

REPORTS

- **❖** World's population touches 8 billion: How India is placed
- ❖ CONTEXT: The human population touched 8 billion recently on November 15 2022, a milestone that heralds both opportunities and challenges especially for India, which is set to become the world's most populous country next year by surpassing China.
- While the United Nations hailed the 8-billion figure as "a testament to humanity's achievements", it also sounded a note of caution.
- According to United Nations Population Fund (UNFPA) "The growth of population is a testament to humanity's achievements, including reductions in poverty and gender inequality, advancements in health care, and expanded access to education. These have resulted in more women surviving childbirth, more children surviving their early years, and longer, healthier lifespans, decade after decade.
- However, rapid population growth can make challenges of hunger and poverty steeper. "Rapid population growth makes eradicating poverty, combating hunger and malnutrition, and increasing the coverage of health and education systems more difficult.

> Unequal distribution

- According to the UN population report the global population is growing at its slowest rate since 1950, having fallen under 1 per cent in 2020.
- The world's population could grow to around 8.5 billion in 2030 and 9.7 billion in 2050. It is projected to reach a peak of around 10.4 billion people during the 2080s and to remain at that level until 2100.
- More than half of the projected increase in the global population up to 2050 will be concentrated in eight countries: the Democratic Republic of the Congo, Egypt, Ethiopia, India, Nigeria, Pakistan, the Philippines and the United Republic of Tanzania.
- Countries of sub-Saharan Africa are expected to contribute more than half of the increase anticipated through 2050.

➤ How India is placed

- India is projected to overtake China as the world's most populous country in 2023, "with prospects to reap the demographic dividend as the median age of an Indian this year was 28.7 years, compared to 38.4 for China and 48.6 for Japan against a global value of 30.3 years.
- India's population stands at 1.412 billion in 2022, compared to China's 1.426 billion. India is projected to have a population of 1.668 billion in 2050, way ahead of China's 1.317 billion people by the middle of the century.
- According to UNFPA estimates, 68 per cent of India's population is between 15-64 years old in 2022, while people aged 65 and above comprise seven per cent of the population.
- As per UN estimates, over 27 per cent of the country's population is between the ages of 15-29. At 253 million, India is also home to the world's largest adolescent population (10-19 years).
- UNFPA has noted that India has its largest ever adolescent and youth population.
- According to UNFPA projections, India will continue to have one of the youngest populations in the world till 2030 and is currently experiencing a demographic window of opportunity, a "youth bulge" that will last till 2025.

Stabilising population Fertility rates in 2019-21 across States/U.T.s in India Fertility rates States and U.T.s >2.1 Bihar, Meghalaya, U.P., Jharkhand, Manipur M.P., Rajasthan, Assam, Gujarat, Haryana, <=2.1 and >1.7 Mizoram, Uttarakhand, Arunachal, Chhattisgarh, D&N Haveli, Kerala, Odisha, Telangana, T.N. Andhra, H.P., Karnataka, Maharashtra, Naga-<=1.7 and >1.4 land, Tripura, Delhi, Punjab, W.B., Puducherry <=1.4 Chandigarh, J&K, Lakshadweep, A&N Islands, Goa, Ladakh, Sikkim

> How China is placed

- China, which is weighed down by a rapidly increasing ageing population, is projected to enter a "severe ageing" phase in 2035 with 400 million people above 60 years. This can be blamed mainly on its decades of one-child policy.
- China's elderly population reached 267 million last year, accounting for 18.9 per cent.
- It is estimated that the elderly population will top 300 million by 2025 and 400 million by 2035.



- The size of China's senior population and its proportion of the total population is expected to peak around 2050, posing huge challenges to the provision of public services and to the national social security system.
- On the one hand, China is rapidly ageing, and on the other, its population is in decline due to falling birth rates. This is raising concerns over the future availability of a labour force, the main driver of the country's economic growth.
- China's population grew by less than half a million-last year to 1.4126 billion as the birth rates fell for the fifth consecutive year.
- Since 2021, China has allowed couples to have three children and even announced incentives for people to have more children.

