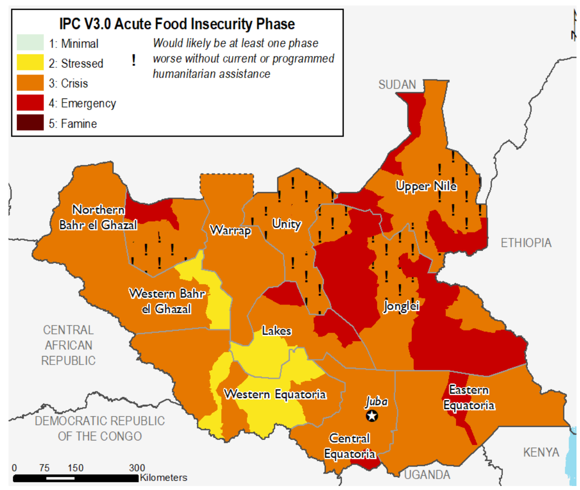
FEWS NET
FAMINE EARLY WARNING SYSTEMS NETWORK

SOUTH SUDAN Food Security Outlook — February to September 2020

Food assistance needs remain high and Catastrophic (IPC Phase 5) outcomes are possible in 2020

KEY MESSAGES

Current food security outcomes, February 2020



Source: *FEWS NET*

FEWS NET classification is IPC-compatible. IPC-compatible analysis follows key IPC protocols but does not necessarily reflect the consensus of national food security partners.

- In February, Crisis (IPC Phase 3) and Emergency (IPC Phase 4) outcomes remain widespread in South Sudan. According to the January 2020 IPC acute analysis, the acutely food insecure population is expected to reach 6.01 million people in early 2020 even in the presence of humanitarian food assistance. This number includes 20,000 people who are likely in Catastrophe (IPC Phase 5) in Akobo and Duk counties of Jonglei state, where the 2019 floods caused significant crop and livestock losses, destroyed household assets, and cut off pockets of communities from moving in search of other food sources. Of greatest concern are areas in Jonglei, Upper Nile, Northern Bahr el Ghazal, and Lakes states, where the negative impacts on livelihoods from the floods or from periodic intercommunal conflict have been most severe. Urgent food assistance is needed to save lives, protect livelihoods, and prevent more extreme food insecurity outcomes.

- 1.3 million children 6-59 months of age are acutely malnourished and in need of urgent treatment. The national prevalence of global acute malnutrition, measured by weight-for-height z-score among children 6-59 months of age, increased from 11.7 percent in December 2018 to 12.6 percent in December 2019 due to very high disease incidence and morbidity in flood-affected areas and poor dietary quality and diversity. A 'Critical' level of acute malnutrition is expected in over half of the 36 flood-affected counties through April.

- Humanitarian food assistance remains pivotal in preventing more extreme food insecurity outcomes in parts of Upper Nile, Jonglei, Unity, and Northern Bahr el Ghazal, where Crisis! (IPC Phase 3!) outcomes are present. However, the reach of food assistance remains well below the population in need, particularly in areas where large food gaps or extreme depletion of livelihood assets are indicative of Emergency (IPC Phase 4) outcomes. In January, WFP reached .89 million people with food assistance, which is 40 percent below the number of people assisted in January 2019.

- According to FAO's Desert Locust Watch, there is a risk that desert locust swarms may arrive in Eastern Equatoria from Kenya in March, coinciding with the bimodal planting stage. Given that crops will not have yet emerged, the swarms are expected to travel onward to breeding areas in Sudan. However, in the absence of effective control measures in the East Africa region, new swarms in May/June could pose a risk of damage to crop production and pasture.

- An early start to the lean season is anticipated in February/March 2020, due to low household food stocks from the 2019 harvest, high food prices, and seasonal declines in milk, fish, and wild food availability. The population in need of urgent food assistance is expected to rise to at least 6.48 million people by the July/August peak of the lean season. Further, a recent increase in intercommunal conflict may push the food insecure population even higher than estimated.

- Although planned food assistance is expected to scale up from May to July, planned levels are likely not sufficient to prevent Emergency (IPC Phase 4) outcomes in areas of greatest concern. It is also possible that pockets of highly vulnerable households could face Catastrophe (IPC Phase 5) in counties where food insecurity is already indicative of Crisis (IPC Phase 3) or worse area-level outcomes. In the event that the peace deal is not implemented and a resurgence of conflict prevents populations from moving in search of food sources or restricts humanitarian access for a prolonged period of time, Famine (IPC Phase 5) would be possible in South Sudan.

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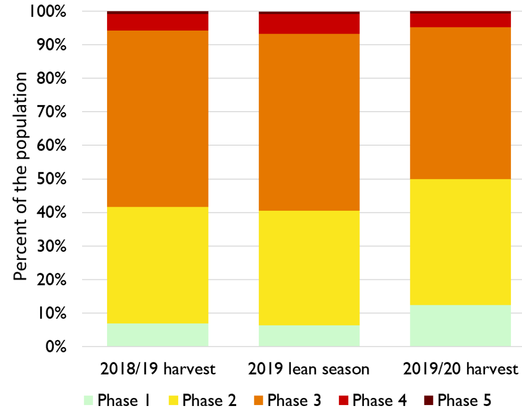
Peace deal advances, but a risk of Famine (IPC Phase 5) persists in 2020

The formation of the unity government in February advanced the next stage of the peace deal in South Sudan, where a relatively low level of conflict since late 2018 has facilitated gradual recovery of livelihoods activities. Data collected on food security outcome indicators, acute malnutrition, and contributing factors in Round 25 of the Food Security and Nutrition Monitoring System (FSNMS R25) showed that the population experiencing Crisis (IPC Phase 3) or worse outcomes in the presence of food assistance had declined by 14 percent from January 2019 to January 2020. The decline was mostly due to improvements within Western Equatoria, Eastern Equatoria, Western Bahr el Ghazal, and Unity states and driven by lower levels of conflict, an increase in net cereal production, and better wild food and fish availability after an above-average rainfall season. According to the convergence of food consumption indicators utilizing the FEWS NET matrix methodology, the proportion of the population experiencing food consumption gaps indicative of Crisis (IPC Phase 3) or worse was lower during the 2019/20 harvest compared to both the 2019 lean season and the 2018/19 harvest (Figure 1).

Figure 1. Food consumption outcomes according to the FEWS NET convergence matrix, FSNMS Rounds 23-25, South Sudan



Source: *FSNMS R23-R25*

Despite these improvements, approximately 5.29 million people or 45 percent of the national population were in Crisis (IPC Phase 3) or worse in the presence of humanitarian food assistance in January, including 40,000 people in Catastrophe (IPC Phase 5)[1] in Akobo, Duk, and Ayod counties of Jonglei state. Additionally, 15 counties across the country were in Emergency (IPC Phase 4). Acute food insecurity remains high in severity and scale due to years of conflict that have driven asset losses and significantly weakened the economy, as well as large-scale floods and periodic conflict that caused crop and livestock losses. According to FSNMS R25 data, 37 percent of households on average nationally reported a poor Food Consumption Score. In addition, 2.9 percent on average nationally reported severe hunger on the Household Hunger Scale indicative of Emergency (IPC Phase 4) or Catastrophe (IPC Phase 5). A 'Critical' level (GAM WHZ 15-29.9 percent)[2] of acute malnutrition exists in 20 counties that are classified as Crisis (IPC Phase 3) or worse, attributed to poor dietary quality and quantity and to the impact of flooding on disease incidence, morbidity, and access to health and nutrition services.

Although the implementation of the peace agreement is likely to facilitate further improvement in trade flows, market functioning, and area planted in 2020, high levels of food insecurity are expected to persist due to poor macroeconomic conditions, the residual effects of the late 2019 floods on rural livelihoods, and the effects of ongoing intercommunal conflict. Since severe acute food insecurity is already present in most flood-affected counties in January and most households will deplete their food stocks from the 2019/20 harvests by March, Crisis (IPC Phase 3) or Emergency (IPC Phase 4) outcomes are anticipated to be widespread. By the July/August peak of the lean season, the food insecure population is projected to reach at least 6.48 million people, equivalent to 55 percent of the national population. Further, more households may face acute food insecurity than projected at the January IPC due to the recent escalation of intercommunal conflict in parts of Jonglei, Warrap, and Lakes in January and February. The ongoing intercommunal conflicts have caused new internal displacement, disrupted food assistance delivery and trade, and led to loss of lives and household assets.

The most severe food security outcomes are expected among poor host households and newly returned IDPs or refugees who lack access to arable land and do not own livestock. Past trends have shown that these populations are vulnerable to becoming cut off from other food sources during seasonal flooding or periodic conflict, leading to Catastrophe (IPC Phase 5). In the event that the peace deal is not implemented fully, and a resurgence of conflict prevents populations from moving in search of food sources or restricts humanitarian access for a prolonged period of time, Famine (IPC Phase 5) would still be possible. Although past trends indicate that planned, funded, and likely humanitarian food assistance can mitigate the occurrence of worse outcomes, planned food assistance in early 2020 will most likely reach less than 45 percent of the population in need. A scale up of assistance levels is needed to save lives and prevent erosion of livelihoods assets.

[1] According to the IPC, a Famine (IPC Phase 5) has occurred when at least 20 percent of households in a given area have an extreme lack of food, the Global Acute Malnutrition (GAM) prevalence, as measured by weight-for-height z-score (WHZ), exceeds 30 percent, and mortality, as measured by the Crude Death Rate, is greater than 2 per 10,000 per day. Catastrophe (IPC Phase 5) occurs when a household group has an extreme lack of food and/or other basic needs even after the full employment of coping strategies and extremely critical acute malnutrition levels are evident.

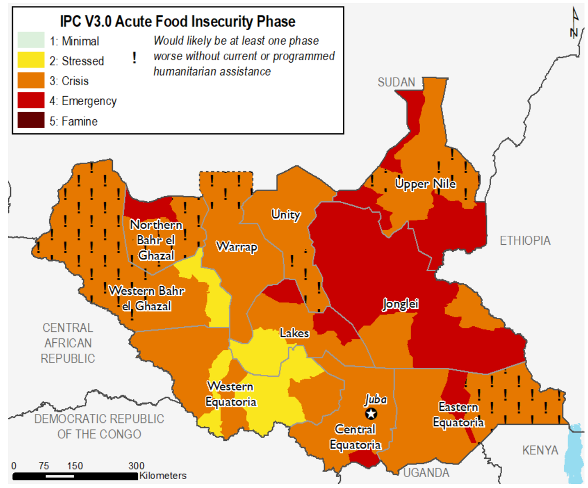
[2] Phase definitions for IPC Acute Malnutrition are as follows; Phase 1 (Acceptable): GAM WHZ <5 percent; Phase 2 (Alert): GAM WHZ ≥ 5 to 9.9 percent; Phase 3 (Serious): GAM WHZ 10.0 -14.9 percent; Phase 4 (Critical): GAM WHZ 15.0 - 29.9 percent; Phase 5 (Extremely Critical): GAM WHZ ≥30 percent.

