

PERFECT 7

FORTNIGHTLY CURRENT AFFAIRS

February 2022 / Issue-1

Carbon inequality in India

The Need For A Balance Between India's
Continental And Maritime Security Interests

Taxing Crypto Currency Transactions

Urban Paralysis: Consequence of Urban Disaster

Nepalese objection to widening of the road by
India in Lipulekh and its intention

Government Response Awaited on Law on
Inter-Faith Marriages

The Importance of socialism growing stronger
in the world



dhyeyaias.com



DHYEYA IAS®
most trusted since 2003



DHYEYA IAS®
most trusted since 2003

Target IAS Prelims 2022

English Medium

Starts from
16th Feb.
2022



Civil Services, being the most coveted job in India, attracts millions of aspirants from all over the country. However, since the seats are limited, there is also a cut throat competition to succeed in these Examination. Preparation and Razor sharp strategy is the key to success. With this idea and intention, our highly qualified and experienced faculty members have developed distinguished strategy to cover different topics in a well-defined manner. We assist aspirants to develop crystal clear concepts and interdisciplinary approach to crack this coveted exam. Our innovative teaching techniques create a reliable road map to achieve this golden goal. We empower you to fulfill dreams and expectations while nourishing the ingredients of hard-work, determination, confidence with right direction and exam cracking strategy. We work proactively with Aspirants to improve their performance with rapidly changing patterns of UPSC

A student can choose any of the following courses according to his or her requirement.

Target IAS Prelims 2022

Fee: 28,000/-

Objective	Features	Course Content	Faculty Name
The course has been designed to give extensive coverage of all the sections of General Studies including Current Affairs. This program would provide an in-depth understanding of the Dynamic part of General Studies where Expert Faculties would be analyzing the events and developments through live classes and side by side, students would be provided a rich knowledge content pertaining to the Static nature of General Studies through Live / Delayed Live or Recorded classes which they can view unlimited times. The Course would also contain the CSAT part where students would develop a better understanding of various Principles and their applications. Concept building and clarifications would also be a part of the curriculum. Various Techniques would be discussed and taught that would help to solve the questions that come in this section.	* 100 Hrs. of Live Classes which will cover the Dynamic portion of General Studies. * 150 Hrs. of Live / Delayed Live/ Recorded classes which will cover the Static portion of GS which can be viewed by the students according to their ease. * Complete CSAT course content would be covered. * Half an hour of doubt clearing session at the end of all Live classes. * Academic chat support would be provided. * Each class would be of 2 Hours. * Downloadable Study material in PDF format would be provided in the Application. * Course would include 24 Soft Copies of Perfect 7 Magazine worth Rs.2000. * One Online Prelims Test Series worth Rs.2500	General Studies- Static	
		Indian History+ Art & Culture	Javed Haque
		Geography of India & World	Apurva Mehrotra
		Indian Polity & Governance	Kumud Ranjan
		Economy	Kumar Amit
		General Science	Peeyush
		General Studies- Dynamic (Current Issues & Developments)	
		Indian Polity & Governance	Kumud Ranjan
		Environmental Ecology, Bio-Diversity & Climate Change	Sanjay Singh
		Economy + Budget & Economic Survey	Kumar Amit
		Technology	Q. H. Khan & Peeyush
		Health	Javed Haque
		International Issues	Bharat
		CSAT	
		Maths and Reasoning	Mukesh Singh
		Comprehension	Shweta Singh

Call : 9205274741 / 42 / 44

CLICK HERE FOR ENROLLMENT



General Studies - Target IAS Prelims 2022

Fee: 18,000/-

Objective	Features	Course Content	Faculty Name
The course has been designed to give extensive coverage of all the sections of General Studies including Current Affairs. This program would provide an in-depth understanding of the Dynamic part of General Studies where Expert Faculties would be analyzing the events and developments through live classes and side by side, students would be provided a rich knowledge content pertaining to the Static nature of General Studies through Live / Delayed Live or Recorded classes which they can view unlimited times.	* 100 Hrs. of Live Classes which will cover the Dynamic portion of General Studies. * 150 Hrs. of Live / Delayed Live/ Recorded classes which will cover the Static portion of GS which can be viewed by the students according to their ease. * Half an hour of doubt clearing session at the end of all Live classes. * Academic chat support would be provided. * Each class would be of 2 Hours. * Downloadable Study material in PDF format would be provided in the Application.	General Studies- Static	
		Indian History+ Art & Culture	Javed Haque
		Geography of India & World	Apurva Mehrotra
		Indian Polity & Governance	Kumud Ranjan
		Economy	Kumar Amit
		General Science	Peeyush
		General Studies- Dynamic (Current Issues & Developments)	
		Indian Polity & Governance	Kumud Ranjan
		Environmental Ecology, Bio-Diversity & Climate Change	Sanjay Singh
		Economy + Budget & Economic Survey	Kumar Amit
		Technology	Q. H. Khan & Peeyush
		Health	Javed Haque
		International Issues	Bharat