❖ Is climate change affecting global health?

- ❖ CONTEXT: Even as countries are meeting at the ongoing Climate Change Conference (COP27) in Egypt, a recent report by Lancet, has traced in detail the intimate link between changing weather events and their impact on the health of people.
- The 2022 Lancet Countdown on Health and Climate Change: Health at the Mercy of Fossil Fuels points out that the world's reliance on fossil fuels increases the risk of disease, food insecurity and other illnesses related to heat.

> What does the report outline?

- The 2022 Lancet Countdown report comes at a time when the world is face-to-face with the threat of climate change.
- According to the World Health Organization (WHO), climate change affects the social and environmental determinants of health clean air, safe drinking water, sufficient food and secure shelter.
- The Lancet report indicates that rapidly increasing temperatures exposed people, especially vulnerable populations (adults above 65 years old and children younger than one) to 3.7 billion more heatwave days in 2021 than annually in 1986–2005.

➤ How is it leading to rise in infectious diseases?

- The changing climate is affecting the spread of infectious disease, raising the risk of emerging diseases and co-epidemics. For instance, it records that coastal waters are becoming more suited for the transmission of Vibrio pathogens. It also says that the number of months suitable for malaria transmission has increased in the highland areas of the Americas and Africa.
- The WHO has predicted that between 2030 and 2050, climate change is expected to cause approximately 2,50,000 additional deaths per year, from malnutrition, malaria, diarrhoea and heat stress.

What about food security?

- Every dimension of food security is being affected by climate change.
- Higher temperatures threaten crop yields directly, with the growth season shortening for many cereal crops.
- Extreme weather events disrupt supply chains, thereby undermining food availability, access, stability, and utilisation.
- The prevalence of undernourishment increased during the COVID-19 pandemic, and up to 161 million more people faced hunger in 2020 than in 2019.
- This situation is now worsened by Russia's invasion of Ukraine.

➤ Is the world dependent on fossil fuel?

- The war has led many countries to search for alternative fuels to Russian oil and gas, and some of them are still turning back to traditional thermal energy.
- The report argues that even if implemented as a temporary transition, the renewed clamour for coal could reverse whatever gains have been made in air quality improvement and push the world towards a future of accelerated climate change that would threaten human survival. Instead, a transition to clean energy forms would undeniably be the sustainable way ahead.

> Are there any solutions?

- A health-centred response to the coexisting climate, energy, and cost-of-living crises provides an opportunity to deliver a healthy, low-carbon future. This is the way a health-centred response would work it would reduce the likelihood of the most catastrophic climate change impacts, while improving energy security and creating an opportunity for economic recovery.
- Improvements in air quality will help prevent deaths resulting from exposure to fossil fuel-derived ambient PM2.5, and the stress on low-carbon travel and increase in urban spaces would result in promoting physical activity which would have an impact on physical and mental health.
- Transition to balanced and more plant-based diets, as that would help reduce emissions from red meat and milk production, and prevent diet-related deaths, besides substantially reducing the risk of zoonotic diseases. This sort of health-focused shifts would reduce the burden of communicable and non-communicable diseases, reducing the strain on health-care providers, and leading to more robust health systems.



