

**1. Overemphasis on achieving high economic growth can often ignore the need for equity and lead to disparities. Elucidate.**

उच्च आर्थिक विकास प्राप्त करने पर जोर देने से अक्सर समानता की आवश्यकता की अनदेखी हो सकती है। स्पष्ट करें।

**Demand of the question:**

It expects students to write about the debate between growth and redistribution along with effects of overemphasis on high economic growth and need to account measures to reduce inequality and disparities.

**Introduction:**

Economic growth has raised living standards around the world, but modern economies have lost sight of the fact that the standard metric of economic growth, gross domestic product (GDP), merely measures the size of a nation's economy and doesn't reflect a nation's welfare. Yet policymakers and economists often treat GDP as an all-encompassing unit to signify a nation's development, combining its economic prosperity and societal well-being.

**Body:**

The debate between growth and equity and redistribution is one of the oldest in economic development. The common citizens of any country care more about the real impact of growth in terms of improvement in their standard of living, provision of basic facilities such as electricity, drinking water, healthcare systems etc.

Focusing exclusively on GDP and economic gain to measure development ignores the negative effects of economic growth on society, such as climate change and income inequality. It's time to acknowledge the limitations of GDP and expand our measure development so that it takes into account a society's quality of life.

Fallacy of GDP growth as indicator national progress:

- Ineffective trickle down of benefits earned from economic growth. There is increasing disconnect between economic growth and social development. As per popular development economist Jean Dreze, India's high economic growth has failed to bring about any significant improvement in the quality of life of the common people.
- GDP cannot differentiate between an unequal and an egalitarian society if they have similar economic sizes. As rising inequality is resulting in a rise in societal discontentment and increased polarization.
- Despite the high growth rates in India, almost half of the children younger than 5 years are stunted due to improper nutrition and sanitation. As of 2018, more than 163 million Indians do not have access to safe drinking water. Over the decade ending 2011, water availability reduced by 15% and it is estimated that

India will become water-scarce by 2050. As per the Tendulkar methodology, 22% of Indians live on less than \$1.25 a day.

- Economic growth of lower strata should be faster than the affluent class; however India has experienced one of the highest rates of growth of inequality. As per OXFAM survey India's richest 1% holds four times of the wealth held by 70% of bottom population which is around 1 billion. Certainly in GDP growth fails to account pie of growth of shared by different sections of society which makes it ineffective indication of national progress.

Though, it is necessary to generate wealth in the first place to redistribute it, however overemphasis on high growth rate may create huge inequality and disparity.

- Labour reforms: Time of the crisis is often used by rulers as opportunity to push unpopular policy decisions in democratic countries. Recent labour reforms pushed by UP, MP may create inequality faster than growth. It reduces the bargaining power of labour via different conditions like contract labour, ability to hire and fire, relaxation on working hours, lesser inspection from government officials for working conditions ultimately making lives of unskilled and lower skilled population worse for high economic growth for so called stress on cheap labour as ease of doing business indicator.
- Regressive tax system: Where rich pay lower taxes as compared to poor. Increased efficiency of indirect taxes with the coming of GST which is burdened by larger base rather than stress on improving direct tax efficiency. Higher proportion of indirect taxes in overall tax collection, absence of wealth tax or inheritance tax indicates regressive taxation.
- Lack of universal education and Health: Lack of universal free college education makes it impossible to generate equal opportunity for students from poorer section to achieve high skill set in new technologically advanced economic models and journey towards industrial revolution 4.0. Out of pocket expenditure on health is one of the major reasons for chronic poverty in India, despite of which high economic growth has failed to improve health infrastructure or provide universal healthcare.
- Financial sector reforms: Privatisation, increased focus on fiscal consolidation, more scrutiny of loans for lower sections like farmers, labourers. Financial sector reforms often designed in way to squeeze cash from lower section to higher level of pyramid.

Overemphasis on GDP growth ignore account of inequality,

- India's National Indicator Framework Baseline Report, 2015-16 for measuring progress towards Sustainable Development Goals shows India has not developed most of the indicators required to measure and mitigate inequality.
- The National Indicator Framework Baseline Report reveals that India does not have data to measure growth rates of household expenditure per capita among the bottom 40% of the population or the total population.
- The government of India has no data on the proportion of people living below 50% of median household expenditure. The report further reveals that no

national indicator has yet been developed to ensure equal opportunity and reduce inequalities of outcome.

