Summary of the 2019 In-depth Vulnerability and Needs Assessment for Zambia
June 2019 – MARCH 2020

Overview
About 2.3 million people during the lean season, between October 2019 and March 2020, are estimated to be facing IPC Phase 3 or worse food security situation. The devastating effects of erratic rains, dry spells, water logging, false and late start to the 2018/2019 rain season on agriculture production were the main causes of reduced crop production contributing to the acute food insecurity conditions across the country.

Prolonged dry spells affected Southern, Western and parts of Lusaka, Eastern and Central provinces, while flash floods, water logging and leaching were in the northern and eastern parts of the country.

Key Drivers

- **Drought conditions and dry spells led to a marked decrease in crop production**
- **Erratic rains mostly in the south resulted in reduced crop production**
- **Flooding in the north led to water logging and leaching of nutrients for crops**
Current Situation Overview

Between May – September 2019 representing the current period, about 1.7 million people (19% of Zambia Rural population), will require urgent action to protect their livelihoods and reduce food consumption gaps. 16% are in phase 3, marginally able to meet minimum food needs but only by depleting essential livelihood assets or through crisis-coping strategies and 3% in phase 4, facing large food gaps. Out of the 86 analysed districts, two districts have been classified in phase 4 (Gwembe – 14,800 and Lunga – 5,600), 48 districts are in phase 3, 39 districts in phase 2 while one is in Phase 1.

In all the districts classified in Phase 3 or worse, households have already started employing food based coping strategies such as reducing number of meals and meal portions with some having experienced problems in food access in the preceding 30 days, which coincided with the start of the 2019-2020 consumption year in April 2019.

The devastating effects of dry spells, water logging, false and late start to rain season on agriculture production were the main causes of reduced food availability and food access thus contributing to the acute food insecurity conditions across the country. The prolonged dry spells between January and March 2019 affected Southern, Western and parts of Lusaka and Central provinces. In most districts, the majority of households, who were facing the second consecutive season with prolonged dry spells, had limited and depleted stocks of cereal with cereals depleting during the first three months of the April 2019 – March 2020 consumption period. The majority of these households rely entirely on crop production for food and income.

A number of districts registered huge decline in maize production for example Gwembe which had a 98% reduction in maize compared to last year and five-year average. At national level, maize production decreased to 2,004,389 metric tonnes from 2,394,907 metric tonnes produced last season, representing a 16% decline in production. Gwembe had the highest proportion of households that reported to have sold more than unusual amount of livestock while the sample average indicated about 10%.

Projected Situation Overview

The food security situation is estimated to deteriorate during the lean season, which forms the projected period for this analysis. Between October 2019 and the end of the current consumption period (March), 2.3 million people are estimated to be in crisis (phase 3) or worse, comprising 1.9 million (26%) in Phase 3 and 450,000 (5%) in emergency (phase 4). Only 39% of households had cereal stocks to last more than 6 moths of which 31% had for more than 10 months. More districts are expected to slip into worse off phases as food from own production depletes and increase reliance on coping mechanisms. It is expected that the current ban on exports of cereals will remain throughout the projected period and will ensure that cereal especially maize prices remain stable though increasing.

Three districts (Gwembe – 15,000, Shang’ombo – 13,000 and Lunga – 6,000) are projected to be in phase 4 food insecurity situations and will face huge food gaps as the situation deteriorates due to consecutive reduction in cereal production largely due to erratic and late start of rains. 52 districts are estimated to be facing in phase 3 (Crisis) situations, while 33 will be in phase 2 (Stress) situations. During this period, the proportion of households facing Phase 4 situations are expected to increase especially in Gwembe, Lunga and Shang’ombo which had already recorded an increase in sale of usual amount of livestock.