NATIONAL OVERVIEW

Current Situation

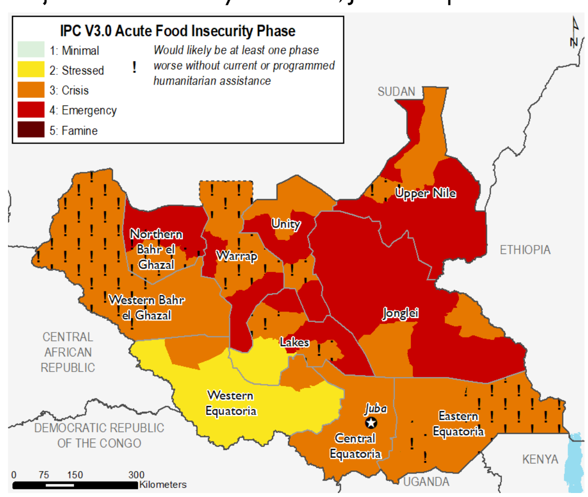
The revitalized Transitional Government of National Unity (R-TGoNU) was formed on February 22, 2020, following a resolution on the number of states and boundaries and a declaration of the complete cessation of hostilities between the government and non-signatories to the Revitalized Agreement on the Resolution of the Conflict. The formation of the R-TGoNU and related improvement in security conditions since the signing of the 2018 peace agreement have continued to facilitate relatively higher household engagement in livelihoods activities and relatively better cross-border trade flows and market functioning. Improved security has also encouraged the gradual return of internally and externally displaced persons. According to UNHCR data on returnee flows through January 2020, more than 126,800 refugees have spontaneously returned to South Sudan since January 2019. Most returnees have settled in Eastern Equatoria, Unity, Central Equatoria and Jonglei states, though these may or may not be their places of origin (Figure 2). In the month of January, the highest number of spontaneous refugee returnees was recorded in Kajo-Keji of Central Equatoria. During a rapid assessment conducted in late February, FEWS NET confirmed the presence of 30-40,000 spontaneous refugee returnees in Nyepo, Lire, Liwolo, and Kangapo 1 and 2 payams, most of whom are in urgent need of food assistance. Currently, they are primarily depending on food shared by host communities and food assistance sourced from refugee camps in Uganda, where they were formerly registered as refugees.

Projected food security outcomes, February to May 2020



Source: *FEWS NET*

Projected food security outcomes, June to September 2020



Source: *FEWS NET*

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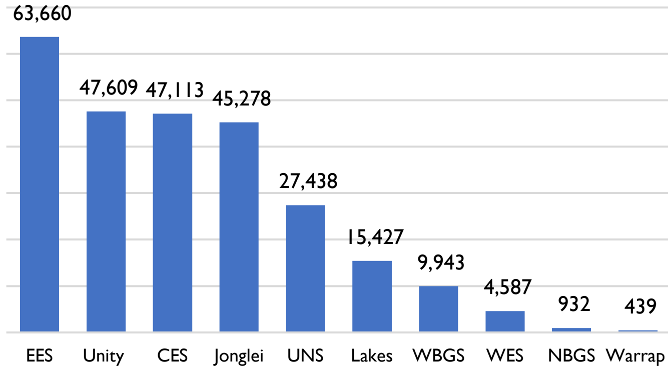
Despite broad improvements in security, data from OCHA/IOM indicates that 1.47 million and 2.2 million people are still internally and externally displaced, respectively, as of January 27. In addition, localized instances of intercommunal conflict and cattle-raiding continue to occur, resulting in loss of lives and new displacement. In late January and February, cattle raids in Cueibet and Yirol East of Lakes and Duk of Jonglei resulted in the loss of lives and livestock and disrupted trade flows and food assistance delivery. In Kolom, Amiet, and Dukora areas of Abyei, intercommunal conflict was reported between the Misseriye and Dinka Ngok communities in late January, though relative calm has since been restored. In Pibor of Jonglei, intercommunal violence and cattle-raiding between the Lou Nuer and Murle communities has led to loss of lives and disrupted food assistance delivery to flood-affected populations in Gumuruk and Lekwangole payams and Pibor Town. An estimated 5,000 people have been displaced by ongoing violence in Greater Pibor.

Relative stability supported higher levels of planting in 2019 relative to 2018 on the national level, but the extensive flooding that occurred in mid- to late 2019 led to high crop losses in 36 flood-affected counties. The results of the 2019 Crop and Food Security Assessment Mission (CFSAM) indicate that harvests will cover only 63 percent of 2020 national cereal needs. Based on preliminary CFSAM data, net national cereal production in the 2019/20 season is approximately 10 percent higher than 2018/19, with the largest gains realized in Greater Equatoria and in parts of Lakes and Western Bahr el Ghazal states (Figure 3). In Northern Bahr el Ghazal, Upper Nile, and Jonglei, however, crop production declined by up to 25 percent in 2019 relative to 2018 due to the floods. As a result, many households had low to minimal food stocks in the post-harvest period, despite a relative improvement in national food availability. For example, households reported during the FSNMS R25 survey that they anticipated their own-produced sorghum stocks would last for 2-3 months on average, or roughly until February/March, compared to at least six months before the conflict. FEWS NET corroborated these findings during a

February rapid assessment in Twic East and Duk of Jonglei, where many households reported that they have already started to deplete their food stocks.

The floods also had significantly negative impacts on livestock health and production. At the peak of the floods, FAO estimated that 3 million livestock were affected. Although flood waters have receded in many areas as the dry season has progressed, livestock deaths continue to be reported. In addition, the availability of pasture and water have seasonally declined as the peak of the dry season approaches, especially in western parts of the country. As a result, milk production level is atypically low. FEWS NET observed during the February rapid assessments in Twic East and Duk of Jonglei that livestock have poor health conditions and livestock diseases remain prevalent. Though data on the cumulative number of livestock deaths is not available, key informant information suggests that cases of livestock disease and deaths are higher than normal in both counties. The increase is likely due to worsening livestock health conditions after the floods and as the dry season peaks, since some livestock are confined to areas with poor pasture availability out of fear of cattle-raiding.

Figure 2. Cumulative spontaneous refugee returnees by state from November 2017 to January 2020

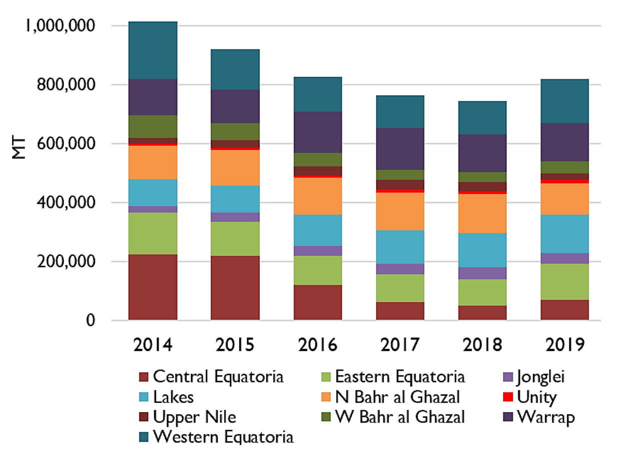


Source: *UNHCR data*

In December, households' most important food sources were own crop production and market purchases, which provided approximately 25-60 percent and 25-50 percent, respectively, of food consumed within a 7-day recall period (Figure 4). Gathering of natural food sources, including fish, game meat, wild fruits, and leafy greens, were also of importance. The relative importance of wild food sources has grown in January and February, given that their availability has seasonally peaked after the heavy rains and since household food stocks have declined. Access to fish and wild foods is especially important in areas where households are regaining freedom of movement to search for food as flood waters recede.

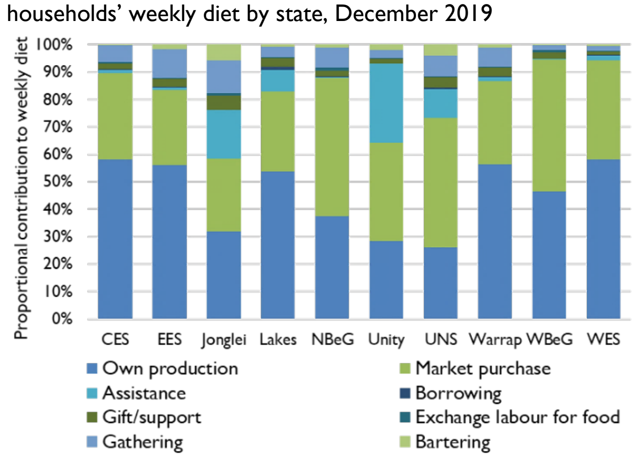
Trade routes are gradually reopening and market supply levels are rising due to the peace agreement and receding flood waters. However, rural markets are still operating at below normal levels compared to the same time last year, market access challenges remain common, and food prices are high and rising (Figure 5). Cross-border trade monitoring data collected by FEWS NET and the East Africa Grain Council suggest that trader confidence has increased within the past year, reflected by a 137 percent increase in sorghum imports from Uganda in January 2020 compared to January 2019 and a 293 percent increase compared to the four-year average. Similar trends were observed in sorghum imports from Sudan through the northern trading corridor. However, periodic road ambushes continue to occur along the border crossing points of Gok Machar and Warawar of Northern Bahr el Ghazal, and a recent occurrence resulted in the deaths of Sudanese traders operating along these routes. Similarly, although domestic trade routes continue to recover and support increased trade flows, localized road banditry and illegal check points remain common. Data from FSNMS R25 indicates that, on average, 9 percent of households reported it takes one day to travel to and return from the nearest market, while 6 percent reported

Figure 3. Preliminary net crop production trends in metric tons by state, 2014 - 2019*



Source: *CFSAM data; *2019 data is preliminary*

Figure 4. Proportional contribution of key food sources to households' weekly diet by state, December 2019

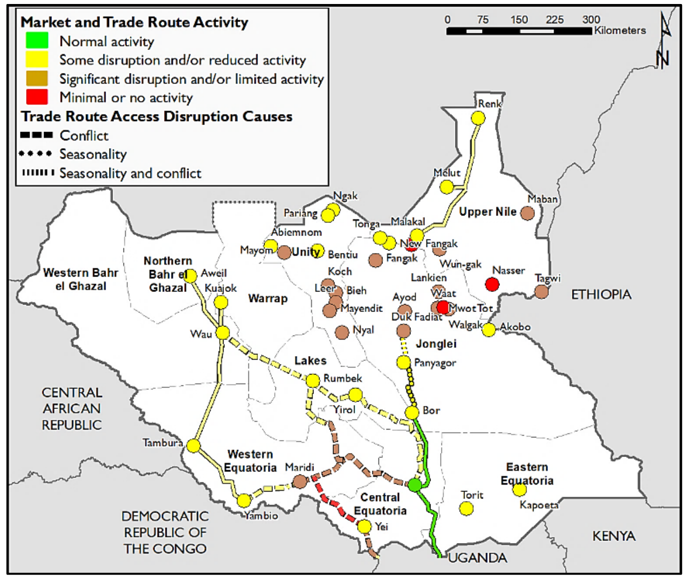


Source: *FSNMS R25 data*

that conflict or other violence restricted market access. For example, FEWS NET confirmed during a market assessment conducted in Buong payam of Akobo West in late February that it takes eight hours to travel to and return from the nearest market.