Spotlight Current Affairs - IAS Prelims 2022

Fee: 10,000/-

Objective	Features	Course Content	Faculty Name
The course has been designed to give extensive coverage of the Dynamic part of General Studies. In this course Expert Faculties would be analyzing and explaining in detail, all the current events and developments which are of dynamic nature through live classes.	* 100 Hrs. of Live Classes which will cover the Dynamic portion of the Current Affairs under GS. * Half an hour of doubt clearing session at the end of all Live classes. * Academic chat support would be provided. * Each class would be of 2 Hours. * Downloadable Study material in PDF format would be provided in the Application.	General Studies- Dynamic (Current Issues & Developments)	
		Indian Polity & Governance	Kumud Ranjan
		Environmental Ecology, Bio-Diversity & Climate Change	Sanjay Singh
		Economy + Budget & Economic Survey	Kumar Amit
		Technology	Q. H. Khan & Peeyush
		Health	Javed Haque
		International Issues	Bharat

UPSC CSAT

Fee: 10,000/-

Objective	Features	Course Content	Faculty Name
The Course is designed to develop a better understanding of various Principles and their applications amongst students. Concept building and clarifications would also be a part of the curriculum. Various Techniques would be discussed and taught that would help to solve the questions that come in this section.	* 150 Hrs. of Live Classes * Half an hour of doubt clearing session at the end of all Live classes. * Academic chat support would be provided. * Each class would be of 2 Hours. * Downloadable Study material in PDF format would be provided in the Application.	Maths and Reasoning	Mukesh Singh
		Comprehension	Shweta Singh

3 days of additional classes would be provided which would cover Miscellaneous Topics like Sports, Awards, Places, Books and other such important areas.

Attractive Discounts for Dhyeya Students

- 100% Discount on Current Affairs (Dynamic Portion) for all Dhyeya Students who took admission on or after 1st April 2020
- 50% Discount on Current Affairs (Dynamic Portion) for all Dhyeya Students who took admission before 1st April 2020

SYLLABUS OF PRELIMS

Paper I (200 Marks)	Duration : 2 Hours	Paper II (200 Marks)	Duration : 2 Hours
○ Current events of national and international importance. ○ History of India and Indian National Movement. ○ Indian and World Geography-Physical, Social, Economic Geography of India and the World. ○ Indian Polity and Governance - Constitution, Political System, Panchayati Raj, Public Policy, Rights Issues, etc. ○ Economic and Social Development, Sustainable Development, Poverty, Inclusion Demographics, Social Sector initiatives, etc. ○ General issues on Environmental Ecology, Bio-diversity and Climate Change - that do not require subject specialization. ○ General Science.		○ Comprehension ○ Interpersonal skills including communication skills; ○ Logical reasoning and analytical ability ○ Decision making and problem solving. ○ General mental ability ○ Basic numeracy (numbers and their relations, order of magnitude, etc.) (Class X level), ○ Data Interpretation (charts, graphs, tables, data sufficiency etc.- Class X level)	

Director's Message



Mr. Vinay Kumar Singh

The guiding philosophy of the institute, throughout, has been creation of knowledge base. Dhyeya IAS inculcates human values and professional ethics in the students, which help them make decisions that are good not only for them, but also for the society, for the nation, and for the world as a whole. To fulfil its mission in new and powerful ways, each student is motivated to strive towards achieving excellence in every endeavor. It is done by making continuous improvements in curricula and pedagogical tools.

The rigorous syllabi not only instil in them, a passion for knowledge but also attempts to teach them how to apply that knowledge in real-life situations. The programmes lay emphasis on well-rounded personality development of the students and also inculcate the values of honesty and integrity in them.

Yours very truly,



Vinay Kumar Singh
CEO and Founder



Mr. Q H Khan

Dhyeya IAS is an institution that aims at the complete development of the students. Our faculty are highly experienced and qualified to ensure that the students are given every possible support in all their academic endeavors. It is a multidisciplinary institution which ensures that the students have ready access to a wide range of academic material.

Our brand of education has broad horizons as we believe in exposure. Our students are encouraged to widen their knowledge base and study beyond the confinements of the syllabus. We aim to lend a gentle guiding hand to make our students recognize their inner potential and grow on their own accord into stalwarts of tomorrow's society.