The analysis assumed a normal rain season for the 2019/2020 agriculture season, which falls within the projected period and is expected to provide casual labour opportunities for poor households in selected districts. Reliance on the market will expose 39% of the households who were already spending more than 65% of their income on food to food insecurity as prices increase during the lean season.
RECOMMENDATIONS FOR ACTION

Response Priorities

- Provide humanitarian support in terms of food relief for the districts falling within phase 3 and 4.
- Livelihood diversification programmes be scaled up in order to contribute to alternative livelihoods for the communities.
- Strengthen the support on conservation farming implementation.
- Owing to the existence of many dambo’s and rivers in the northern and western parts of the country, there is need to promote community irrigation schemes and water harvesting for off-season production in order to improve food security conditions at household level.
- DMMU needs to strengthen the monitoring system related to the food security situation in the 87 districts to track the food security parameters/variables as they evolve. This would assist in making informed decisions on the districts whose situation may change.
- Fish restocking in most of the assessed districts especially the northern half of the country.
- Strengthening of livestock disease surveillance system in all areas.
- Enhance the homegrown school meals in all the 87 districts.
- Promote livelihood diversification for sustainable recovery.

Situation Monitoring and Update of Activities

**Climatic conditions:** The analysis assumed a normal rainfall season for the projected period. Any change to this assumption will entail updating the food security situation for the projected period as availability of casual labour for the vulnerable households to engage in during this period is dependent on the performance of the season.

**Commodity Prices:** Prices have been higher than the previous consumption period and are assumed to gradually increase due to reduced production and depressed supply. As we approach the lean season, there’s a need to continuously monitor these prices especially for households that have already depleted their stocks and are now relying on the market.

**Government Policy:** The current ban on grain exports has led to grain prices stabilizing in some areas although it has risen sharply in others. Any change in the policy will negatively affect the food security situation.

**Pest and Diseases:** There is a continued need to monitor diseases for mostly the southern and western parts of the country, which had already witnessed outbreaks. However, due to reduced rainfall availability of pastures and water might lead to increased interaction of domestic and wild animals thereby increase s.

**Monitor nutrition status:** With the depletion of stocks malnutrition is expected to increase and hence active monitoring of nutrition levels is of paramount importance.
Overview of map and population table

<table>
<thead>
<tr>
<th>Province</th>
<th>Rural Population (#)</th>
<th>Phase 1 (# of People)</th>
<th>Phase 1 (%)</th>
<th>Phase 2 (# of People)</th>
<th>Phase 2 (%)</th>
<th>Phase 3 (# of People)</th>
<th>Phase 3 (%)</th>
<th>Phase 4 (# of People)</th>
<th>Phase 4 (%)</th>
<th>Phase 3 or higher (# of People)</th>
<th>Phase 3 or higher (%)</th>
<th>Phase 3 or higher People</th>
</tr>
</thead>
<tbody>
<tr>
<td>Central</td>
<td>1,114,304</td>
<td>590,716</td>
<td>53%</td>
<td>341,740</td>
<td>31%</td>
<td>152,039</td>
<td>14%</td>
<td>29,794</td>
<td>3%</td>
<td>181,833</td>
<td>16%</td>
<td>1,657,236</td>
</tr>
<tr>
<td>Eastern</td>
<td>1,672,391</td>
<td>1,011,525</td>
<td>60%</td>
<td>467,708</td>
<td>28%</td>
<td>159,366</td>
<td>10%</td>
<td>33,776</td>
<td>2%</td>
<td>193,142</td>
<td>12%</td>
<td>201,352</td>
</tr>
<tr>
<td>Luapula</td>
<td>957,780</td>
<td>394,702</td>
<td>41%</td>
<td>361,718</td>
<td>38%</td>
<td>186,152</td>
<td>19%</td>
<td>15,200</td>
<td>2%</td>
<td>113,760</td>
<td>14%</td>
<td>201,352</td>
</tr>
<tr>
<td>Lusaka</td>
<td>589,177</td>
<td>282,850</td>
<td>48%</td>
<td>192,556</td>
<td>33%</td>
<td>96,397</td>
<td>16%</td>
<td>17,363</td>
<td>3%</td>
<td>113,760</td>
<td>12%</td>
<td>193,142</td>
</tr>
<tr>
<td>Muchinga</td>
<td>943,714</td>
<td>497,292</td>
<td>53%</td>
<td>316,754</td>
<td>34%</td>
<td>108,752</td>
<td>12%</td>
<td>20,908</td>
<td>2%</td>
<td>129,660</td>
<td>14%</td>
<td>193,142</td>
</tr>
<tr>
<td>North-Western</td>
<td>441,938</td>
<td>218,276</td>
<td>49%</td>
<td>138,800</td>
<td>31%</td>
<td>70,492</td>
<td>16%</td>
<td>14,360</td>
<td>3%</td>
<td>84,852</td>
<td>19%</td>
<td>193,142</td>
</tr>
<tr>
<td>Northern</td>
<td>1,171,174</td>
<td>856,315</td>
<td>73%</td>
<td>224,368</td>
<td>19%</td>
<td>85,736</td>
<td>7%</td>
<td>4,753</td>
<td>0%</td>
<td>90,489</td>
<td>8%</td>
<td>1,657,236</td>
</tr>
<tr>
<td>Southern</td>
<td>1,427,696</td>
<td>635,334</td>
<td>45%</td>
<td>442,192</td>
<td>31%</td>
<td>285,033</td>
<td>20%</td>
<td>65,124</td>
<td>5%</td>
<td>350,157</td>
<td>25%</td>
<td>1,657,236</td>
</tr>
<tr>
<td>Western</td>
<td>927,058</td>
<td>281,468</td>
<td>30%</td>
<td>333,585</td>
<td>36%</td>
<td>240,251</td>
<td>26%</td>
<td>71,740</td>
<td>8%</td>
<td>311,991</td>
<td>34%</td>
<td>1,657,236</td>
</tr>
<tr>
<td>Grand Total</td>
<td>9,245,232</td>
<td>4,768,478</td>
<td>52%</td>
<td>2,819,421</td>
<td>30%</td>
<td>1,384,218</td>
<td>15%</td>
<td>273,018</td>
<td>3%</td>
<td>1,657,236</td>
<td>18%</td>
<td>1,657,236</td>
</tr>
</tbody>
</table>
PROJECTED IPC ACUTE FOOD INSECURITY SITUATION FOR MONTH YEAR