- These incrementals notwithstanding, it is true that data shows that the pace and scale of climate change adaptation, planning, and resilience is insufficient. In this context, the report calls for global coordination, funding, transparency, and cooperation between governments, communities, civil society, businesses, and public health leaders, to reduce or prevent the vulnerabilities that the world is otherwise exposed to.
- World Bank report on India's cities
- CONTEXT: According to the World Bank, India would need to invest \$840 billion over the next 15 years, that is, an average of \$55 billion each year, to meet the demands of its fast-growing urban population. Its latest report, titled 'Financing India's Urban Infrastructure Needs: Constraints to Commercial Financing and Prospects for Policy Action', puts forth the urgent requirement to leverage greater private and commercial investments to meet the emerging financial gaps.
- Who provides finances to build cities?
- Financing on a repayable basis can be done either through debt, private lending or public-private partnership investments. These require a recurrent source of revenue to meet obligations, thus, mandating raising adequate resources.
- Much of the urban infrastructure in India is financed by tied intergovernmental fiscal transfers, that is, vertical and horizontal transfer of finance for attaining certain objectives sub-nationally.
- Of the finances needed to fund capital expenditures for Indian cities, 48% is derived from State governments, 24% from the Central government and 15% from urban local bodies' own surplus. The rest includes public-private partnership (3%), commercial debt (2%) and loans from Housing and Urban Development Corporation, or HUDCO (8%).
- As for private debt, the World Bank observed, that only a handful of large cities have accessed institutional banks and/or loans. In fact, the volume of commercial debt financing might not be an accurate indicator, for States might accord loans to their entities via their self-regulated financial institutions at concessional terms.
- For example, Tamil Nadu Urban Development Fund and Tamil Nadu Urban Finance and Infrastructure Development Company provide loans on concessional terms.
- What are some of the constraints?
- The report argues that the overall funding base to raise commercial revenues "appears to be low" owing to weak fiscal performance of cities and low absorptive capacity for execution of projects.
- The global financial institution has argued that low service charges for municipal services undermine financial sustainability and viability. It goes to the extent that urban bodies are unable to recover operations and maintenance costs, thus, constraining their ability to further execute projects.
- The report states that city agencies have been unable to expand their resource and funding base to support private financing for services such as water supply, sewerage networks and bus services, as they are highly subsidised. These are sourced from either their general revenues, own-source revenues (such as house tax, professional tax, property tax among others) or fiscal transfers.
- According to the report, as for private-public partnerships is concerned, revenue sharing designs between the two entities is not particularly viable for private investors and does not fully account for risk-sharing or risk-transfer mechanisms for project risks. Thus, problems arise during unanticipated demand shocks alongside legal and technical challenges that require restructuring to an entire public ownership.
- Does the report propose solutions?
- The central idea is to increase cities' fiscal base and creditworthiness.
- For improving their fiscal base, it states, cities must institute a buoyant revenue base and be able to recover the cost of providing its services and it could be attained by revising property taxes, user fees and service charges, among other streams, from the current low base.

PRELIMS

- Vostro accounts
- * CONTEXT: Recently, the government announced that nine special Vostro accounts have been opened with two Indian banks after permission from the RBI to facilitate trade in rupee in the wake of sanctions on Russia by the US and European countries.
- **▶** What is a Vostro account?
- A Vostro account is an account that a domestic bank holds for a foreign bank in the domestic bank's currency — which, in the case of India, is the rupee. The RBI allowed nine such accounts, including IndusInd Bank and Uco Bank.
- In the case of trade with Russia, payments in rupee for the export and import of goods will go to these Vostro accounts. The owners and beneficiaries of this money will be the exporters and importers in both the countries. The banks will keep the record of money transferred.



What is a Nostro account?

- Two kinds of accounts, Vostro and Nostro, are often mentioned together. Both Vostro and Nostro are technically the same type of account, with the difference being who opens the account and where.
- If an Indian bank like the SBI wants to open an account in the United States, it will get in touch with a bank in the US, which will open a Nostro account and accept payments for SBI in dollars.
- The account opened by the Indian bank in the US will be a Nostro account for the Indian bank, while for the US bank, the account will be considered a Vostro account.
- Nostro means 'ours' and Vostro means 'yours' in Latin. Therefore, the accounts opened by IndusInd and UCO are Vostro, and the ones opened by Russia's Sberbank and VTB Bank are Nostro accounts.

What led to creation of the Vostro accounts?

- On July 11 2022, the RBI put in place a mechanism to settle international trade in rupees "in order to promote growth of global trade with emphasis on exports from India and to support the increasing interest of the global trading community in the rupee".
- The central bank's move has come in the wake of increasing pressure on the Indian currency in the wake of Russia's invasion of Ukraine and sanctions by the US and the EU.
- According to the central bank, AD (authorised dealer) banks in India have been permitted to open rupee Vostro accounts. Accordingly, for settlement of trade transactions with any country, an AD bank in India may open special rupee Vostro accounts of correspondent banks of the partner trading country.

