THE GLOBAL ASSESSMENT OF THE STATE OF FOOD SECURITY AND PROGRESS TOWARDS ACHIEVING THE HUNGER AND FOOD INSECURITY TARGETS

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Abstract

This scientific approach presents an updated global assessment of food insecurity and nutrition for up to the year 2021 and a scientific approach on progress towards meeting SDG Targets 1 and 2 ending hunger and ensuring access to safe, nutritious and sufficient food for all people all year round and eradicating all forms of malnutrition. Despite hopes that the world would emerge more quickly from the crisis and food security would begin to recover from the pandemic in 2021, the pandemic held its grip and even tightened it in some parts of the world. The rebound of gross domestic product (GDP) growth observed in most countries in 2021 did not translate into gains in food security in the same year. Enormous challenges are still faced by those who continue to be the most affected: those with less wealth, lower and more unstable incomes and poorer access to critical basic services. Another crisis is unfolding as this scientific approach is being written with potentially sobering implications for global food security and nutrition: the war in Ukraine. Although the statistics presented in this scientific approach represent the state of food security and nutrition up until 2021, the direct and indirect effects of the conflict in 2022 will have multiple implications for global agricultural markets through the channels of trade, production and prices. Ultimately, this casts a shadow over the state of food security and nutrition for many countries, in particular those that are already facing hunger and food crisis situations, and poses an additional challenge for achieving the SDG 2 targets of ending hunger and ensuring access to adequate food for all (SDG Target 1) and of eliminating all forms of malnutrition (SDG Target 2).

Key words: global assessment, food insecurity and nutrition, Sustainable Development Goals (SDG)

The unprecedented COVID-19 pandemic in 2020, and its continuing impacts in 2021, pose a significant challenge for the assessment of the state of food insecurity in the world. The physical distancing measures taken to contain the spread of the pandemic disrupted normal data collection activities in 2020. Although some activities were resumed in 2021, resurgent waves of the pandemic continued to impede normal statistical operations around the world. As a result, the uncertainty that always characterizes estimates of how many people are suffering from hunger and food insecurity has been further amplified.

In this scientific approach, the 2020 and 2021 estimates of the global PoU (SDG Indicator 1) are presented as ranges to reflect the added uncertainty induced by the lingering consequences of the COVID-19 pandemic (Beazley R. *et al*, 2021). It is important to note that, as usual, the PoU estimates corresponding to the most recent year reported (2021) are not based on data reported directly by countries. Rather, they are obtained by nowcasting the parameters needed to estimate the PoU. Parameters were updated using the most recent information available to FAO regarding the food supply and reasonable assumptions on the extent of inequality in access to food. For the 63 countries with the highest numbers of undernourished people, PoU estimates for 2020 have been substantially revised compared to last year's assessment, benefiting from official data on food production, trade and utilization reported by these countries. For the rest of the countries, the 2020 food supply values used to estimate the PoU are still nowcasts. Most importantly, uncertainty remains on the extent of inequality in access to food in both 2020 and 2021 due to the lack of up-to-date household food consumption data for all countries.

The assessments of the prevalence of moderate or severe food insecurity based on the FIES (SDG Indicator 2), also presented in this paperwork, are informed by survey data collected annually by FAO mainly through the Gallup World Poll (GWP) in over 140 different countries. Contrary to 2020, when data were collected mostly

via telephone interviews due to the restrictions imposed by the pandemic, face-to-face interviews

MATERIAL AND METHOD

In the research we used online versions of several journals, brochures and book volumes to analyze the perspectives of different authors on the notion of food security.

Quantitative research is carried out by the method of observation and by the procedure of analysis of statistical data (secondary data), which covers the national level and the international or global level.

All data used were taken from the official websites of organizations, ministries and governments.

RESULTS AND DISCUSSIONS

SDG Indicator 1: Prevalence of undernourishment (PoU)

World hunger rose further in 2021, following a sharp upturn in 2020 in the midst of the COVID-19 pandemic. The persistence of the

resumed in 2021 in most of the countries, making the assessment for 2021 somewhat more reliable. pandemic and its enduring consequences, which exacerbated existing inequalities, have contributed to further setbacks in 2021 towards achievement of the Zero Hunger target by 2030. After remaining relatively unchanged since 2015, the PoU jumped from 8.0 in 2019 to around 9.3% in 2020 and continued to rise in 2021 – though at a slower pace – to around 9.8% (*figure* 1). It is estimated that between 702 and 828 million people in the world (corresponding to 8.9 and 10.5% of the world population, respectively) faced hunger in 2021. Considering the middle points of the projected ranges (722 and 768 million), hunger affected 46 million more people in 2021 compared to 2020 and a total of 150 million more people since 2019, prior to the COVID-19 pandemic (Alston, J.M. & Pardey, P.G. 2015).