India need alternative metrics to complement GDP in order to get a more comprehensive view of development and ensure informed policy making that doesn't exclusively prioritize economic growth. Bhutan's attempt to measure Gross National Happiness, which considers factors like equitable socio-economic development and good governance, and UNDP's Human Development Index (HDI), which encapsulates health and knowledge apart from economic prosperity.

As a step in this direction, India is also beginning to focus on the ease of living of its citizens. Ease of living is the next step in the development strategy for India, following the push towards ease of doing business that the country has achieved over the last few years.

### **Conclusion:**

Covid-19 pandemic has brought in sharp focus the extent of income inequality, especially in poor countries like India. The economic philosophy of "growing the pie" followed by successive Indian governments has turned India into a 1% economy. Moving away from GDP numbers and collecting and publishing data on the income, wealth and wages, by decile and centile, will be the first step towards creating a model of equitable growth. The end goal should be more just and equitable society that is economically thriving and offering citizens a meaningful quality of life.

### **2. Reforms in the agricultural sector are an important prerequisite for ensuring inclusive growth. Discuss.**

**समावेशी विकास सुनिश्चित करने के लिए कृषि क्षेत्र में सुधार एक महत्वपूर्ण कदम है। चर्चा करें।**

### **Demand of the question:**

It expects students to write about the need of reforms in the agricultural sector as an important prerequisite for ensuring inclusive growth.

### **Introduction:**

The central government recently introduced major agricultural market reforms. It will allow farmers to sell their produce outside mandies on platforms of e-trading, lifting restrictions on key commodities such as cereals, pulses, onion and potato and freedom to enter into agreement with private players.

### **Body:**

Inclusive growth is economic growth that is distributed fairly across the society and creates opportunities for all, as per OECD report.



- Agriculture in India is largest private profession and largest informal labour market; reforms in such huge sector will certainly benefit large sections of society and recent measures of quantum jump through ordinances are right steps in that direction.
- Reforms were brought through three ordinances: The Essential Commodities (Amendment) Ordinance 2020, The Farming Produce Trade and Commerce (Promotion and Facilitation) Ordinance, 2020, and The Farmers (Empowerment and Protection) Agreement on Price Assurance and Farm Services Ordinance, 2020.

#### Need of reforms in agriculture sector:

- At the time of independence, the share of agriculture in total GDP was more than 55 per cent and about 70 per cent of the population was dependent on the agriculture sector for their livelihood.
- In the post independence era, stagnant production, low productivity, traditional technology, and poor rural infrastructure were the major challenges for the Government.
- According to the agriculture census 2015-16, the real income of farmers doubled in almost 20 years from 1993-94 to 2015-16. As the target to double farmers' income by 2022 is nearing, reforms on land, market, price, and to ameliorate supply side constraints were necessary.
- Almost 44 per cent of the country's labour force is engaged in agriculture. The average annual growth rate in real terms in agriculture as well as its allied sectors has remained static in the last six years, in turn impacting farmer's income, as per the Economic Survey 2019-20.
- The annual growth rate in real terms in agriculture and its allied sectors was 2.88 per cent from 2014-15 to 2018-19, according to the Survey. The estimated growth rate in 2019-20 is 2.9 per cent. Economic Survey Report 2020 also emphasised the importance of sustainable agricultural practices to support small and marginal farmers, who constitute 87 per cent of India's peasants.
- National Sample Survey Office (NSSO) data shows that more than one-fifth of rural households with self-employment in agriculture have income less than the poverty line.
- Agriculture labour productivity in terms of gross value added (GVA) in India is less than a third of that in China and 1% of that in the US. Rural sector is net importer vis-e-vis urban areas which indicate outward flow of money.
- Women in agriculture are affected by issues of recognition and in the absence of land rights, female agricultural labourers, farm widows, and tenant farmers are left bereft of recognition as farmers, and the consequent entitlements. According to Oxfam (2013), around 80 per cent of farm work is undertaken by women in India. However, they own only 13 per cent of the land. Women constitute over 42 per cent of the agricultural labour force in India, but own less than two per cent of farmland.
- According to the Food and Agricultural Organization (FAO, 2011), empowering women through land and ownership rights has the potential of raising total

agricultural output in developing countries by 2.5 to 4 per cent and can reduce hunger across the world by 12-17 per cent.