Province | Rural Population (#) | Phase 1 (# of People) | Phase 1 (%) | Phase 2 (# of People) | Phase 2 (%) | Phase 3 (# of People) | Phase 3 (%) | Phase 4 (# of People) | Phase 4 (%) | Phase 3 or higher (# of People) | Phase 3 or higher (% of People)
--- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | ---
Central | 1,133,509 | 456,437 | 40% | 408,800 | 36% | 224,649 | 20% | 43,610 | 4% | 303,413 | 27%
Eastern | 1,716,300 | 1,203,415 | 70% | 721,386 | 42% | 264,605 | 15% | 109,567 | 6% | 438,395 | 26%
Luapula | 980,374 | 477,931 | 49% | 428,606 | 49% | 252,463 | 26% | 26,864 | 3% | 279,307 | 28%
Lusaka | 608,162 | 244,019 | 40% | 231,405 | 38% | 133,967 | 22% | 43,612 | 7% | 175,909 | 29%
Muchinga | 980,234 | 517,421 | 53% | 402,733 | 41% | 145,851 | 15% | 12,929 | 1% | 158,780 | 16%
North-Western | 453,238 | 196,791 | 43% | 177,042 | 39% | 100,747 | 22% | 34,349 | 8% | 135,096 | 30%
Northern | 1,201,430 | 820,167 | 68% | 284,196 | 24% | 92,441 | 8% | 4,625 | 0% | 97,066 | 8%
Southern | 1,464,316 | 541,697 | 37% | 547,879 | 37% | 356,848 | 24% | 90,504 | 6% | 447,352 | 31%
Western | 942,100 | 224,023 | 24% | 319,223 | 34% | 306,472 | 33% | 92,362 | 10% | 398,834 | 42%
Grand Total | 9,479,663 | 4,685,704 | 49% | 3,578,598 | 38% | 1,880,124 | 20% | 450,058 | 5% | 2,330,182 | 25%

What’s on the map and in the table?