Considering the upper bound of the range, the number could be as high as almost 210 million more people in two years.
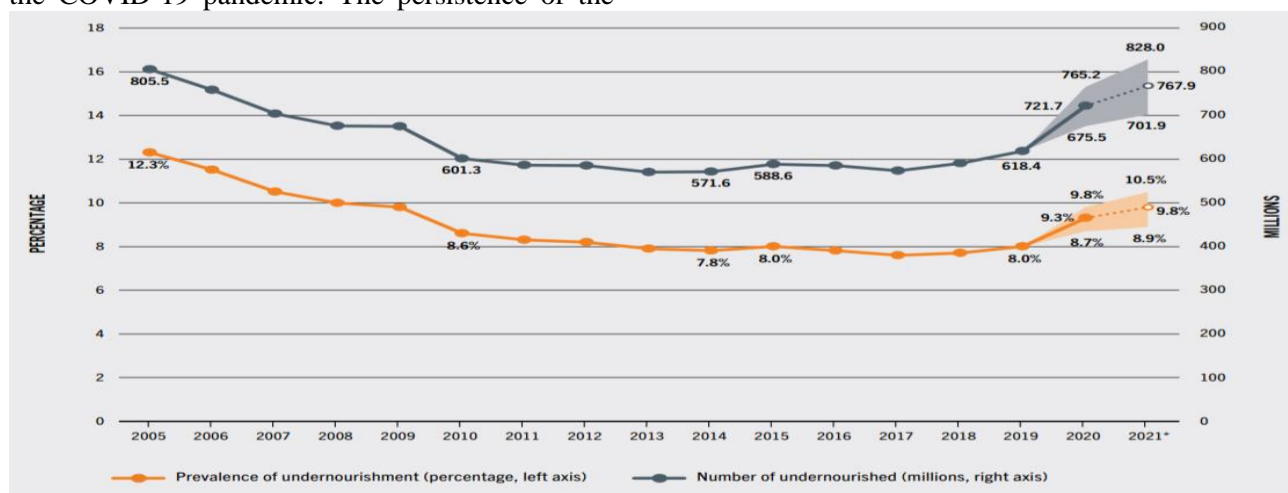

Figure 1 **Prevalence of undernourishment (PoU)** (Source*:* FAO)

The further increase in global hunger in 2021 following the sharp upturn in 2020 is consistent with existing evidence of the persisting economic hardships induced by the COVID-19 crisis that have widened inequalities in access to food. In 2021, the recovery in terms of GDP growth has been highly uneven across countries, mainly in detriment to LICs and lower-middle-income countries (LMICs). While high-income countries (HICs) are recovering at a solid pace with a good prospect of regaining their pre-pandemic real per capita income levels in 2022, LICs and LMICs are experiencing a much slower pace of economic growth, and most are not expected to return to their pre-pandemic levels by 2022. Projections by the World Bank showed that

while the top 20% of the global income distribution had recovered in 2021 about half of the income lost during 2020, the bottom 40% of the income distribution had not yet started to recover their income losses (Jaffee, S. *et al*, 2019), *(figure* 2).