At the same time, poor macroeconomic conditions and the national cereal deficit continue to drive high, rising food prices and constrain poor households' food access. Despite an increase in oil production from 130,000 barrels per day (bpd) to 178,000 bpd in October, hard currency reserves remain limited, which continues to cause high inflation and limit the ability of traders to import staple food commodities to fill South Sudan's cereal production gap. In January, the exchange rate continued to fluctuate, averaging around 325 SSP/USD on the parallel market and around 160 SSP/USD on the official market. Although the average exchange rate on the parallel market declined to 265 SSP/USD in late February, food prices in key reference markets did not similarly decline.

Figure 5. Market functioning and trade route activity, Feb. 2020



Source: *FEWS NET*

According to price data from CLiMIS, staple food prices in January 2020 remain above January 2019 and the five-year average in most key reference markets, such as Juba, Rumbek Central, Bor South, and Torit. Inflation, exchange rate fluctuations, and the national cereal deficit are primary drivers of high food prices, which are exacerbated by high transportation costs and informal taxes. In January, the retail price of a kilogram (kg) of white sorghum ranged from 210 to 280 percent above the five-year average in Juba, Rumbek Central, Wau, and Aweil. In Juba and Rumbek Central, the price of sorghum is also around 150 percent above prices recorded in January 2019. However, the price of sorghum in Wau and Aweil has declined 90-98 percent below last year, which is likely due to a relative increase in regional imports and high supply of local produce.

As a result of high food prices and below-normal income from crop and livestock product sales and few other viable income sources, household purchasing power remains low. Demand for casual labor in villages and towns remains low due to poor macroeconomic conditions. Although there are reports that the availability of income-earning opportunities in urban areas has slightly increased, the slight increase in demand relative to the supply of labor indicates that most poor rural households have yet to benefit. In Wau, household purchasing power as measured by the wage-to-sorghum terms of trade (TOT) has somewhat improved relative to last year. A household is able to purchase 18 kg of sorghum from a day's wage in February, which provides sufficient kilocalories for a household of seven people for four days, compared to 13 kg at the same time last year, which could last for roughly three days. In Juba, the wage-to-sorghum TOT in February has somewhat deteriorated relative to the same time last year. A household relying on wage labor in the capital is only able to purchase around 11 kg of sorghum in February compared to 14 kg in February 2019.

Land preparation for first-season cultivation in some parts of Greater Equatoria is currently underway. In flood-affected counties in Greater Bahr Ghazal and Upper Nile, dry season vegetable production is also occurring as flood waters have significantly receded. However, desert locust poses a threat to agricultural production. A mature swarm of desert locusts was reported in Magwi of Eastern Equatoria on February 17th, having entered into South Sudan from Lamwo district of neighboring Uganda. Although the swarms have reportedly since dispersed, the invasion prompted the Ministry of Agriculture and Food Security and the FAO to declare the threat of desert locusts in South Sudan on February 18. Efforts by the government and partners are currently ongoing to prepare for, combat, and mitigate the potential threat.

Given persistently low food and income sources among at least half of the national population, humanitarian food assistance continues to play a pivotal role in mitigating food gaps at the household level and preventing more extreme food insecurity outcomes at the county level. Yet the reach of assistance remains below the national level of need, covering only 15 to 40 percent of the total population estimated to be in need since November 2017 (Figure 6). Food assistance distribution plans are frequently under-funded, resulting in shortfalls in the planned number of beneficiaries reached versus those actually reached. From November 2019 to January 2020, an average of 1.03 million people were reached monthly with general food distribution (GFD) and food for assets (FFA) programs, equivalent to less than 20 percent of the population estimated to be in need in January. Food assistance delivered in January, specifically, was being scaled down and only reached approximately

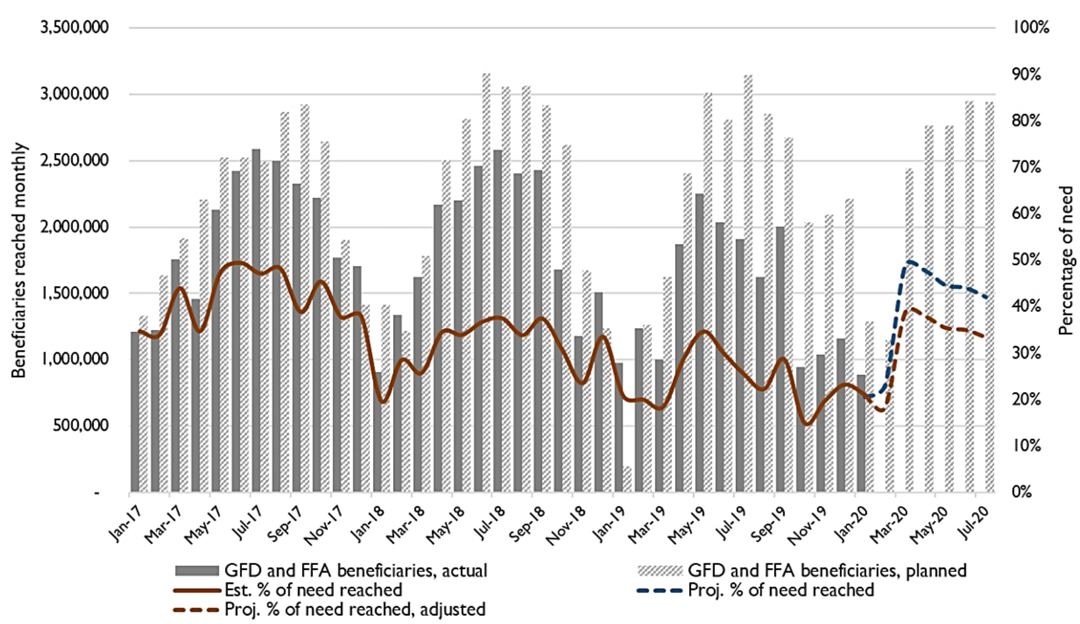
886,500 people – a nine percent decline compared to January 2019. This assistance reached at least 25 percent of the population at the county level in parts of Unity, Upper Nile, Jonglei, Northern Bahr el Ghazal, and Wau states. In addition to GFD and FFA programs, a total of 826,000 flood-affected people were reached with food assistance as of January under the emergency flood response plan, including in areas such as Ulang of Upper Nile and Pibor, Nyirol, Uror, and Duk of Jonglei. However, other areas saw a prolonged lack of assistance due to flood-related restrictions.

As a result of the above factors, the severity and scale of acute food insecurity in South Sudan remains high with Crisis (IPC Phase 3) and Emergency (IPC Phase 4) persisting in many areas, despite moderate improvement in food security outcomes at the national level in January 2020 compared to January 2019. Upper Nile and Jonglei are among the areas with the highest proportions of the food insecure population due to the large-scale impacts of the floods. Data from the FSNMS R25 indicated that the counties with the lowest mean FCS in the country were Maban (12.2), Canal/Pigi (13.7), and Rumbek North (14.5). Nationally, the percentage of households reporting a poor Food Consumption Score (FCS) declined from 51 percent in January 2019 to 37 percent in January 2020, though with varying trends across counties. Additionally, the percentage of the population who reported severe hunger on the Household Hunger Scale (HHS) that was indicative of Emergency (IPC Phase 4) or Catastrophe (IPC Phase 5) declined from 4 percent in January 2019 to 2.9 percent in January 2020. Half of the population was still experiencing food consumption gaps indicative of Crisis (IPC Phase 3) or worse (Figure 1).

In addition, acute malnutrition has remained at 'Serious' (GAM WHZ 10-14.9 percent) or 'Critical' (GAM WHZ 15.0-29.9 percent) levels across the country during the post-harvest period, indicating that urgent nutrition assistance is needed. Based on GAM WHZ data collected via SMART surveys or calculated using a domain weighted analysis of FSNMS nutrition data, 20 counties in Upper Nile, Unity, Warrap, Eastern Equatoria, and Northern Bahr el Ghazal states are classified as 'Critical' (GAM WHZ 15.0-29.9 percent) and 28 counties in Central Equatoria, Eastern Equatoria, Northern Bahr el Ghazal, Unity, Upper Nile, Warrap and Lakes states are classified as 'Serious' (GAM WHZ 10-14.9 percent). This represents a slight deterioration in acute malnutrition compared to same time last year due to low quantity and diversity of food and high disease prevalence exceeding 50 percent (Figure 7).