- According to the National Crime Records Bureau, farmer protests increased from 628 in 2014 to 4,837 in 2016, making evident the disenchanted and displaced agricultural workforce of the country.

Inclusive growth through reforms:

- Livestock wealth is much more equitably distributed than wealth associated with land. Livestock producers, including traditional pastoralists and smallholders, are both victims of natural resource degradation and contributors to it. Livestock rearing is a key livelihood and risk mitigation strategy for small and marginal farmers, particularly across the rain-fed regions of India.
- Livestock rearing at the household level is largely a women-led activity, and therefore income from livestock rearing and decisions related to management of livestock within the household are primarily taken by women.
- Need to Increase focus on reforms with national mission on sustainable agriculture.
- There are some emerging land issues such as increase in demand for land for non-agricultural purposes including special economic zones, displacement of farmers, tribals and others due to development projects. There is a need for careful land acquisition. Land alienation is a serious problem in tribal areas.
- Agriculture reforms and Greening rural development will contribute to inclusive growth by enabling the target growth rate of agriculture of 4 per cent, which is important due to agriculture's multiplier effects and due to the continued dependence of 58 percent of India's rural population for livelihoods on agriculture, regenerating common land and water bodies, which offer sustenance to the rural poor through provisioning of goods and ecosystem services, 'crowding in' private investment in green businesses: renewable energy generation, organic input chains and advisory services, green product supply chains, production of environment-friendly construction materials.
- As reiterated in the past, the Agricultural Developmental Council (ADC) in line with the GST Council is a dire need to make agricultural reforms more expressive and representative. For better income distribution, there is also a need to revisit regional crop planning and the agro-climatic zone model at the highest possible level so as to make agriculture the engine of sustainable economic growth in India 2.0 by 2022.

However, on positive side during the first year (2019-20) of the second term of government, gross value added (GVA) in agriculture and allied sectors registered a growth of 4 per cent. This is commendable, especially when juxtaposed with the growth of overall GVA of the economy at 3.9 per cent, and overall GDP (including net taxes) at 4.2 per cent.

**Conclusion:**

Despite of impact of COVID-19 is on full display in current financial year 2020-21, and when the GDP may register a negative growth of as high as -5 per cent, agriculture may still surprise with a positive growth of 2.5 per cent, as per CRISIL's recent forecast. Path of economic recovery goes through the agricultural sector and reforms in such time will have multiplier effect.

**3. Indian space start ups have got huge potential. However, there are many challenges that need to be overcome to get into the league of global space giants like the SpaceX. Comment.**

**भारतीय अंतरिक्ष स्टार्टअप में बड़ी संभावनाएं हैं। हालाँकि, ऐसी कई चुनौतियाँ हैं, जिन्हें SpaceX जैसी वैश्विक अंतरिक्ष दिग्गजों की लीग में लाने के लिए दूर करने की आवश्यकता है। टिप्पणी करें।**

**Demand of the question:**

It expects students to write about the potential of Indian space start ups along with the challenges being faced by space start ups in reaching global league of giants like SpaceX.

**Introduction:**

The recent announcement by Finance Minister in the fourth tranche of the 20 Lakh crore 'Atma Nirbhar Bharat Special Economic Stimulus Package' (ANBSESP) for greater participation of the private enterprise in the space sector is very promising. It will help to realise potential of space start ups in India.

**Body:**

Promises of Government include:

- Govt will provide predictable policy and regulatory environment, and allow private sector to use ISRO facilities.
- Future projects for travel in outer space or exploration of new planets will be open to the private sector.
- Govt will ease geo-spatial data policy to make such remote-sensing data more widely available to tech entrepreneurs, with safeguards put in place.

Potential of Indian space start ups:

- India makes a great place for building a space business as a start-up. It has experienced space professionals who have been nurtured in an ecosystem that has 60 years of space mission experiences.
- Bengaluru-based Pixxel is gearing up to launch its first satellite by the end of the year. The small satellite will go in a Russian launch vehicle and will focus on high clarity satellite imagery. It would be helpful for governments and private organisations in collecting AI-powered analytical data related to agriculture, climate, spread of crop pests and diseases, defence monitoring,



and mining in order to find illegal operations, monitor oil and gas pipelines, natural disasters, forest fire etc.

