

United Nations  
High Level Political Forum on Sustainable Development, July 2020  
Preparatory process

**Session: Protecting the planet and building resilience**

*Pursuing policies, investments and innovation to address disaster risk reduction and protect the planet from degradation*

**Introduction**

The 2030 Agenda is rooted in the idea that human development and wellbeing cannot be achieved without simultaneously safeguarding and investing in nature and managing disaster risk in a systemic manner—otherwise development gains will be short lived and unequally distributed. Biodiversity loss, land and forest degradation, climate change, and disasters are threatening progress toward sustainable development. Actions to advance economic and social development need to address these threats and build resilience including through nature-based solutions, sustainable consumption and production practices and accounting for the true value of nature.

The past decade—in particular the COVID-19 crisis—has revealed the systemic nature of risk and the cascading impact of disasters across all three dimensions of sustainable development. The natural environment is humanity’s first line of defense against many hazards, and nature-based solutions must be scaled up to manage disaster risks, build resilience and leave no one behind. These issues are addressed directly in SDGs 12, 13, 14, and 15, but they are foundational to the entire 2030 Agenda, including poverty eradication, health, food security and inclusive economic growth and sustainable livelihoods. The current session will highlight opportunities and innovations that can build resilience and manage risk while securing livelihoods and safeguarding the planet.

**Guiding questions**

Please consider the 4 questions below and submit written responses totaling **2000 words or less**. (Though the average should be 500 words per question, it is fine to use more words on one question and fewer on another, to total 2000.) Please draw from your field of expertise and experience and be as concrete and tangible as possible. Please provide your responses in a Word document by **12 May** to [rambler@un.org](mailto:rambler@un.org).

**1. Systems transformation**

What are the fundamental systems transformations needed to halt nature degradation, reverse loss and manage risk, while eradicating poverty, ensuring food security for a growing population, securing livelihoods and promoting resilience?

Halting nature degradation and biodiversity loss, managing risk and building resilience, eradicating poverty and ensuring food and livelihoods security go hand in hand with transforming our food system into a more sustainable, resilient and inclusive one. Global food production is the single largest driver of environmental degradation and biodiversity loss. Agriculture uses large amounts of freshwater, accounts for 30% of GHG emissions and drives natural habitat conversion into croplands. The paradox is that our food systems are also the biggest victim. Today, we produce large quantities of food, but not enough diverse and nutritious food for all. The industrialization of food systems and globalization of trade and supply networks have decreased diversity in our markets, diets, on farm, and in the wild. More

simplified, homogenous diets increase risks of malnutrition and non-communicable diseases, the main cause of premature death today. Less biodiversity in food and agriculture leaves farmers with fewer options to deal with crop failure, pests and diseases, declining soil fertility and increasingly variable weather. This causes production losses, increasing food and livelihoods insecurity.<sup>1</sup>

The way we produce and consume our food is hurting both people and the planet. Reversing these trends is possible by increasing the use of agrobiodiversity in production and consumption. Agrobiodiversity - the wealth of plants, animals and microorganisms used for food and agriculture resulting from thousands of years of interactions among people and the environment - is crucial to fight malnutrition and diet-related diseases. A diverse diet increases the likelihood of consuming adequate amounts of the nutrients essential to human health. Together, ensuring caloric security and increasing dietary diversity would help avoid 11 million premature deaths per year.<sup>2</sup> Evidence shows that to secure healthy diets for all, we would need to increase fruit and vegetable production by 50-75% by 2030, legume bean and pulse consumption by 50%, and nut production by nearly 150%. These food groups are under-consumed almost everywhere, and depend on pollination services to ensure yield.

Securing dietary diversity also depends on maintaining natural habitat within agricultural landscapes. While we must spare half of the earth for conservation objectives, we must share agricultural landscapes with biodiversity for the core support it provides to food. In agricultural production, biodiversity supports long-term productivity, boosting yields in quality and quantity, increasing soil and water quality, and reducing the need for synthetic fertilizers. It also makes farmers' livelihoods more resilient, reducing yield losses due to climate change and pest damage. Agricultural biodiversity also keeps open options for unknown future needs, when conserved in genebanks and on farms.<sup>3</sup>

Bringing agrobiodiversity back to the plate to transform food systems will require working along the value chains, from farm to fork, and from fork to farm. This means working with governments, private sector, farmers and consumers, to make sure the world's food and agricultural biodiversity is sustainably used, conserved and consumed.

## **2. Specific actions to drive transformation**

Please describe 2-3 specific, promising actions at different levels that can drive these systems transformations. These actions could relate for instance to scaling up the use of nature-based solutions, sustainable consumption and production, or other approaches. How have these actions helped (or how *could* they help) break down siloes, support the systemic management of risk, and trigger positive changes in society? How can co-benefits between actions be maximized and the risk in trade-offs stemming from these actions (i.e. negative impacts on other aspects of the 2030 Agenda) managed?

