Global Food Policy Report: IFPRI

For Prelims: Climate Change, International Food Policy Research Institute (IFPRI),

For Mains: Issue of Climate Change and Food Systems.

Why in News?

Recently, the International Food Policy Research Institute (IFPRI) has released **Global Food Policy Report: Climate Change & Food Systems**, showing India's risk for hunger could increase 23% by 2030 due to Climate Change.

What are the Findings?

- **India:**
  - India's food production could drop 16% and the number of those at risk for hunger could increase 23% by 2030 due to climate change.
    - Projections are part of a model that was used to evaluate the impact of climate change on aggregate food production, food consumption(kcal per person per day), net trade of major food commodity groups, and the population at risk of going hungry.
  - The number of Indians **at risk from hunger in 2030 is expected to be 73.9 million in 2030** and, if the effects of climate change were to be **factored in, it would increase to 90.6 million.**
  - The aggregate food production index would, under similar conditions, drop from 1.6 to 1.5.
    - Food production index covers food crops that are considered edible and that contain nutrients. Coffee and tea are excluded because, although edible, they have no nutritive value.
  - On a positive note, **climate change will not impact the average calorie consumption of Indians** and this is projected to remain roughly the same at 2,600 kcal per capita per day by 2030 even in a climate change scenario.
  - The average temperature across India is projected to rise by between 2.4°C and 4.4°C by 2100. Similarly, summer heat waves are projected to triple by 2100 in India.
- **Global:**
  - Baseline projections indicate that **global food production will grow by about 60% over 2010 levels by 2050** in the context of climate change.
  - Production and demand are projected to grow more rapidly in developing countries, particularly in Africa, than in developed countries, due to projected growth in population and incomes.
  - Diets are also shifting toward higher-value foods, including more fruits and vegetables, processed foods, and animal-source foods, outside of high-income countries.
  - Meat production is projected to double in South Asia and West and Central Africa by 2030 and triple by 2050.
  - Despite this growth, **per capita consumption levels in developing countries will remain less than half of those in developed countries**.

- The **demand for processed foods also shows up in the growing production of oil crops:** by 2050 production is expected to more than double in Southeast Asia and West and Central Africa.

How food production impacts climate change?

- Food system activities, including producing food, transporting it, and storing wasted food in landfills, produce Greenhouse Gas (GHG) Emissions that contribute to climate change.
- Of these sources, Livestock **production is the largest, accounting for an estimated 14.5 % of global GHG emissions** from human activities.
  - Meat from ruminant animals, such as cattle and goats, **are particularly emissions-intensive.**
- If global trends **in meat and dairy intake continue, our chances of staying below the 2° Celsius threshold will still be extremely slim.**
- This is why **urgent and dramatic reductions in meat and dairy consumption, alongside reductions in GHG emissions from energy use, transportation, and other sources, are crucial to avoiding catastrophic climate change.**
- The responsibility for eating lower on the food chain falls most heavily on countries like the U.S. with the highest per capita consumption of meat and dairy. Changing diets on an international scale will require more than just educating consumers – national policies will need to shift in ways that support more plant-centric diets.

What are the Recommendations of Global Food Policy Report?

- **Investment in Research and Development:**
  - There is a need for **more investment in research and development for "disruptive" technology innovations, such as in irrigation systems and the cold chain, which "could accelerate sustainable food systems transformation."**
  - **Public investment in such innovations should be doubled** from current levels, ensuring at least $15 billion goes toward food systems in low- and middle-income countries.
- **Management of Land and Water Resources:**
  - There must be **improved management of land and water resources.**
  - Policy should ensure **there are no "undesirable trade-offs" in development goals**, finding a balance between the additional energy required to increase productivity while not contributing further to fossil fuel emissions.
- **Healthy Diets and Sustainable Food Production:**
  - Healthy diets and sustainable food production **must also be prioritized.**
  - Reducing consumption of highly processed foods and red meats **will improve food's ecological footprint.**
- **Efficient Value Chain:**
  - Value chains need to be made more efficient and support "free and open" trade, which the report calls "an integral part of climate-smart agricultural and food policies."
- **Social Protection:**
  - Social protection **programs must guard poor rural populations,** which make their living from agriculture, against the worst effects of climate change.
  - These **programs are "another way to deal with the more uncertain future** that we expect.
- **Financing Sustainable Production:**
  - The report stresses the importance of adequately financing a shift to more sustainable production and consumption while increasing livelihoods.

What is International Food Policy Research Institute?

- Established in 1975, IFPRI provides **research-based policy solutions to sustainably reduce poverty and end hunger and malnutrition in developing countries.**
- IFPRI's vision **is a world free of hunger and malnutrition**.
- It focuses on **five strategic research areas:**

- Fostering Climate-Resilient and Sustainable Food Supply.
- Promoting Healthy Diets and Nutrition for All.
- Building Inclusive and Efficient Markets, Trade Systems, and Food Industry.
- Transforming Agricultural and Rural Economies.
- Strengthening Institutions and Governance.

UPSC Civil Services Examination, Previous Year's Question (PYQs)

Q. Which of the following is/are the indicator/indicators used by IFPRI to compute the Global Hunger Index Report? (2016)

1. Undernourishment
2. Child stunting
3. Child mortality

Select the correct answer using the code given below:

(a) 1 only

(c) 1, 2 and 3

(b) 2 and 3 only

(d) 1 and 3 only

Ans: (c)
Explanation:

- International Food Policy Research Institute (IFPRI) was established in 1975 which provides researchbased policy solutions to sustainably reduce poverty and end hunger and malnutrition in developing countries.
- Global Hunger Index (GHI) is a tool designed to comprehensively measure and track hunger at global, regional, and national levels. GHI scores are calculated each year to assess progress and setbacks in combating hunger.
- Dimensions of GHI
  - Inadequate food supply
  - Child mortality
  - Child under-nutrition
- Indicators of GHI
  - Undernourishment (inadequate food supply); Hence, 1 is correct.
  - Under 5 mortality rate (child mortality) ; hence, 3 is correct.
  - Wasting;
  - Stunting (child under-nutrition); hence, 2 is correct.
  - Therefore, option (c) is the correct answer.

Source: TH