Province
Rural Population (#)
Phase 1 (# of People)
Phase 1 (%)
Phase 2 (# of People)
Phase 2 (%)
Phase 3 (# of People)
Phase 3 (%)
Phase 4 (# of People)
Phase 4 (%)
Phase 3 or higher (# of People)
Phase 3 or higher (% of People)

Province
Rural Population (#)
Phase 1 (# of People)
Phase 1 (%)
Phase 2 (# of People)
Phase 2 (%)
Phase 3 (# of People)
Phase 3 (%)
Phase 4 (# of People)
Phase 4 (%)
Phase 3 or higher (# of People)
Phase 3 or higher (% of People)
Water and Sanitation

Water Sources

The Assessment revealed that 67 percent of the population had access to improved water sources or “At least Basic” water service level (up from 63.5 percent in 2018), consisting of borehole at 50.6% (50.5% for 2018), protected well at 11.5% (8.9% for 2018) and piped water at 4.9% (4.1% for 2018). The Assessment also revealed that 32 percent of the population (down from 36.5 percent in 2018), drew water from unimproved sources which were unprotected wells at 19.1% (21% for 2018) and open sources such as rivers and lakes at 12.9% (15.5% for 2018). Comparing these findings from the recently released 2019 JMP Report (WHO-UNICEF JMP with 2017 data), the JMP report put the 2017 population for Zambia with access to improved water sources or “At least Basic” water service level at 60 percent, and the population who drew water from unimproved sources at 34.8 percent.

The national portion of areas affected by prolonged drought and had lower water levels were at 51.5 percent with the most affected provinces being Western with 55.7 percent, Lusaka with 51.6 percent, North Western with 50.7 percent, Southern with 48 percent and Central with 33 percent of the areas affected. There are already indications of serious water stress in Lusaka, Central, Western and Southern provinces.

Sanitation

The assessment found that the traditional latrines were the most commonly used by households 81.8 percent followed by Sanplat latrines at 3.5 percent, then flush toilets and VIP latrines at 1.2 percent. The results also showed a large proportion of households with no sanitation facilities at all and opted to use open defecation at 12 percent.

Response Priorities

Provision of Water

- Borehole drilling and construction of piped water systems should continue in areas where people are obtaining water from unimproved sources and where the distance from household to the water point is more than 500m.
- Rehabilitation, improvements and maintenance of existing water infrastructure should be prioritised.
- Promote community wide sanitation improvement using community – led total sanitation (CLTS) and Personal Hygiene and Sanitation (PHAST) to ensure that all people have access to latrines in order to end open defecation.
• Scale up the construction of demonstration latrines at the schools, health centres, rural community centres (markets, faith centres, and traditional chiefs’ palaces).
• Implement, with support of NGOs, the water harvesting programme at community and household levels for climate change adaptation.
• Promote community level water supply and sanitation technology options (including solar piped water systems), disaster risk reduction and resilience building including climate change adaptation activities, to ensure preparedness and resilience of communities to disasters.
• Promote community level modern energy adoption of solar and energy saving stoves that use twigs for cooking and water boiling to reduce/ prevent cutting of trees, improve air quality in the kitchens and reduce coughing and air pollution.

Sanitation and Hygiene

• Encourage private-sector involvement to build and run sanitation shops at District/Chiefdom level to sell sanitation facilities and give advice on improved sanitation facility construction, and latrine operation and maintenance.
• Promote community level sanitation technology options (including sanplat/ flush/ pour-flush toilets),
• Promotion of energy saving stoves to prevent smoke in kitchens to prevent coughs and other respiratory diseases.
• Render support to vulnerable groups and households facing technical and physical challenges for the construction of latrines through sanitation marketing using the private sector.

Nutrition

The current Vulnerability Assessment (VAC, 2019) has revealed an increase in severe acute malnutrition levels; now standing at 5.9% across the 9 provinces of Zambia. Out of the 87 assessed districts for vulnerability assessment, 24 indicated prevalence of wasting above the national prevalence of 4%. Among the district with high prevalence of wasting are mainly those in western province namely; Shang’ombo (33%), Sioma (29%) and Kalabo (21%). The other districts are in the medium severity of wasting. They include Mongu, Limulunga, Luano and Ngabwe with the prevalence of 11% each. Siavonga, Sinazongwe, Kazugula, Namwala, Lunga, Kaoma and Nkeyema indicate medium wasting prevalence of 10%.