A first step to transforming food systems is **improving efforts to safeguard, conserve and use what remains of the world's food and agricultural genetic diversity**, including different varieties, landraces and breeds, and wild relatives of crops and livestock.<sup>4</sup> This means: 1) ensuring enough funds are available to sustain genebanks at community, national and international levels; 2) building an enabling environment for conservation and use of agrobiodiversity at the country level, by supporting the implementation of the Convention on Biological Diversity and the International Treaty on Plant Genetic Resources for Food and Agriculture's multilateral system of access and benefit sharing;<sup>5</sup> 3) supporting the formulation of seed laws and incentives for growing more diverse, nutritious, resilient crops.

But it also means increasing conservation and use of agrobiodiversity on farm. Much of our food biodiversity is maintained by smallholder farmers - including indigenous peoples, women and local communities - often in highly diversified farming systems and landscapes, and using agro-ecological practices with limited external inputs of water and chemicals. Local varieties produced by smallholders often have higher nutritional values compared to staple crops and are well adapted to local climate and soil conditions, making them more resilient.

Yet, many local crops are neglected and underutilized because farmers are driven by market demand for more common high yielding crop varieties and do not have incentives to diversify their production.<sup>6</sup> Neglected crops are those grown mainly in their centres of origin by traditional farmers, and are therefore critical for the subsistence of local communities.<sup>7</sup> Underutilized crops are those falling into disuse for different reasons, including economic, institutional and cultural reasons.<sup>8</sup> Among these are: the low recognition of their value; a biased perception towards these foods as being “women’s food”, “food for the poor” or food to be consumed only when staple crops fail; and lack of institutional capacity to mainstream this diversity into national production and consumption patterns.<sup>9</sup>

The decline of these crops erodes the genetic base and prevents people from making use of their distinctive and valuable traits to improve agriculture and nutrition. Neglected grains such as quinoa or fonio, for example, have better protein quality than most major cereals. African bambara groundnut is rich in protein (24%). Quinoa, fonio and bambara also cope well with difficult climate conditions. These are just a few examples of neglected and underutilized crops good for people’s and planet’s health. All regions and food cultures have their own nutritious and culturally valued species that are currently neglected or underutilized, and that can be brought back to the plate to achieve food security, nutrition and resilience in agriculture.

This leads us to the second step: **increasing demand for more diverse and nutritious diets**. This can be achieved by increasing consumer awareness on the benefits of nutrient-rich and diverse diets for human and planetary health and by leveraging peoples' attachment to food cultures and traditions. Besides, we need to ensure that a diversity of nutritious, economically viable, and affordable species and varieties is available and effectively commercialized. This requires working with farmers to help them: 1) understand the benefits of agrobiodiversity for health, sustainability, productivity and resilience, and access incentives to grow this diversity; 2) receive training to incorporate these crops into their production systems using sustainable agricultural practices; 3) access quality seed material, through strengthened formal and informal seed systems.<sup>10</sup> A complementary strategy is working with governments to better link smallholders to public procurement programs to create additional market opportunities and demand for their products, improving their livelihoods and food security.

A third step is **increasing the adoption of nature-based solutions, by mainstreaming agrobiodiversity into agricultural, environmental and health policies and strategies as well as in dietary guidelines**. To this purpose, it is crucial to increase the evidence of the nutritional benefits of these crops and establish a sound nutritional database,<sup>11</sup> and to measure the availability of agrobiodiversity across markets, consumption and production systems, and in genetic resource conservation.<sup>12</sup> This information can be used to assess the nutritional, socioeconomic costs and benefits of this diversity, develop solutions for healthy diets and productive and resilient farms and landscapes with local and national stakeholders, design policies and promote investments, including market and non-market incentives for farmers and land managers to use and conserve a wider range of species and varieties.

Finally, **we need to recognize that we all have a role to play in transforming food systems towards more resilient, sustainable and inclusive ones**. From countries to companies to consumers, we can all contribute to reverse current trends by making more conscious food choices and by transforming the way we grow and consume our food.

### **3. Means of implementation and the global partnership for development (SDG 17):**

Achieving the 2030 Agenda relies on a combination of means of implementation to catalyse action and engagement, harness synergies and reduce tradeoffs. Please discuss the means of implementation, including finance, partnerships, and capacity building, needed to make the necessary transformations. How can science, technology and innovation (STI), including social innovation and local and indigenous knowledge, be mobilized to advance these transformations?

No-one will be able alone to transform food systems and win the fight against environmental degradation, food insecurity and biodiversity loss. The complexity and size of the global challenges that we are facing requires multi-sectoral partnerships that cut across the domains of research, development and policy-making, and that include different actors, such as country-level institutions, private sector, development agencies, international finance institutions, research organizations and farmers themselves.