Based on the above outcomes on food consumption and nutrition, as well as the described contributing factors, Crisis (IPC Phase 3) outcomes remain widespread across the country during the 2020 post-harvest period. Emergency (IPC Phase 4) outcomes are likely in 21 counties, including in flood-affected areas of Upper Nile and Jonglei state, and in parts of Lakes, Northern Bahr el Ghazal, and Eastern Equatoria states. Catastrophe (IPC Phase 5) outcomes are likely still present in Akobo and Duk of Jonglei, where crop production was low, food assistance levels remain far below the estimated need, and standing flood waters and swamps still impede market access or household movement to food distribution points or other

Figure 6. Monthly beneficiaries of humanitarian food assistance versus estimated percentage of the population in need reached by assistance, past and projected, January 2018-September 2020, South Sudan

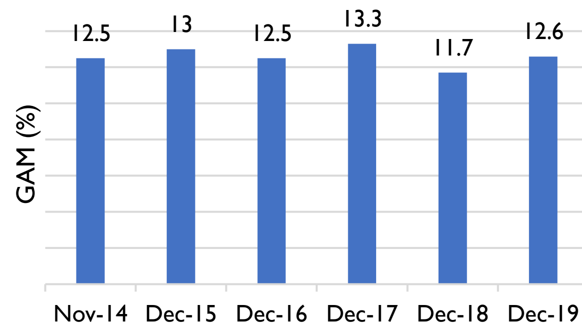


Source: *FEWS NET analysis of monthly food distribution data* typical food and income sources.

National Assumptions

The February to September 2020 most likely scenario is based on the following national-level assumptions:

Figure 7. National prevalence of Global Acute Malnutrition, 2014 to 2019 post-harvest periods



Source: *UNICEF and IPC data*

- Although implementation of the peace deal is expected to facilitate greater household movement and support gradual recovery of livelihoods activities, several security challenges still need to be resolved, including national security arrangements and unification of the national army. As a result, sporadic banditry activities and localized insecurity are likely to persist across the country. Intercommunal conflict and cattle-raiding are anticipated in parts of Lakes, Warrap, Unity, Jonglei, and Eastern Equatoria. However, large-scale new displacement is not expected.
- Based on implementation of the peace deal and recent trends in spontaneous refugee returnees, the number of refugee and IDP returnees is expected to rise throughout the scenario period. Returns are likely to be spontaneous, rather than through formal registration, as confidence gradually builds in the peacebuilding process. Many refugee returnees may not return directly to their places of origin due to localized insecurity and low availability of essential services.
- Although South Sudan is among the fastest growing economies in Africa in 2020, macroeconomic conditions are expected to remain poor. Oil production is only projected to increase to 200,000 bpd by 2021, and hard currency inflows from oil exports will remain very low at around USD 12 per barrel due to oil revenue sharing, transit fees, and debt payments. Revenues are likely to be spent on peace deal implementation and infrastructure development. Overall, increased demand for the USD and steady depreciation of the SSP are still anticipated to drive inflation in 2020.
- Based on rising trader confidence, recent cross-border trade monitoring data, and the official re-opening of the Sudan-South Sudan border, trade routes are expected to gradually reopen and expand, permitting an increase in domestic and regional commodity flows and facilitating improved market functioning in the ten state capital markets and some rural markets. However, localized insecurity and banditry is expected to periodically disrupt trade flows. In addition, poor macroeconomic conditions will most likely continue to limit traders' ability to fill the cereal production gap.
- Based on anticipated refugee returns and large cereal deficits, it is anticipated that additional pressure will be exerted on local market supply of staple foods in Eastern Equatoria, Unity, Central Equatoria, and Jonglei, where large returnee populations exist and insecurity and banditry periodically disrupt trade flows and household movement.
- Despite some anticipated improvement in trade flows and market supply, persistent inflation, the large national cereal deficit, high transport costs, and double taxation along trade routes are expected to continue to drive high prices of staple foods and essential non-food items. Based on FEWS NET's integrated price projections for Juba, Wau, and Bor markets, staple food prices are likely to remain above the 2019 and five-year averages through September. For example, the retail price of a kilogram of sorghum is projected to range from 142-151 SSP in Juba to 190-202 SSP in Wau and 211-224 SSP in Bor. In contrast, however, the retail sorghum price in Aweil is likely to remain below or similar to 2019 and the five-year averages given its proximity to source markets in Sudan and Uganda.
- Based on NOAA, ECMWF, and GHACOF forecasts, first-season rainfall from March to May in bimodal Greater Equatoria is most likely to be above average. In unimodal areas in Greater Upper Nile and Greater Bahr el Ghazal, seasonally dry conditions are expected through April. Main season rainfall from June to September is expected to be average, though forecasting uncertainty exists given the long-term nature of this forecast. Seasonal flooding is anticipated.
- Based on the FAO Desert Locust Watch forecast, there is a risk that immature swarms of desert locust could arrive from Kenya in Eastern Equatoria during the bimodal planting stage in March, due to the prevailing westward direction of the winds. Given that only perennial vegetation will be available in March, which is less favorable to locusts, and that the seasonal winds typically shift northward by April based on wind climatology, it is most likely that the swarms will travel northward to breeding areas in Sudan before crops reach the vegetative stage. Damage to crops is expected to be low, but in the absence of control measures in the greater region, there will remain a risk of desert locust infestation in South Sudan in addition to the typical risk of FAW infestation.

- First-season cultivation in bimodal Greater Equatoria and main season cultivation in unimodal Greater Upper Nile and Greater Bahr el Ghazal are expected to be timely. Based on the rainfall forecast, low risk of desert locust infestation, and relative improvements in security, area planted in 2020 is likely to be higher than 2019. There may be exceptions, however, in areas where insecurity may continue to limit access to far fields or where a lack of agricultural inputs impedes area planted. Overall, first season harvests in June/July are most likely to be similar to the five-year average but above 2019. Green main harvest consumption will not begin until late August or September.
- Fish and wild foods are expected to be available throughout the dry season but at steadily declining levels. The main rainy season will likely lead to seasonally high availability by September. However, access to these food sources will vary across counties depending on the level of insecurity, recession of standing flood water, and seasonal flooding in 2020.
- Given increased availability of water and pasture as a result of above-average rainfall in 2019, livestock production is expected to remain seasonally high through at least March, before declining from April to May and rising again from June through September. Seasonal declines are expected from April to May as livestock migrate to dry-season grazing areas, which reduces access to milk at the homestead. Milk consumption and livestock sales will vary at the household level depending on the livestock holdings and the extent of flood-related impacts on livestock.
- Based on WFP's operational plan made available during the January 2020 IPC acute analysis, humanitarian food assistance through GFD and FFA programs will likely reach an average 20 percent of the country population per month with an average 38 percent of kilocalorie needs from February to April. From May to July, food assistance is planned to slightly scale-up in response to the lean season, reaching an average 26 percent of the country population monthly with an average 37 percent of their kilocalorie needs. No information is available of planned HFA beyond July. Based on past trends, the planned assistance will be delivered, though periodic disruptions are expected in areas where insecurity and physical access challenges are anticipated.

Most Likely Food Security Outcomes

From February to May, food consumption gaps or livelihoods coping indicative of Crisis (IPC Phase 3) or worse are expected to be widespread. Emergency (IPC Phase 4) is anticipated in 21 counties, including those that were most affected by floods in 2019 and those that are likely to continue to experience periodic intercommunal conflict, including in parts of Jonglei, Lakes, Upper Nile, Northern Bahr el Ghazal, and Eastern and Central Equatoria. Stocks from the main season harvest in northern regions and the second season harvest in Greater Equatoria are only expected to last until February or March, compared to May or June in years before the onset of the conflict in 2013. The exhaustion of household stocks, coupled with rising food prices and seasonal declines in the availability of natural food sources, such as fish and wild foods, will lead to an early start to the 2020 lean season. Additionally, the availability of livestock products at the homestead will decline as livestock migrate to distant, dry-season grazing areas. Although access to markets will further improve over the course of the dry season, low household income and high food prices will continue to drive poor food access.

Areas of greatest concern include Akobo, Duk, Ayod, Nyirol, and Pibor of Jonglei; Cueibet, Rumbek North, Rumbek Centre, and Yirol East of Lakes; and Maban, Maiwut, Nasir, Longochuk, and Ulang of Upper Nile. In Akobo and Duk of Jonglei, an estimated 20,000 people who did not harvest, have few to no livestock, and face difficulty accessing markets are likely to be in Catastrophe (IPC Phase 5). Although planned and funded food assistance will reach 18-19 percent of the Akobo and Duk population, it is expected that these households may continue to face difficulties accessing food distribution points until flood waters completely recede. In several areas of concern where food assistance is likely to be significant from February to May, Crisis! (IPC Phase 3!) outcomes are expected, including in Maban of Upper Nile, Aweil East and Aweil South of Northern Bahr el Ghazal, and parts of Unity and Eastern Equatoria. As projected at the January IPC and based on historical trends, acute malnutrition prevalence is expected to deteriorate as food intake worsens, but each county's respective classification of 'Serious' (GAM WHZ 10-14.9 percent) or 'Critical' (GAM WHZ 15.0-29.9 percent) is likely to be sustained through April/May.

From June to September, food security outcomes are likely to further deteriorate as the lean season progresses and food prices rise even higher, particularly in areas where returning refugees or IDP households are likely to put additional pressure on the available food sources and market supply. More than half of the South Sudanese population is expected to experience food consumption gaps, though in some areas, the scale up of planned, funded and likely food assistance is expected to mitigate the occurrence of more severe outcomes. According to January IPC projections, an estimated 6.48 million people will face Crisis (IPC Phase 3) or worse acute food insecurity at the peak of the lean season in the presence of humanitarian food assistance; however, the total population in need is likely to be higher than estimated due to recent increases in the level of intercommunal conflict. Outcomes are expected to be most severe in June and July, before gradual improvement occurs in August and September with seasonal increases in livestock products in pastoral and agro-pastoral areas, seasonal increases in availability of wild leafy vegetables, and the start of the main green harvest. During the lean season period, past trends indicate that acute malnutrition will likely deteriorate to 'Critical' levels (GAM 15.0-29.9 percent) in additional counties, driven by low food and milk intake as well as a seasonal rise in disease incidence such as acute watery diarrhea, fever, and malaria.

At the peak of the lean season, Emergency (IPC Phase 4) outcomes will be present in 33 counties, including in most areas of greatest concern in Jonglei, Upper Nile, and Lakes as well as in parts of Northern Bahr el Ghazal, Unity, and Warrap. Crisis (IPC Phase 3) outcomes will remain widespread, though eight counties in Greater Equatoria are expected to be in Stressed (IPC Phase 2) due to the availability of the local bimodal harvest in June/July in those areas. Given the anticipated severity of food security outcomes at the peak of the lean season, it is possible that some most vulnerable households – including those with no livestock who face difficulty accessing physical markets, food assistance, or fish due to insecurity and seasonal access constraints as well as newly returned IDPs and refugees – could face Catastrophe (IPC Phase 5). In the event that the peace deal is not implemented, and a resurgence of conflict prevents populations from moving in search of food sources or restricts humanitarian access for a prolonged period of time, Famine (IPC Phase 5) would be possible. Urgent humanitarian assistance beyond currently planned levels will be required to save lives and protect livelihoods and prevent further occurrence of more extreme food insecurity outcomes.