'No Money for Terror' forum 2022

- ❖ CONTEXT: The Ministry of Home Affairs will be organising the Third Ministerial 'No Money for Terror' Conference on 18th and 19th of November and to discuss crowed funding of terrorism
- The Ministerial No Money for Terror (NMFT) Conference aims to create platform for international discussions on countering terror financing.
- The "No Money For Terror" conference is organised by Financial Intelligence Units (FIUs) of over 100 countries, jointly called The Egmont Group.
- Recognising the importance of international cooperation in the fight against money laundering and financing of terrorism, a group of FIUs met a few years ago at the Egmont Arenberg Palace in Brussels, Belgium, and decided to establish an informal network of FIUs for the stimulation of international cooperation.
- The Egmont Group was created to provide FIUs around the world a forum to exchange information confidentially to combat money-laundering, the financing of terrorism and other predicate offences.
- The conference includes discussions on technical, legal, regulatory and cooperative aspects of the terrorism financing.

 It aims to set pace for other high-level official and political discussions focusing on terror finance.
- The inaugural edition of this conference was held in Paris, France, in 2018. The second edition of the NMFT took place in Melbourne, Australia, in 2019.
- The third edition was set to take place in India in 2020 but was postponed because of COVID-19 pandemic that caused the global-level restrictions on travel.

What are the focus areas of the 3rd NMFT conference:

- Discussions at the 3rd NMFT conference will focus on global trends of terrorism and terrorist financing, emerging technologies' role in terrorism financing and importance of global cooperation to address related challenges.
- The meeting will seek global cooperation in addressing the challenges in countering terror funding obtained via formal and informal channels.
- It will focus on the role of cryptocurrency in funding terrorist activities. It will deliberate on the concerns related to the decentralized nature and the lack of regulation of cryptocurrencies.
- The focus will also be given to dark web's role in promoting transfer or crowdsourcing of funds for terrorism.
- It also aims to strengthen the role of Financial Action Task Force (FATF) in setting global standards that can create an effective mechanism to combat terror funding.

3. 3D printed accommodation for troops in Eastern Ladakh

CONTEXT: Troops In eastern Ladakh get 3D printed habitat

- The permanent defences are able to withstand blasts, can be erected within 36-48 hours and relocated from one place to another.
- 3D-printed permanent defences have been constructed for the first time by Indian Army's Corps of Engineers in the desert sector.
- Permanent defences includes static fortified bunkers, observation posts, forward munition depots among others.



- These defences were trial tested against a range of weapons from small arms to the main gun of T90 tank. These 3D-printed permanent defences can withstand a direct fire by a T-90 tank from about 100 metres
- 3D printing technology uses complex software and robotic unit that helps in creating a structure through multiple stages from a digital model.

ANSWER WRITTING

Q. Reforming the government delivery system through the Direct Benefit Transfer Scheme is a progressive step, but it has its limitations too. Comment.

Aiming greater transparency and accountability, the Government under its welfare programs has introduced the direct benefit transfer scheme. In 2011, Nandan Nilekani committee recommended the DBT scheme concept. Under DBT, transferring subsidies directly into the accounts of beneficiaries can minimize the duplication frauds and leakages. Some examples of DBT scheme are PM KISAN YOJANA, M GNREGA Scheme, PAHAL YOJANA etc.

In the field of Government delivery system, DBT is a progressive step in many ways such as-

- It prevents duplication fraud of beneficiaries.
- It provides targeted delivery and reduces the delay time of payments.
- DBT wipes out intermediaries or middleman culture. It reduces the window for corruption and exploitation of poor beneficiaries.
- It includes the faster flow of targeted funds and services. By this way, it fulfils the positive aspirations
 of citizen charter.