Working with countries and in particular with national ministries of agriculture, forestry, health, and environment, social development and financial planning as well as with national research, extension and advisory services, will be crucial to ensure that research and development solutions for sustainable food systems respond to country needs, inform policy making, and to increase local capacity for innovation.

It will be also extremely important to work with private sector, both with small farmers to address their needs, make their business more sustainable, and harness the potential of their traditional knowledge, but also with large corporations, whose production and sourcing strategies can have a big impact on human and planetary health.

Addressing food systems' transformation and related challenges, including halting nature degradation, reversing biodiversity loss, managing risk and building resilience, eradicating poverty and ensuring food and livelihoods security will also require mobilizing extra resources to support research on trade-offs between food security, agriculture, biodiversity conservation and environmental health, as well as on applicable solutions tailored to country contexts and needs.

### **4. Covid-19 crisis**

What does the Covid-19 crisis reveal about the human-nature relationship and systemic risk creation? How can nature-based solutions contribute to a post-COVID-19 economic and social recovery that is more sustainable, equitable and resilient? What immediate and medium-term steps are needed to ensure that the post-COVID-19 economic and social recovery is sustainable, equitable and resilient. How can we redirect financial flows and direct recovery efforts to create better outcomes for people, prosperity and planet?

COVID-19 crisis has exposed the limitations of our current food system. On the production side, the pandemic has highlighted that over reliance on long and consolidated supply chains reduces the resilience of food systems to disruptions. Short supply chains are also suffering due to the closing of informal and open-air markets, where most people in the global South still obtain their food from. On the consumption side, poor dietary health has emerged as one of the most important risk variables impacting COVID mortality. The virus is disproportionately affecting individuals struggling with obesity, overweight, diabetes, and cardiovascular disease.

At the same time, the pandemic has opened up opportunities for a new food system paradigm that supports regional self-sufficiency and domestic agricultural production and sees community gardens and farmers' markets as essential services. Efforts should be directed at diversifying supply, moving away from the production of staples and empowering local market actors as well as reducing the distance between consumers and producers and the overreliance on globalized value chains.

The COVID crisis has also highlighted our interconnectedness with nature. In particular, it has overturned our anthropocentric view of humanity, which is only afforded the status of a guest on this planet. Many studies have highlighted that COVID originated in animals and crossed to humans probably as a result of reducing the natural barriers between ourselves and host animals. The continuous disruption of natural habitats and landscape changes may have reduced the buffer space between the human and animal world, contributing to the spread of the disease.

Efforts to curtail the COVID-19 pandemic have sent shockwaves across the globe. While the immediate measures to preserve human life and bring the health crisis under control have been wholly necessary, food systems disruptions will inevitably become more acute due to movement restrictions, which are likely to remain for months to come. Trade stall, food price volatility, and border closures mean that people will likely suffer from food shortages and lack of access to nutritious food – especially in countries already affected by climate change, land degradation, migration, and poverty. The number of hungry people, already at 800 million, could double due to the pandemic.

To ensure that the post-COVID-19 economic and social recovery is sustainable, equitable and resilient, we will have to adopt both short- and medium-term measures. Among the **immediate relief actions** are: helping countries meet short-term food security requirements; providing real-time information on COVID-19-driven shifts in food consumer behavior; and safeguarding global collections of seeds and germplasm, to ensure that suitable and improved materials are ready for deployment to farmers' fields across the globe.

Medium-term measures include **monitoring COVID-19 impact** on agricultural production and consumption, to assess the extent to which level food systems have been disrupted by the pandemic, and to deploy targeted policy recommendations and proposals to keep national food system supply chains open and thriving, even under conditions of global stress. A second measure is **shifting consumer and agricultural behavior toward increased domestic food production and consumption**. We also need to help countries avert further catastrophic hits on their food systems by **stress-testing promising quick-response options**. Finally, to flatten the COVID curve and decrease the risk of pandemics, we need to support healthy eating habits, producing a greater diversity of healthy foods, and making much greater investments in joint collaborations between public health, food and agriculture.

In the past two months, countries and donors' priorities have clearly shifted towards funding short-term relief measures such as cash transfers, food provision and other social protection instruments that can work as a quick fix to current food and livelihoods crises. However, sooner than later countries will need to start thinking about more durable solutions to restore food system functioning and prevent future disruptions. The role of research will be crucial to identify these solutions. Therefore, we will need to raise awareness among donors of the need to adopt a multi-step approach that not only tackles immediate food and livelihood needs of COVID-affected populations but also looks into funding innovations and research & development to build more sustainable, inclusive and resilient food systems.

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