Events that Might Change the Outlook

Possible events over the next eight months that could change the most-likely scenario.

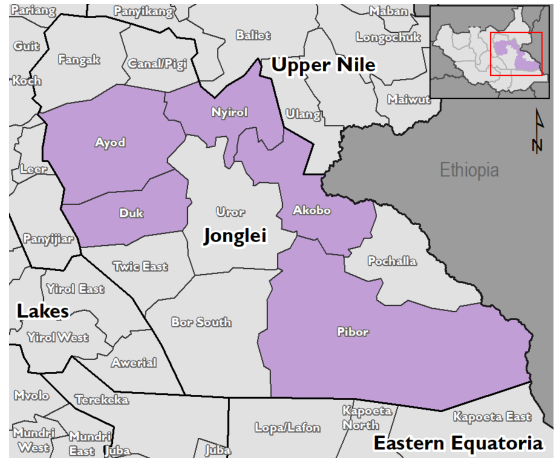
Area	Event	Impact on food security outcomes
National	Non-adherence to implementation of the signed peace deal that lead to lack of trust between the parties, and an uptick in conflict	An increase in conflict events would restrict household movement, disrupt access to markets and collection of wild foods, cause new displacement, and impede delivery of humanitarian assistance. As was observed from 2016 to 2018, more widespread Crisis (IPC Phase 3) and Emergency (IPC Phase 4) outcomes would be expected throughout the projection period. In areas of concern, some households who lost crops due to flooding, own no livestock, or are restricted from accessing fish, markets, or food assistance would likely be in Catastrophe (IPC Phase 5). A risk of Famine (IPC Phase 5) would be possible.
National	Scale-up in oil production and exports or an increase in other sources of foreign currency earnings with improved accountability	Although an increase in the availability of foreign currency earnings would likely be primarily directed toward loan repayment, some earnings would likely be used to increase imports of basic goods and increase spending on public services, assuming improved accountability also exists. The SSP would likely appreciate slightly, leading to at least a slight decline in food prices in key reference markets, and increasing household access to foods. Food security outcomes would improve, though Crisis (IPC Phase 3) or worse outcomes would still exist in many areas given the prolonged erosion of household assets and income sources.
Southern and Eastern areas of South Sudan	Infestation by desert locusts	In the event that no effective control measures are put in place in the greater East Africa region and a new wave of locusts arrives in southern and eastern South Sudan when unimodal crops are in the vegetative stages around June/July, damage to crops could be significant. In addition, some pasture loss would be likely, though above-average rainfall through September would likely help to regenerate and offset pasture losses. Given that a high proportion of the population is already expected to face Crisis (IPC Phase 3) or Emergency (IPC Phase 4) outcomes in the affected areas, the population in need would likely only slightly increase during the February outlook scenario period. However, crop losses would raise the risk of more severe food security outcomes during the 2020 post-harvest period.
Cueibet, Rumbek North, Yirol East of Lakes; Duk, Nyirol, Ayod, Pibor of Jonglei	Low levels of intercommunal conflict and livestock raids	In the event intercommunal violence and cattle raiding events decline in all the eight counties of concern, agricultural production, trade flows and market functioning, and assistance delivery would likely improve. This would lead to gradual improvements in food availability and access for many households, increasing household food consumption and narrowing food gaps. Improvement from Emergency (IPC Phase 4) to Crisis (IPC Phase 3) would be likely.

AREAS OF CONCERN

Jonglei state: Akobo, Ayod, Duk, Nyirol and Pibor Counties (Figure 8)

Current Situation

Figure 8. Areas of concern reference map: Akobo, Ayod, Duk, Nyirol, and Pibor counties of Jonglei state



Source: *FEWS NET*

Despite a decline in conflict events between government and opposition forces in Jonglei since the signing of the peace agreement in early 2019, the severity of food insecurity and magnitude of the food insecure population has remained elevated in the 2019/20 post-harvesting period. Heavy rainfall and catastrophic flooding in mid- to late 2019 destroyed crops and homes, killed livestock, submerged markets and contaminated water sources, disrupted trade flows and food assistance delivery, and restricted household access to critical basic services. Approximately 300,000 people were affected in Akobo, Ayod, Duk, Nyirol and Pibor. The convergence of FSNMS R25 food consumption indicator data using FEWS NET's matrix methodology showed more than 20 percent of households in Akobo, Ayod, Duk, and Nyirol had food consumption gaps indicative of Emergency (IPC Phase 4), while more than 80 percent of households in Pibor had food gaps indicative of Crisis (IPC Phase 3). In addition, at least 20 percent of households in each county had engaged in at least one emergency livelihoods coping strategy within the 30 days preceding the survey, such as selling their last cow or goat. Further, the scale of flooding that persisted into December and January cut off pockets of the population in Akobo, Duk, and Ayod from accessing food sources for a prolonged period of time, according to FSNMS R25 data, remote sensing imagery, and focus group information collected by REACH. An estimated 40,000 people were classified in Catastrophe (IPC Phase 5) in Akobo, Duk, and Ayod in January. Available data suggests that these households were most likely present in Barmach, Buong, Diror, and Walgak payams of Akobo West; Ageer, Dongchak, and Padiet payams of Duk; and Kurwai, Wau, and Pajiek payams of Ayod.

In addition to flooding, intercommunal conflict, cattle raiding, and localized insecurity remain of concern in Duk, Pibor, and Nyirol counties, primarily driven by competition for assets and local resources. Although these events generally remain isolated, the frequency of attacks has risen in recent months. In Duk, cattle-raiding by Murle in mid-February resulted in loss of lives and livestock and disruption to trade flows and delivery of food assistance. Similarly, in Pibor, intercommunal conflict and cattle-raiding between the Lou Nuer and Murle in late February has led to loss of lives and disrupted trade flows and delivery of food assistance to flood-affected populations in Gumuruk, Lekwangole payams, and Pibor Town. An unknown number of people are reportedly displaced because of the violence. Further, in Nyirol, revenge attacks by Murle of Pibor in late February led to loss of lives and livestock, in addition to disruption of delivery of assistance.

Preliminary data from the 2019/20 CFSAM show that all five counties of concern will continue to face large cereal gaps in 2020, though it should be noted that these are structurally cereal deficit areas. Despite relative improvement in area planted compared to 2018, FSNMS R25 data indicate that 65 and 47 percent of the population in Ayod and Pibor, respectively, were unable to plant crops this season. Further, 20-60 percent of households per county reported crop losses from floods. Although CFSAM data shows that 2019/20 net production in Akobo and Ayod was similar to 2018 and approximately 20 percent above the five-year average, the cereal deficit in Akobo is 16,400 MT and 19,450 MT in Ayod. In Pibor, Duk, and Nyirol, net production was 9-22 percent below 2018 and ranged from near- to 16 percent below the five-year average; county-level deficits ranged from 12,000 MT to more than 18,000 MT. As a result, food stocks from the 2019 harvest are much lower than pre-crisis levels, when sorghum stocks typically lasted 6-9 months. In 2019, approximately 30-70 percent of households in Ayod, Duk, Nyirol, and Pibor expected their sorghum stocks would last less than four months in 2019/20, while most households that planted maize (23-45 percent) in Ayod, Duk, and Nyirol only expected their maize stocks to last 1-2 months. Production in Akobo did relatively better, where 30 percent of households expected their sorghum stocks to last at least five months and 40 percent of household expected their maize stocks to last at least 3-5 months (Figure 9).

The floods have also negatively affected livestock production and milk availability by causing livestock deaths, rangeland losses, and increased livestock disease incidence. FSNMS R25 data suggest that livestock ownership has declined in most counties of concern compared to before the start of the crisis, due to losses from floods, intercommunal fighting, and disease outbreaks. However, there are limitations to the interpretation of this data given that it is self-reported and high levels of out-migration are occurring in Akobo and Pibor (Figure 10). Even among those that still own livestock, loss of pasture and increased waterborne disease incidence have affected livestock health, value, and milk productivity. While access to milk remained fairly proportional to livestock ownership in Nyirol and Pibor, where approximately 60 and 20 percent of households, respectively, were accessing milk from own cows in December, only 20-30 percent of households reported accessing milk for consumption from own cows in Akobo, Ayod, and Duk.

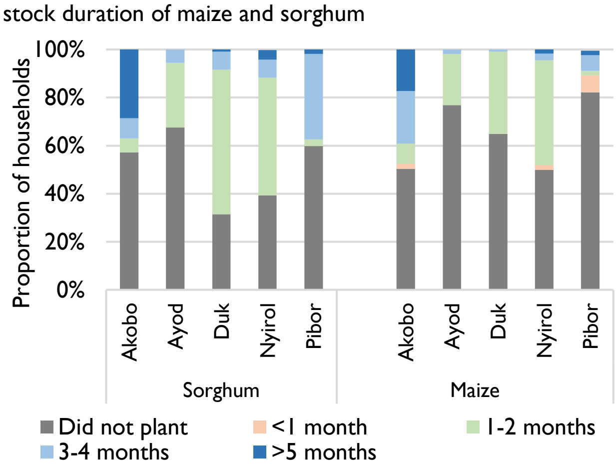
At the peak of the floods in late 2019, flood-related damage to roads and market infrastructure significantly limited trade flows, market supply, and physical access to markets. In Duk, Ayod, Nyirol, and Pibor, supply routes such as the road through Waat were completely cut-off and physical market structures were submerged or destroyed, leading to spikes in staple food prices. According to FSNMS R25 data, 40 percent of households in Akobo reported that it could take one full day to reach the nearest market in December, while 40 percent of households in Pibor and 69 percent of households in Nyirol reported that floods hindered access to any market. Although flood waters have since receded, market functioning and access to markets has only gradually improved and food prices remain high. In January, FEWS NET observed during a rapid assessment to Duk that physical access to Poktap market has improved, while some traders have resumed supplying the market through the Panyagor route from Twic East county. Yet the retail price of one kg of brown sorghum in Akobo markets rose from 171 SSP in September to 285 SSP in January. In February, FEWS NET found that the market in Buong payam of Akobo West remains very thin. Only a few traders are selling salt, sugar, and oils, and no cereals are available for purchase.