There is no doubt that DBT is a positive milestone in the government delivery system but it has some limitations which need to be addressed. Some of limitations are as follows-

- Many beneficiaries are excluded due to not having access to banking services.
- Due to lack of financial literacy among the masses, DBT cannot achieve its true potential.
- Aadhaar card data and biometric data mismatch creates ruckus in service delivery system.
- There are some networking issues in remote areas and rural areas. These led to a delay in services delivery.

Way forward

- There is a need for robust technical infrastructure and capacity building.
- Collaboration and coordination among various government departments is very much needed for swift delivery of services to targeted beneficiaries.
- Government should run the financial literacy awareness program for harnessing the true potential of Direct Benefit Scheme.
- There should be a provision of single window redressal platform for all glitches and issues related to direct benefit transfers.

MCOs

- 1. Consider the following statements about Demographic dividend
 - 1. It is when the share of the working-age population is larger than the non-working-age share of the population.
 - 2. It may be followed by demographic tax where population growth stops, slows or even goes into reverse.
 - 3. India is passing through the phase of demographic dividend since majority of its population is young.

Which of the above statement/s is/are correct?

- (a) 1 and 2 only
- (b) 2 and 3 only
- (c) 1 and 3 only
- (d) 1,2 and 3
- 2. With reference to the 3rd 'No Money for Terror' Conference, consider the following statements:
 - 1. It is organized by Union Ministry of Finance.
 - 2. It is for the first time India organize this event.
 - 3. It is an initiative of Financial Action Task Force

Which of the statement/s given above is/are correct?

- (a) 1 and 2 only
- (b) 2 only
- (c) 2 and 3 only
- (d) 3 only
- 3. Consider the following statements with reference to vostro accounts recently seen in news
 - 1. A vostro account is an account a correspondent bank holds on behalf of another bank.
 - 2. To stop the rupee's decline against the dollar, recently RBI had announced this new system to settle international commerce in local currency.

Which of the above statements is/are correct?



- (a) 1 only
- (b) 2 only
- (c) Both 1 and 2
- (d) Neither 1 nor 2
- 4. Which of the following is/are the sub-scheme of Rashtriya Krishi Vikas Yojana?
 - 1. Accelerated Fodder Development Programme (AFDP)
 - 2. National Saffron Mission
 - 3. Crop Diversification Programme (CDP)4. Reclamation of Problem Soil (RPS)

Choose the correct answer using the codes given below.

- (a) 3 and 4 only
- (b) 1, 3, and 4 only
- (c) 2, 3, and 4 only
- (d) 1, 2, 3 and 4
- 5. Artemis lunar exploration program, recently seen in the news, is an initiative of which among the following?
 - (a) ROSCOSMOS
 - (b) NASA
 - (c) JAXA
 - (d) SpaceX
- 6. A report called 'Financing India's Urban Infrastructure Needs: Constraints to Commercial Financing and Prospects for Policy Action' recently seen in news has been released by which of the following?
 - (a) World Bank
 - (b) RBI
 - (c) IMF
 - (d) SEBI
- Exclusive Coaching for UPSC/OPSC 7. Recently following water bodies are in news arrange them from North to south
 - 1. Yellow Sea
 - 2. South China sea
 - 3. East China sea
 - 4. Celebes Sea

Select the correct answer using the code given below

- (a) 3-2-4-1
- (b) 1-2-3-4
- (c) 1-3-2-4
- (d) 2-3-4-1
- Which of the following can be a possible result of climate change?
 - 1. Increase in mosquito-borne diseases and diseases from vibrio pathogens
 - 2. Food insecurity and undernutrition
 - 3. Displacement and migration

Choose the correct answer using the codes given below

- (a) 1 and 2 only
- (b) 2 and 3 only
- (c) 1 and 3 only
- (d) 1,2 and 3
- 9. In its latest update, the Financial Action Task Force (FATF) placed which Asian country on the "black list"?
 - (a) Sri Lanka
 - (b) Myanmar
 - (c) Afghanistan
 - (d) Nepal
- 10. Operation Barkhane, sometimes seen in the news is related to which country?
 - (a) USA
 - (b) UK
 - (c) France
 - (d) Germany