Prevalence of wasting at provincial level among the selected districts showed that all the provinces call for attention as the situation (GAM) is above the acceptable levels. The severity of wasting is within the medium threshold and requires nutrition specific interventions to address wasting among the vulnerable groups in emergencies.
Double Burden of Malnutrition

It is imperative to note that Zambia is experiencing a double burden of malnutrition. While figures for severe acute malnutrition is on the rise, the figures for childhood obesity are also on the rise, with 8.7% and 18.7% children under the age of 5 being overweight and obese respectively. The phenomena of double burden of malnutrition require urgent and focused attention.

Vitamin A Capsule Supplementation and De-Worming

Vitamin A Capsule Supplementation (VACS) and de-worming are high impact interventions recommended for children 6 to 59 months and 12 to 59 months old respectively. The reported coverage of vitamin A supplementation was 83.2% while de-worming was 65.6%. Lusaka reported

Response Priorities

- Provision and support of interventions such as food and micronutrient supplementation.
- Promoting maternal and child nutrition support before and during pregnancy and lactation by assisting communities to apply optimal nutrition and care practices, with a focus on life-saving intervention during emergencies.
- Integration of small-scale farming (gardening) and rearing small livestock to support food security at the household level.
- Scaling up coverage and rolling out preventive interventions in emergency areas such as:
  - Promotion of infant and young child feeding practices.
  - Growth monitoring and promotion (Growth assessment and counselling)
  - Addressing severe acute malnutrition.
- Develop and disseminate IEC material in all seven official languages.
- Setting up comprehensive monitoring and surveillance systems to monitor the nutrition status of population.

Human Health

The probable shortage of water in selected districts of the country is likely to lead to diarrheal and zoonotic diseases. The prevalent diarrheal diseases include typhoid and cholera. The diarrhea cases in these districts is quite high, this is partly due to the high percentage of people (64 percent) getting their water from unimproved source; the 95 percent of people who do not treat their water for use, and high percentage of people who have no toilets (open defecation) or use unimproved traditional latrines (only 11.2 percent use improved latrines).

From the low water and sanitation figures, we can even infer that the personal hygiene figures are this bad, including handwashing being low. This situation is consistent with some other parts of the
country, so the WASH solution should be thought of from the development point of view, since it was reported that the populations are remote and access to these areas is difficult, provision of WASH services and facilities could be very difficult and costly.

Response Priorities

- Promotion of consumption of healthy, diversified diets, including high quality nutrient rich foods for both men and women.
- Restocking of essential drugs in rural health posts to ensure that they are capacitated to treat these diseases.

Livestock Diseases and Control

The mingling of wild animals and livestock is likely to lead to increase in livestock diseases mainly anthrax since they are likely to be drinking from main source. There are also diseases of economic importance such as Foot and Mouth Disease (FMD) which have already been reported in Central and Southern provinces that are likely to spread to other provinces of Lusaka and Western. These further dampen the coping capacity of households in the sense that the households are denied the opportunity to sell the animals and earn some money that can be used to cover other household requirements.

Other diseases that have been reported include East Coast Fever and Contagious Bovine Pleura Pneumonia (CBPP) all of which require to be controlled in order to allow the sub-sector to grow and afford households the desired levels of resilience that come with owning such assets. Areas where these diseases are endemic include Central, Eastern, Southern and Western provinces.

Response Priorities

- Disease surveillance and control
- Provision of water for the animals
- Mount a rigorous vaccination campaign against identified diseases
- Restocking in selected parts of the country especially of small ruminants that are hardy.
- Planting of improved pasture in the medium term to allow for improved feeding practices.

Education

Results showed that of the households with school going children, a small proportion of about 11 percent had their children absent from school between January and April, 2019. The households with the highest number of children absent from school were found mainly in Monze (9.9 percent) followed by Kalomo (5 percent), Lundazi (6 percent).
In terms of school infrastructure, most the districts indicated having stocks that had blown off that required to be rehabilitated. The Ministry still has a backlog of schools with blown off roofs which occurred during the 2015/2016 season which still requires rehabilitation.

Response Priorities

- There is need to rehabilitate schools whose infrastructure had been damaged by the rains.
- School feeding programmes need to be scaled up particularly in areas where shock impacts were high.