At the same time, data from the aforementioned high-frequency surveys indicate that the employment and earning losses of disadvantaged groups, including women, had only partially recovered. This shows that the crisis has had deeper and more protracted effects on disadvantaged groups, which has worsened the existing inequalities within countries.
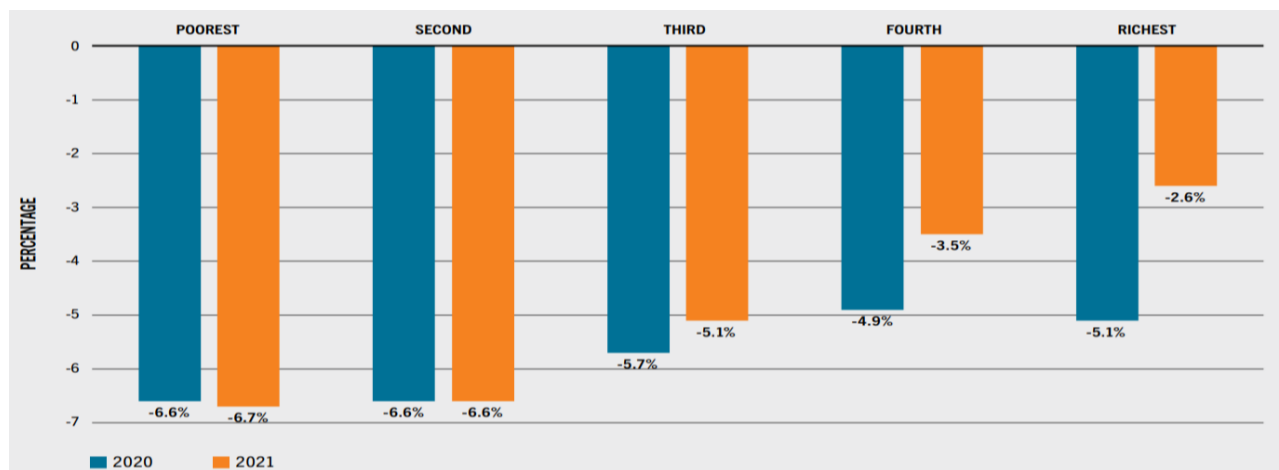
Figure 2 **Comparison of% of income loss by global income quintile due to the covid-19 pandemic in 2020 and 2021 shows large disparities in income recovery** (Source*:* FAO)

These disparities in the impact of the pandemic and the recovery, together with the limited coverage and duration of the social protection measures, led to widening inequalities. As noted in previous editions of this report, inequalities are among the root causes of food insecurity; thus, it is likely that growing inequalities in 2020 weakened the capacity of the economic recovery to translate into increased food security, as is reflected in the growing number of people facing difficulties in accessing food.

SDG Indicator 2 Prevalence of moderate or severe food insecurity in the population, based on the FIES

The FIES enables the estimation of the prevalence of food insecurity at severe levels only, which provides a supplementary lens for monitoring hunger. Although obtained using very different data and methods, the prevalence of severe food insecurity is expected to correlate with the PoU across populations. This is because people experiencing severe food insecurity are unlikely to be able to acquire enough food to continuously fulfil their dietary energy requirements, which is the concept of chronic undernourishment measured by the PoU. FIES data are increasingly available from official national sources as a growing number of countries have adopted the FIES as a standard food security assessment tool (Cafiero C *et al*,. 2022). FIES or equivalent experience-based food security data collected by national institutions were used to inform the estimates in this year's edition of this report for more than 59 countries, covering more than a quarter of the world population. For the remaining countries, estimates are based on FIES data collected by FAO, mainly through the GWP. Additionally, this year's report is also informed by FIES data collected by FAO in 2021 for 20 LDCs, land locked developing countries

(LLDCs) and Small Island Developing States (SIDS), all for which food security data are scarce. In this sense, data collected for the very first time in island nations of the Caribbean, Africa and Asia, for example, help to broaden our understanding of the status of food insecurity in vulnerable countries. The prevalence of moderate or severe food insecurity at the global level has been increasing since FAO first started collecting FIES data in 2014 (*figure* 3).

In 2020, the year the COVID-19 pandemic spread across the globe, it rose nearly as much as in the previous five years combined. New estimates for 2021 suggest that the prevalence of moderate or severe food insecurity has remained relatively unchanged compared with 2020, whereas severe food insecurity has increased, providing further evidence of a deteriorating situation mainly for those already facing serious hardships.

