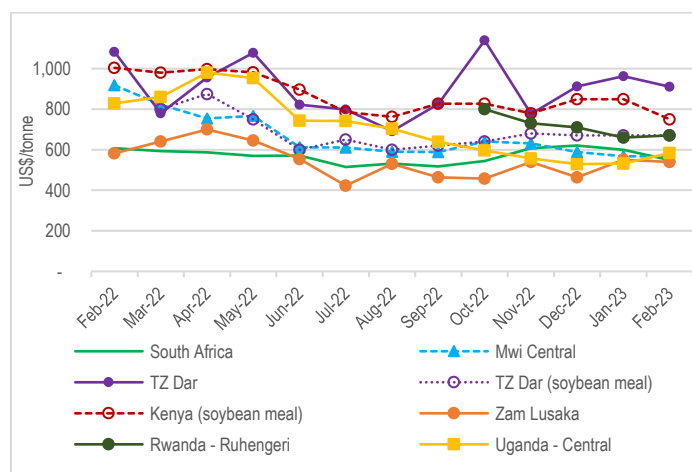
Apart from maize prices in Zambia, prices in the region are significantly above international benchmarks. Prices in Rwanda have been as high as in Nairobi in October to December 2022, and have now reduced towards levels in Tanzania and Uganda. Tanzania prices converged as Dar es Salaam prices were in line with southwest Tanzania prices, both settling around US\$490/t. Although maize prices in Kenya dropped very slightly in February, prices in March are [expected to increase](#) as scarcity creates stiff competition between millers.

Zambia has great potential to expand maize production and exports, however, high fertilizer prices have impacted on farmers. Zambia has restricted maize export licences which has led to price decreases to farmers. A recent agreement between Kenya and Zambia to source maize looks to realise Zambia's potential through regional integration to build resilience in agricultural markets. Zambia will grow maize [exclusively for the Kenyan market](#) as the Kenyan government seeks to lower the price of imported maize. Production costs in Zambia are much lower compared to Kenya and Zambia has arable land and favourable weather.

Soybean prices

As with maize prices, soybean prices in the consuming areas declined somewhat although remained extremely high in Dar es Salaam at US\$910/t, indicating excess margins over the prices in exporting countries such as Zambia and Malawi. Prices in these countries remained largely unchanged at US\$540/t and US\$570/t, respectively, in February. By comparison, Rwandan import prices at US\$670/t are closer to Ugandan prices around US\$584/t.

Figure 3. Soybean prices, ESA and international



Source: based on price tracker data from multiple sources. South Africa is SA Futures Exchange price.

Soybean meal prices in Nairobi declined to US\$750/t and US\$910/t in Dar es Salaam.

African Market Observatory

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The [African Market Observatory](#) is supported by the [COMESA Competition Commission](#).

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