Other sources of foods, including gifts from the community, exchanging labor for food, gathering wild foods, and bartering, remain available at low levels. Given the slow recession of flood waters, it is expected that the availability of fish, game, and wild foods has been better than normal in the dry season period. In December, FSNMS R25 data indicated that access to fish was highest in Akobo, Duk, and Pibor, where 66-90 percent of households reported they were consuming fish, primarily by own catch. Access to fish was somewhat lower in Ayod and Nyirol, where 32-39 percent of households confirmed that they were consuming fish from own catch or from the market. In general, a lack of fishing equipment remains the main barrier to fishing activity, though FEWS NET learned during a February field assessment in Akobo that Nile Hope, a national NGO, reportedly distributed fishing kits and vegetable seeds to 927 households in Buong and 940 households in Diror.

As more flood waters have receded, field information collected in February in Akobo, Ayod, and Duk suggests that household movement in search of food sources has started to improve, though physical barriers such as large swampy areas and pool waters still impede greater movement. For example, FEWS NET found during a rapid assessment in late February in Buong payam and Diror payam of Akobo West that household movement has improved relative to November/December, with households moving to search for food in Waat or Lankien of Nyirol or Pathai of Uror, where access to markets and food assistance is reportedly better. However, movement to far fishing areas, gathering of wild foods, and hunting remain limited, due not only to standing water and swamps but also localized insecurity. The market in Buong remains very thin, with few supplies coming from Lankien of Nyirol since the Akobo East route is still cut off by flood waters. In Diror, the local market remains non-functional, but households are now traveling to Pathai market in neighboring Uror county to purchase cereals.

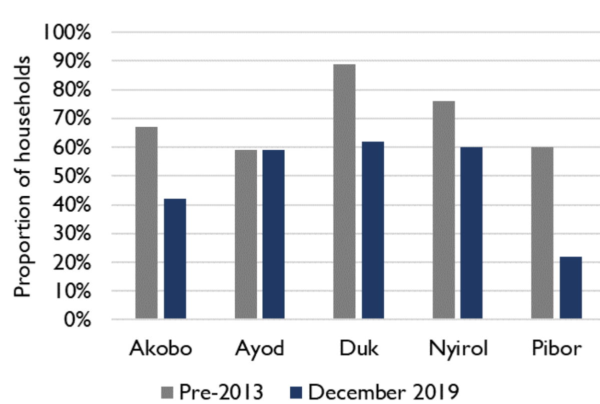
Similarly, receding flood waters have relatively improved household access to food assistance distribution points. However, there are reports that increased levels of intercommunal conflict and cattle-raiding in Duk, Akobo, and Pibor disrupted the

Figure 9. Proportion of households reporting estimated stock duration of maize and sorghum



Source: *FSNMS R25 data*

Figure 10. Proportion of households that owned livestock before the onset of the conflict in 2013 compared to December 2019



Source: *FSNMS R25 data*

delivery of assistance in February and led to loss of lives and humanitarian supplies. On average, GFD and FFA distributions from November to January reached 16-24 percent of the population in Akobo, Ayod, and Duk and 38 percent of the population of Nyirol, covering 53-107 percent of their daily kilocalorie needs. In addition, FEWS NET observed in February that food assistance delivery had resumed in Buong payam of Akobo, where a total of 4,500 people received 15 kg for 90-day cycle. In Pibor, however, no information is available on the monthly level of GFD and FFA food assistance during this time period, though WFP reports that emergency flood response was implemented in Pibor. In December, WFP had reached at least 65,000 people in Pibor with food assistance, equivalent to approximately 43 percent of the flood-affected population.

Although household access to food sources has relatively improved since December/January, most households face food gaps as food stocks are becoming depleted, milk availability is declining, and market access remains difficult. Refugee returnee populations are also of concern, as many did not return in time to plant and lack productive assets such as fishing gear to re-engage in livelihood activities. In February, Emergency (IPC Phase 4) outcomes likely persist in Akobo, Ayod, Duk, and Pibor, where the reach of food assistance remains well below the level of need. The relative improvement in physical access to food assistance and other food sources has likely driven a decline in the population in Catastrophe (IPC Phase 5), especially in Ayod, but it is expected that some flood- and conflict-affected households in Akobo and Duk who are unable to access food assistance are still experiencing Catastrophic (IPC Phase 5) outcomes. In Nyirol, Crisis! (IPC Phase 3!) outcomes are present, as the reach of food assistance has been significant enough to prevent more extreme outcomes. In all areas of concern, the domain weighted prevalence of GAM WHZ collected during the FSNMS R25 indicated high levels of acute malnutrition at 'Critical' levels (GAM WHZ 15.0-29.9 percent), attributed to poor dietary diversity, high morbidity from waterborne diseases and malaria, contamination of water sources, and disruption of health and nutrition services. In February, available screening data by partners on the ground indicates high cases of severe and moderate acute malnutrition, currently at 17 percent and 21 percent, respectively; children are visually very weak and malnourished, indicating a worsening situation where urgent action is needed. Mortality data is unavailable. In November and December, there were reports of several deaths among the elderly in Akobo West, but these were attributed to flood-related trauma.

Assumptions

In addition to the national-level assumptions, the most likely outcomes for these areas of concern in Jonglei are based on the following assumptions:

- Based on past trends and recent FEWS NET monitoring, intercommunal conflict and cattle raiding will likely rise in Duk and Pibor, and to a lesser extent in parts of Akobo and Ayod, during the February-April dry season, when livestock migrate far away from homesteads. Loss of lives and livestock are anticipated during the cattle-raiding.
- Based on current livestock holdings, the likelihood of an increase in cattle raiding during the dry season, and the impact of high levels of livestock disease incidence, livestock sales, milk production, and milk sales are expected to be at below normal levels in most areas of concern through September.
- Although above-average June to September rainfall is expected to facilitate timely household engagement in land preparation and area planted is likely to be similar to or better than 2019, agricultural labor demand is expected to remain low. Given the erosion of assets over prolonged years of conflict and due to low levels of income from crop sales, even middle and better-off households do not have the capacity to employ farm workers and will rely on family labor.
- Market and trade flows will likely relatively improve during the dry season as flood waters further recede, which will allow heavy trucks to move supplies from Bor South to local markets and from Ethiopia into Akobo and Nyirol. Despite the anticipated increase in market supply and improvement in physical access to local markets, staple food prices are still expected to remain high due to ongoing macroeconomic shocks, high transport costs, and informal taxes along trade routes. Reduced trade flows and market functioning are typical during the rainy season.
- Fish, wild foods, bush meat, and charcoal and firewood will be seasonally available through March/April for consumption and sales. However, natural food sources are expected to steadily decline in quantity through May, before seasonally increasing with the start of the main rainy season. Conversely, sales of charcoal and firewood are likely to remain low during the rainy season due to the difficulty of collection and access to markets.
- Based on WFP's operation plan, food assistance from February to April is likely to reach 18-19 percent of the population in Akobo and Duk, meeting 41 percent of their daily kilocalorie (kcal) needs. In Pibor, Nyirol, and Ayod, food assistance is likely to reach 29-47 percent of the population with 41 percent of their daily kcal needs. Food assistance is likely to

scale up from May to July. An average 30 percent of population in Akobo, Duk, and Pibor and an average 45 percent of the population in Ayod and Nyirol are expected to receive 41 percent of their daily kcal needs monthly. Information on planned assistance in August and September is not available.

Most Likely Food Security Outcomes

Food security is expected to deteriorate in all counties of concern from February to May, as cereal stocks from the 2019/20 harvests are expected to be exhausted by most households as early as March. In Akobo, some households may still have food stocks until April or early May. As food stocks deplete, food consumption gaps will widen as few other food or income sources are available to fill the gap. Overall, the amounts of milk available and accessible to households will decline seasonally as livestock will be away from homesteads. Further, natural food sources such as fish, wild foods, and game meat will seasonally be at their lowest levels. In addition, relatively higher levels of intercommunal conflict will pose periodic risks to household food access and result in loss of livestock assets. As flood waters further recede, and given the severity of food security outcomes during the post-harvest period, households are likely to increasingly migrate in search of food assistance, natural food sources, or food in markets in Poktap of Duk, Waat and Lankien of Nyirol, Akobo Town, or Ethiopia. The most vulnerable households are likely to include those who do not own livestock that they can sell to meet their food needs. Emergency (IPC Phase 4) is expected in all counties. In Akobo and Duk, some households who were previously cut off from moving in search of food sources will regain freedom of movement as flood and swamp waters recede; however, a portion of this population is likely to face difficulty regaining access to food and income sources and may remain in Catastrophe (IPC Phase 5). In Ayod, high levels of planned food assistance is expected to prevent more extreme outcomes.

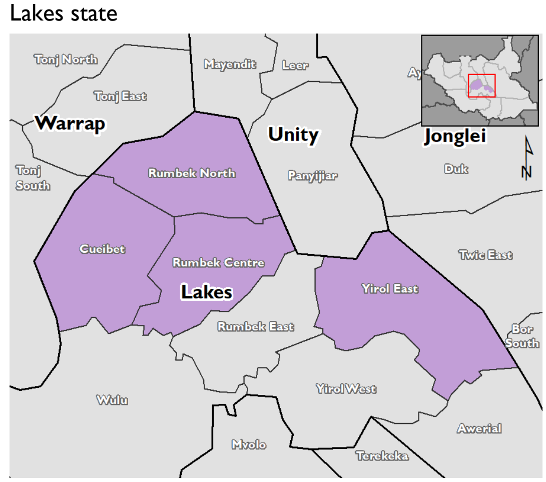
From June to September, food stocks will be completely depleted, even among households whose harvests were anticipated to last for more than five months in Akobo. Market dependence will increase this period, and low income and high food prices will restrict household access to foods. More households are expected to face large consumptions gaps during this period or are likely to adopt emergency livelihood-based coping strategies, such as selling their last female cow or goat to fund food purchases or traveling to nearby villages such as Waat, Lankien, Pathai of Uror, or Akobo Town to seek assistance from relatives or to search for food or money to buy food. Given the forecast of above-average rainfall, seasonal floods may re-impose periodic access constraints to markets. However, the planned scale up of food assistance and some seasonal improvements – including the return of livestock to homesteads and availability of wild vegetables and fish – is expected to mitigate more extreme outcomes, including in Akobo and Duk. Emergency (IPC Phase 4) outcomes are anticipated in all counties. Households with no livestock or no access to physical markets or assistance or fish, or the newly returned IDPs or refugees, are likely to be among the most vulnerable groups of households.