In 2021, an estimated 29.3% of the global population – 2.3 billion people – were moderately or severely food insecure, meaning they did not have access to adequate food. Although the number remained relatively stable between 2020 and 2021, more than 350 million more people were affected by moderate or severe food insecurity in 2021 compared to 2019, the year before the COVID-19 pandemic unfolded. Of those people affected by moderate or severe food insecurity, close to 40% of them were facing food insecurity at severe levels, indicating they had run out of food and, at worst, gone a day without eating. The global prevalence of severe food insecurity rose from 9.3 to 10.9% between 2019 and 2020 and to 11.7% in 2021. There is also a growing gender gap in food insecurity. Historically, women tend to be disproportionally affected by health and economic crises in a number of ways,
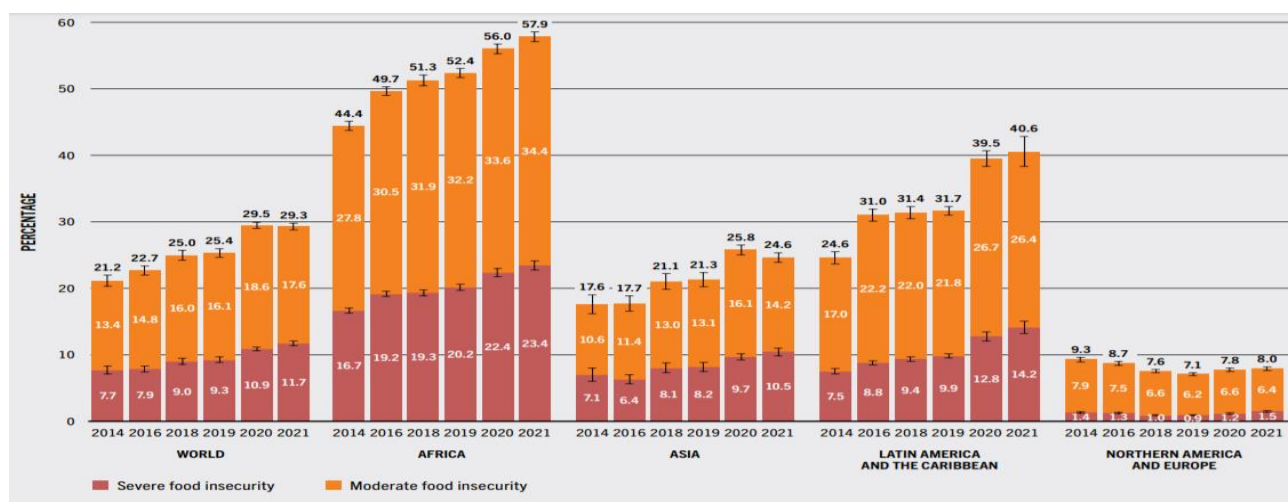
Figure 3 **The state regarding severe or moderate food insecurity at the global level** (Source*:* FAO)

An estimated 923.7 million people faced severe food insecurity in 2021 – 73.6 million more than in 2020 and 207 million more people compared to 2019. Figure 4 shows that, of a total of 2.3 billion suffering from food insecurity in 2021, half (1.15 billion) are in Asia; more than one-third (795 million) are in Africa; about 12% (268 million) live in Latin America and the Caribbean; and nearly 4% (89 million) are in Northern America and Europe.
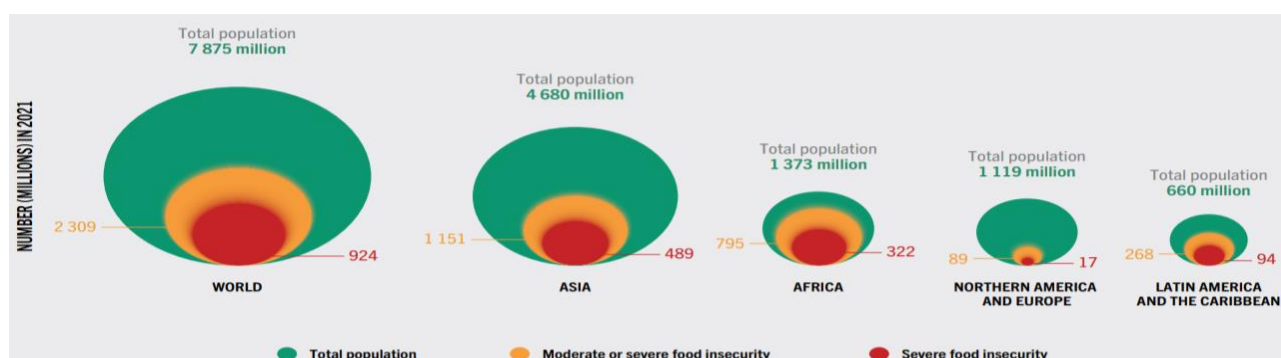

Figure 4 **The concentration and distribution of food insecurity by severity differs greatly across the regions of the world** (Source: FAO)

The figure also illustrates the difference across regions in the distribution of the population by food-insecurity severity level.

CONCLUSIONS

The intensification of the major drivers behind recent food insecurity and malnutrition trends (i.e. conflict, climate extremes and economic shocks) combined with the high cost of nutritious foods and growing inequalities will continue to challenge food security and nutrition. This will be the case until agrifood systems are transformed, become more resilient and are delivering lower cost nutritious foods and affordable healthy diets for all, sustainably and inclusively.

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