- Astrome, another Bangalore based space-tech start up which has plans to launch a constellation of 198 Low Earth Orbit (LEO) satellites and Mumbai-based space-tech start-up Kawa Space are among the few Indian companies in this space.
- India has the entrepreneurial spirit, with perhaps one of the youngest sets of founders among space start-up hubs around the world. It has established a small and medium enterprises landscape that can cater to the manufacturing and testing of satellites and rockets. It has academic institutions that produce globally-matched human resources, which can be employed by the emerging start-ups in the space industry.
- The growth of Indian space start-ups in the last few years has fuelled entrepreneurial activity and innovation in satellites and Space Launch Vehicles (SLVs).
- Technology transfer by ISRO: In one of its latest transfers, the space agency has transferred Lithium ion-cells to a handful of state and private enterprises. Although start-ups do not figure in the list of beneficiaries, but private players have been integral to the supply chain and sub-contractual work for the Indian space programme.
- Space start-ups are already in the process of contributing to India's first human spaceflight mission – the Gaganyaan -1. Space start-ups have more drive and ambition than the bigger enterprises that tend to do overwhelmingly sub-contractual work on behalf of ISRO. Endowed with young technically qualified personnel and possessing initiatives of their own which are distinct, niche and disruptive, the start-up segment in the space sector can be at the cutting edge. Several start-ups have some working capital.
- Latest data available between 2016 and 2019 does indicate indicates that venture capital has enabled space unicorns which are involved in developing palm-sized satellites to Small Satellite Launch Vehicles (SSLVs) are gaining a toehold.

Challenges to reach global league:

- Government was pursuing extensive consultations on the passage of the Space Activities Bill since at least 2017, but the Bill is yet to become law. This is largely due to the complexities involving space science and technology, which is a strategic sector, any ensuing legislation will need to be clear and enforceable in a manner that encourages private initiative, investment, management and technological input.
- It is still not clear how start-ups/private companies in India can get access to space frequencies to conduct routine telemetry, telecommand and payload data operations.
- India does have a satellite communication policy, but it was instituted with a Direct-To-Home (DTH) service provider in mind, rather than companies that would want other services (e.g. remote sensing).

- This creates uncertainty for the start-ups that plan to operate their own satellites. Friendly geographies outside India allows them to operate and collect their data over India or other areas of interest without having to go through the hassle of dealing with uncertainty in bureaucratic processes.
- A foreign company that wants to launch onboard the Polar Satellite Launch Vehicle (PSLV), which is often touted as one of the most cost-effective and reliable launch vehicles in the world, pay 0% Goods and Services Tax (GST). In contrast, an Indian space start-up has to cough up 18 per cent GST to launch from India.

To reach league of giants like SpaceX:

- There is need to bring clarity on the basis of US Federal Communications Commission (FCC), which provides the guidelines for private companies that either want to set up ground station facilities or access frequencies to operate their space assets.
- To incentivise product/service development, several space faring nations provide support programmes to help entrepreneurs develop their ideas. For example, the European Space Agency (ESA) has several programmes such as the Business Incubation Centres (BICs), which incubate over 100 space start-ups every year.
- In US, there are also several funding instruments for start-ups and small/medium-scale enterprises that allow competent companies to develop state of the art intellectual property that forms the basis of novel products/services.
- In contrast, there are no programmes or instruments that provide such support to entrepreneurs who want to create new space products/services in India. With the US still imposing some rules that restrict several grants/programmes to citizens, several Indian founders have now started leveraging the ESA start-up programmes to realise their ideas.

Business incubation centre for new space start-ups in India on the lines of European space Agency will help to realise of potential to reach big club of private players in space field.

### **Conclusion:**

Although, recent steps liberating the space sector from over-regulation or governmental control is a positive step bringing gains to the space start-up segment, more clarity will be necessary particularly in the form of a comprehensive Space Activities Law spelling out the provisions ranging from licensing and Intellectual Property Rights (IPR) covering start-ups and customers such as the Indian armed forces.