Lakes state: Cueibet, Rumbek North, Rumbek Centre, and Yirol East Counties (Figure 11)

Current Situation

In January, FSNMS R25 food security indicator and contributing factor data were indicative of Crisis (IPC Phase 3) outcomes in Cueibet, Rumbek Centre, and Yirol East and Emergency (IPC Phase 4) outcomes in Rumbek North. The convergence of food consumption indicators using FEWS NET's matrix methodology showed 40-70 percent of households across the four counties of concern were experiencing food gaps indicative of Crisis (IPC Phase 3). However, while the proportion of households reporting poor FCS declined by up to 50 percentage points in Cueibet, Yirol East, and Rumbek Centre from January 2019 to January 2020, the proportion of households with poor FCS in Rumbek North increased from 49 percent to 81 percent over same period, suggesting deterioration in dietary quality and quantity. Further, the mean FCS in Rumbek North was only 14.5, the third lowest score in the country. Among households adopting emergency livelihoods coping strategies, 1-8 percent across the four counties had either sold or slaughtered their last cow or goat within the 30 days preceding the household survey, while up to 31 percent had migrated to other villages in search of food or money to obtain food within the same 30-day period.

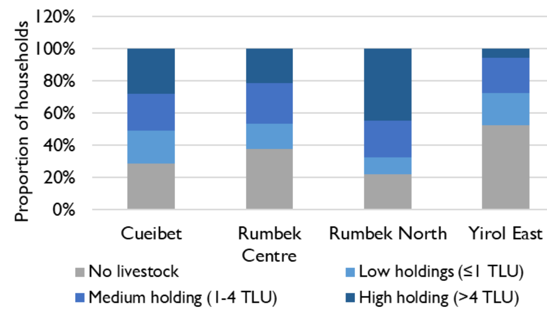
Figure 11. Areas of concern reference map: Cueibet, Rumbek North, Rumbek Centre, and Yirol East of Lakes state



Source: *FEWS NET*

Although the late 2019 floods were less severe in Lakes state, intercommunal violence and cattle-raiding escalated from mid-2019 to early 2020 and caused loss of life and household assets, resulted in new internal displacement, and disrupted livelihoods and trade flows. Rumbek North, Rumbek Centre, and Cueibet were among the worst-affected areas, where up to 40 percent of households reported that insecurity was a significant shock to their livelihoods during the FSNMS R25 survey. A series of intercommunal clashes and revenge attacks in Rumbek North occurred between the Gok and Manuer communities in Maper payam in mid-December 2019, resulting in 100 deaths. In January, renewed intercommunal fighting and high levels of cattle-raiding occurred between the Gok of Cueibet, Rumbek Centre, and neighboring Tonj South of Warrap. After more than 1,000 reports of cattle raids in December, local authorities established an early warning and response mechanism to monitor and report cattle raiding-related activities; however, cattle-raiding and related fighting continued in January.

Figure 12. Household livestock holdings reported by county in December 2019



Source: *FSNMS R25*

Intercommunal violence and insecurity, coupled with pests, plant disease, and poor rainfall distribution, limited the magnitude of improvement in 2019 crop production compared to previous years. Preliminary CFSAM data indicate that 2019 crop production in Cueibet, Yirol East, and Rumbek Centre was 5-25 percent above both 2018 and the five-year average, though still below pre-crisis levels. Violence was especially disruptive to crop production in Rumbek North, where 2019 production was 30 percent below 2018 and nearly 40 percent below the five-year average. In the four areas of concern, the most important crops are sorghum, which was planted by 65-85 percent of households at the county level, and groundnuts, a cash crop planted by 35-70 percent of households at the county level. According to FSNMS R25 data collected in December, households in Yirol East and Rumbek North expected their sorghum and groundnut stocks would only last 1.5-2 months on average, while households in Cueibet and Rumbek Centre estimated their stocks would last only 3-4 months on average, compared to 6 to 8 months in a normal year. Supplemental crops included maize, millet, and simsim. In early February, FEWS NET confirmed during a rapid assessment to Yirol East that most households would likely exhaust their own stocks in March.

Intercommunal violence and cattle-raiding has also had negative impacts on livestock production, primarily in terms of asset losses at the household level or increased difficulty accessing markets for livestock trade. Livestock production is the second most important livelihood activity in this area, as livestock can be sold to purchase food or non-food items, utilized for milk and egg production, or sold for bride wealth payments. However, 17-42 percent of households reported during the FSNMS R25 survey that raiding had reduced their livestock holdings compared to the same period last year. In late 2019, more than half of households in Yirol East and nearly 40 percent in Rumbek Centre reported owning no livestock (Figure 12). Further, the average cattle holding in Yirol East (1.72 TLU) was among the lowest in Lakes state, though the threat that violence poses to livestock in Yirol East has reportedly declined relative to its neighboring counties of concern. FEWS NET found during a rapid assessment in mid-February that relative calm was facilitating livestock trade between Yirol East and Panyijiar. While both the level of ownership and level of livestock holdings are higher in Cueibet and Rumbek North (Figure 12), 43 percent of households in Rumbek North report that violence restricts their ability to access the market, which can restrict their ability to engage in livestock or livestock product sales. Milk production typically begins to seasonally decline following the wet season, but the levels of production similarly reflect variances in livestock ownership. According to FSNMS R25 data, less than 20 percent of households in Rumbek Centre and Yirol East were accessing milk for consumption in December, mainly from their own cows, compared to approximately 30 percent of households in Cueibet and Rumbek North. Milk availability and consumption has likely further declined as the dry season has progressed.

Similarly, intercommunal conflict and seasonal deterioration in feeder road conditions have continued to periodically disrupt trade flows from Rumbek Centre to Rumbek North and, to some extent, Yirol East (Figure 5). The heightened cost of transportation, in addition to net deficit supply, continues to drive high staple food prices in Nyang and Maper markets in Yirol East and in Rumbek North. During a market assessment conducted in Yirol East in mid-February, FEWS NET found that the retail price of a kilogram of sorghum or maize is 20-30 percent higher compared to the same time last year.

Although gathered natural food sources such as fish and wild foods were a relatively minor source of food in December compared to own production and market purchases (Figure 4), these sources rise in importance as food stocks are depleted. Based on FSNMS R25 data, 19-25 percent of households in Cueibet and Rumbek North were accessing fish for consumption compared to 6-10 percent in Rumbek Centre and Yirol East. However, FEWS NET found during a recent rapid field assessment that reliance on fish in Yirol East, where there are many fishing grounds, had significantly increased in February in Pagarua, Adior, Nyang, Tinagau, Khap, and Malek payams.

As a result of the above factors, it is expected that, in February, most households are consuming fewer meals per day to extend their own-produced food stocks through March, supplemented with a little milk, fish, or wild foods. Based on food assistance delivered from November to January, only 14 percent of the population of Rumbek North was reached with food assistance that amounted to 38 percent of their daily kcal needs, while no food assistance was delivered in Cueibet, Rumbek Centre, and Yirol East. Based on the lower level of household food stocks reported in Rumbek North and Yirol East, prevailing insecurity in Rumbek North that impedes livestock trade, and low level of livestock ownership in Yirol East, it is expected that Emergency (IPC Phase 4) has been sustained in Rumbek North in February while Yirol East has deteriorated to Emergency (IPC Phase 4). Crisis (IPC Phase 3) outcomes have likely been sustained in Cueibet and Rumbek Centre, where household food stocks were relatively higher and not likely to be depleted until March or April.

Assumptions

In addition to the national-level assumptions, the most likely outcomes for counties of concern in Lakes are based on the following assumptions:

- Based on past trends, Rumbek North and Yirol East are most likely to be affected by intercommunal conflict and cattle raids, as are Cueibet and Rumbek Centre but to a lesser extent. Conflict over rangeland resources is expected to escalate through May as livestock converge in swampy areas and herders search for pasture and water during the dry season.
- Based on prevailing trends, periodic disruptions due to conflict are most likely along trade routes in Rumbek North and Yirol East, as well as Cueibet, throughout the scenario period. However, due to seasonal improvement in road conditions during the dry season, trade flows and market functioning are likely to be relatively better from February to May.
- In line with seasonal trends, access to livestock products and fish will steadily decline from February to June as seasonal streams dry up and fish catch volumes decline and livestock migrate away from the homestead to dry season grazing areas. Availability of milk and fish will begin to improve with the start of the wet season in May/June, though peak fish availability is typically attained after August. Reflecting levels of livestock ownership and livestock holdings, access to milk is expected to be lower in Yirol East and Rumbek Centre compared to Rumbek North and Cueibet.
- Based on FEWS NET's integrated price projection for Rumbek Central market, white sorghum prices are expected to rise after household food stocks are depleted and will likely peak in August prior to the start of the green harvest in September. The price of a kg of white sorghum is anticipated to be above the 2019 and five-year average, likely ranging between 171-223 SSP/kg from February to May and 250-290 SSP/kg from June to August before declining in September.
- Based on WFP's operation plan, food assistance is likely to reach 11 percent of the population with 34 percent of their kcal needs, on average, in Rumbek Centre, Cueibet, and Yirol East from February to April. In Rumbek North, food assistance is likely to reach 19 percent of the population with 54 percent of their kcal needs. Food assistance is planned to scale up from May to July. In Yirol East and Cueibet, an average 28 percent of the population is likely to receive 40 percent of their kcal needs; in Rumbek North, 52 percent of the population is likely to receive 50 percent of their kcal needs. However, only 22 percent of the population in Rumbek Centre is likely to receive 28 percent of their kcal needs. Food assistance is currently not planned and funded in August or September.

Most Likely Food Security Outcomes

Food security is expected to gradually deteriorate from February to May as household food stocks become exhausted, the availability of livestock products, fish, and wild foods seasonally declines, and staple food prices rise. On average, households will exhaust their food stocks earlier in Rumbek North and Yirol East compared to Cueibet and Rumbek Centre. However, in Rumbek Centre, where the proportion of households that planted groundnuts was highest (70 percent), household income from groundnut sales will likely be higher relative to its neighbors. High food prices are expected to constrain household purchasing power and food access, even though some households who own livestock are likely to sell some stock in order to purchase cereals from the market. The severity of food insecurity will likely remain highest in Rumbek North and Yirol East, where increased intercommunal conflict during the dry season is expected to periodically limit households' physical access to markets. Emergency (IPC Phase 4) is expected to persist in these two counties, particularly among households who do not own livestock or are internally displaced. In Cueibet and Rumbek Centre, where the likelihood of conflict is relatively lower, the proportion of households experiencing large food gaps or engaging in emergency livelihoods coping strategies is expected to increase, but Crisis (IPC Phase 3) outcomes are most likely to be sustained. Given that food assistance is planned to reach less than 25 percent of the population in each county, it is not likely to mitigate outcomes at the area level.

As the lean season progresses from June to September, food insecurity is expected to remain poor, given that no food stocks will be available and food prices will peak in August. In addition to having low purchasing power, households will likely encounter difficulty physically accessing markets during the June to September rainy season due to seasonal floods. Although natural food sources like wild leaves and fruits will be seasonally available to households, this typically accounts for a small to moderate proportion of their minimum food needs. However, wild foods coupled with seasonal milk availability will help to mitigate food gaps among households that own livestock. Households without access to livestock will be most reliant on food assistance to mitigate food consumption gaps during the lean season. Given that at least 20 percent to more than 50 percent of households do not own livestock in these areas, and since food assistance is not planned to reach the population in need in August and September, Crisis (IPC Phase 3) or worse outcomes are expected to persist until the start of the green harvest in September. Emergency (IPC Phase 4) is expected in Yirol East, where livestock ownership is lowest. Emergency (IPC Phase 4) is also expected in Rumbek North, despite high livestock ownership, as past trends suggest that intercommunal conflict and seasonal floods will likely prevent at least 20 percent of the population from accessing enough food sources, including food assistance, to prevent large food gaps. Crisis! (IPC Phase 3!) is expected in Cueibet, based on relatively lower levels of conflict, relatively better livestock holdings, and access to food assistance. Crisis (IPC Phase 3) is expected in Rumbek Centre due to high food prices, which will limit adequate food access, but wild foods and groundnuts will likely mitigate larger consumption gaps.

OTHER AREAS OF CONCERN

Upper Nile State: Maban, Ulang, Nasir, Longochuk, and Maiwut Counties

The food security situation in eastern Upper Nile state remains severe during the January/February 2020 post-harvest season, particularly in Ulang, Nasir, Longochuk, and Maban. The late 2019 floods disrupted trade flows and assistance delivery, killed livestock, and destroyed crops, which drove large cereal deficits in the 2020 consumption year. According to FSNMS R25 data collected during November/December 2019, many households in these areas of concern are only able to mitigate large food consumptions gaps by engaging in emergency livelihoods coping strategies. 33 to 86 percent of households reported a poor FCS in Ulang, Nasir, Longochuk, and Maban, reflecting Emergency (IPC Phase 4) outcomes. In Maban, the mean FCS reported in December was 12.2, the lowest in the country. Although 69 to 86 percent of the households in these counties also reported moderate hunger score of 2-3 on the HHS, indicative of Crisis (IPC Phase 3), 25-36 percent of households in Nasir, Maban, Ulang and Longochuk reported they had sold or slaughtered their last female cow or goat for food or to buy food, 33-90 percent of household reported migration to nearby villages in search for food, and 25-69 percent reported using community leaders or local court to gain support for food. In Maiwut, only 2-16 percent of households were engaged in similar strategies, suggesting a slightly lower level of asset erosion. Emergency (IPC Phase 4) outcomes existed in all counties of concern in January.

In February, receding flood waters have helped to improve trade flows and market functioning, household access to typical food and income sources, and humanitarian access. In Maban and Maiwut, key informant information indicates that trade flows from Sudan and Ethiopia are occurring and market supplies have started to increase. However, the purchasing power of most households remain very low. In Maiwut, security has been restored, allowing resumption of delivery of food assistance and household movement in search of natural food sources, including fish and wild foods. Additionally, households who own livestock have access to milk as livestock are still near homesteads where some pasture and water is still available. Food assistance has helped to prevent more extreme outcomes in counties where the reach with assistance was significant. Based on GFD and FFA distribution reports, food assistance delivered from November 2019 to January 2020 reached most of the food insecure population in Maban, including IDPs and returnees, with 60 percent of their daily kcal needs. In Ulang and Longochuk, 35-44 percent of the population received 70-106 percent of their daily kcal needs. In Nasir, only 10 percent of the county population received 71 percent of their daily kcal needs. In Maiwut, no monthly distribution of GFD and FFA was conducted due to conflict-related disruptions. Crisis! (IPC Phase 3!) outcomes were present in February in Maban, Longochuk, and Ulang. However, Emergency (IPC Phase 4) persisted in Nasir and Maiwut.

The national assumptions for the most likely scenario are also relevant to eastern Upper Nile. From February to May, it is likely that households' own produced food stocks will become completely depleted, based on an average stock duration of 1-2 months in Ulang, Longochuk, and Nasir and 3-4.5 months in Maban and Maiwut. Other natural food sources such as wild leaves, fruits, game, fish and livestock are expected to be seasonally at their lowest levels, though their availability is likely to increase from June-September with the average rainfall forecast. Trade flows and market access are expected to improve during the February-May dry season, but are likely to again deteriorate during the June-September main rainfall season.

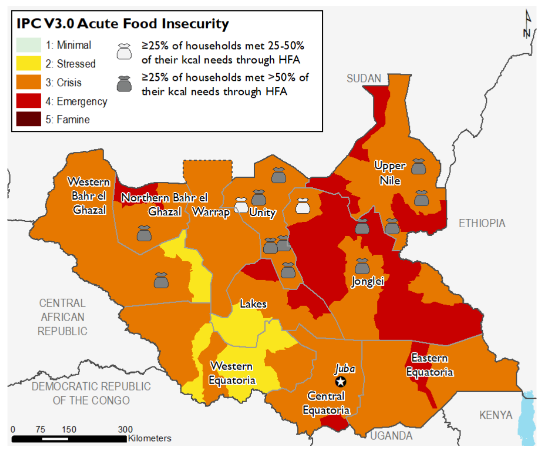
Based on available planned and likely humanitarian food assistance, 25-87 percent in Longochuk and Maban will be reached with 48-81 percent of their kcal needs; and 7-21 percent of population in Maiwut, Nasir, and Ulang will likely be reached with 44-57 percent of kcal needs during the February to April period. From May to July, WFP and partners planned to scale up food assistance to reach 32-48 percent of each county population with 41 percent of their kcal needs in Nasir, Ulang and Longochuk but will scale down food assistance in Maban to zero.

Based on the above assumptions, Emergency (IPC Phase 4) is expected from February to May in Longochuk, Nasir, Maiwut and Ulang, where the impact of planned food assistance is not likely to be significant; however, Crisis! (IPC Phase 3!) is expected in Maban, where planned food assistance will remain significant. From June to September, the availability of natural food sources such as fish and livestock are expected to seasonally increase and will be accessible to households, but physical access to markets and trade flows are expected to be limited due to seasonal deterioration in feeder roads conditions. Households are expected to face large food consumption gaps this period. Emergency (IPC Phase 4) outcomes are anticipated in all counties at the peak of the lean season in the presence of humanitarian food assistance.

MOST LIKELY FOOD SECURITY OUTCOMES AND AREAS RECEIVING SIGNIFICANT LEVELS OF HUMANITARIAN ASSISTANCE*

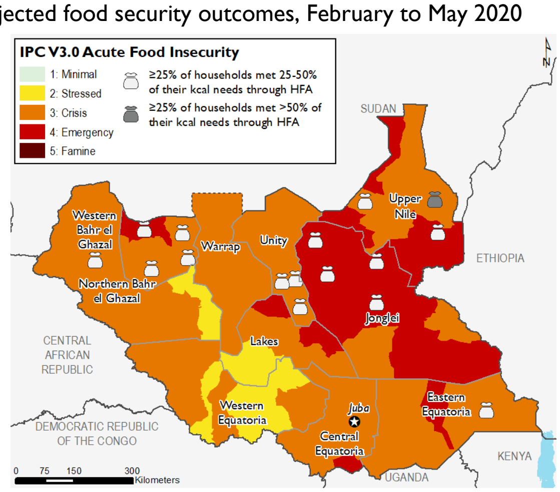
Each of these maps adheres to IPC v3.0 humanitarian assistance mapping protocols and flags where significant levels of humanitarian assistance are being/are expected to be provided. indicates that at least 25 percent of households receive on average 25–50 percent of caloric needs from humanitarian food assistance (HFA). indicates that at least 25 percent of households receive on average over 50 percent of caloric needs through HFA. This mapping protocol differs from the (!) protocol used in the maps at the top of the report. The use of (!) indicates areas that would likely be at least one phase worse in the absence of current or programmed humanitarian assistance.

Current, February 2020



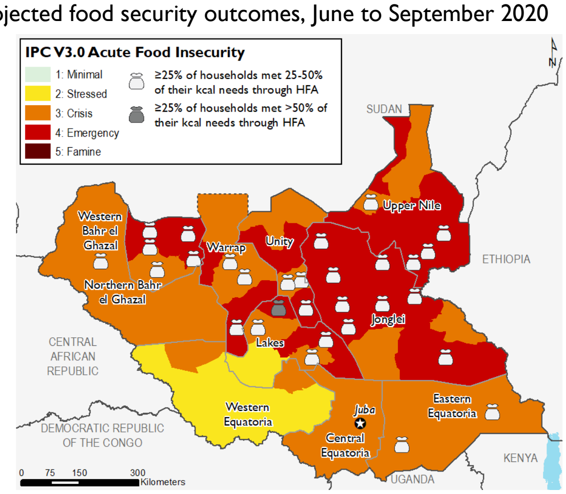
Source: *FEWS NET*

Projected food security outcomes, February to May 2020



Source: *FEWS NET*

Projected food security outcomes, June to September 2020



Source: *FEWS NET*

FEWS NET classification is IPC-compatible. IPC-compatible analysis follows key IPC protocols but does not necessarily reflect the consensus of national food security partners.

ABOUT SCENARIO DEVELOPMENT

To project food security outcomes, FEWS NET develops a set of assumptions about likely events, their effects, and the probable responses of various actors. FEWS NET analyzes these assumptions in the context of current conditions and local livelihoods to arrive at a most likely scenario for the coming eight months. Learn more here.