Yours very truly,



Q H Khan
Managing Director

PREFACE



Current Affairs has an important role in the examinations conducted by Union Public Service Commission and State Public Service Commissions. It is necessary for the candidate to have knowledge of relevant information on issues of national and international importance. Perfect 7 Magazine is being presented fortnightly in front of the students to fulfill this requirement. Preparation of civil services exam is only completed when candidates have holistic knowledge and analysis of the dynamic nature of the current affairs. 'Perfect7' keeps this vision and approach and understands the multidimensional need of students at the content level, so this magazine has presented the current affairs with relevant issues of general studies. Keeping in mind the mains exam, current articles on 7 burning issues, Ethics Case Studies, Biographies of important personalities, coverage of most useful topics of various sections of General Studies and the most important current affairs issues are being covered for Preliminary Examination in which emphasis is being given on environmental, ecology, art and culture, science and technology, economy issues. A short section on Terminology will also be part of Perfect 7 Magazine.

Brain boosters with 7 themes based graphics are being presented in a concise form to enhance the conceptual understanding of the students. Apart from this, updated information on Global Initiatives, Global Institutions, Structure of Organizations, Functioning, Important Reports, and Indices will be included in this magazine, which is asked prominently in the Civil Services Examination. To give emphasis on facts and analysis, keeping in view the trends of new nature of questions in Preliminary and Main Examination of Civil Services, an inclusive magazine is being provided to the students so that they can give the right direction to their preparation by understanding the new requirements of Civil Services Examination. We hope that Perfect 7 in its new form will prove to be very useful. Your suggestions are always welcome.

Vinay Kumar Singh
Editor
DhyeyaIAS



DHYEYA IAS®
most trusted since 2003

PERFECT 7 TEAM

Editor	• Vinay Kumar Singh
Managing Director	• Q.H. Khan
Co-Editor	• Gautam Tiwari
Sub-Editor	• Ashutosh Mishra • Saurabh Chakraborty
Publication Manager	• Dr. S. M. Khalid
Editorial Support	• Prince Kumar • Gaurav Chaudhry • Devendra Singh • Mrityunjay Tripathi • Lokesh Shukla
Lead Writer	• Vivek Ojha
Chief Reviewers	• A.K. Srivastava • Vineet Anurag • Baghendra Singh
Design and Development	• Pragati Kesarwani • Punish Jain
Typist	• Sachin • Tarun
Office attendant	• Raju • Chandan • Arun

Credits: PIB, The Hindu, The Indian Express, Jansatta, Dainik Jagran, Down to Earth, Economic and Political Weekly, Yojana, Kurukshetra, The Print

DHYEYA EDUCATIONAL SERVICES PVT. LTD.
AN ISO 9001:2008 COMPANY

Face to Face Centres

MUKHERJEE NAGAR	: 9205274741, 9205274742
RAJENDRA NAGAR	: 9205274743
LAXMI NAGAR	: 9205212500, 9205962002
ALLAHABAD	: 0532-2260189, 8853467068
LUCKNOW (ALIGANJ)	: 0522-4025825, 9506256789
LUCKNOW (GOMTINAGAR)	: 7234000501, 7234000502
GREATER NOIDA	: 9205336037, 9205336038
KANPUR	: 7887003962, 7897003962
BHUBANESWAR	: 8599071555
SRINAGAR (J&K)	: 9205962002

PERFECT 7

FORTNIGHTLY CURRENT AFFAIRS

Contents

Important Issues ————— 1-15

- Carbon inequality in India
- The Need for A Balance Between India's Continental And Maritime Security Interests
- Taxing Crypto Currency Transactions
- Urban Paralysis: Consequence of Urban Disaster
- Nepalese objection to widening of the road by India in Lipulekh and its intention
- Government Response Awaited on Law on Inter-Faith Marriages
- The Importance of socialism growing stronger in the world

National Issues ————— 16

International Issues ————— 17

Environmental Issues ————— 18-19

Science and Tech Issues ————— 20-21

Economy Issues ————— 22-23

News of National and International Importance ————— 24-26

Current Affairs at a Glance ————— 27

Brain Boosters ————— 28-34

Current Affairs and Environment & Ecology Based MCQs ————— 35-40

Case Study for GS Paper IV ————— 41

Eminent Personality ————— 42

Polity Terms ————— 43



Hindi & English
Current Affairs
Monthly
News Paper



DHYEYA TV
Current affairs Programmes hosted
by **Mr. Qurban Ali**
Ex. Editor RSTV) & by Dhyeya Team
Broadcasted on YouTube & Dhyeya TV



7 IMPORTANT ISSUES



Carbon inequality in India

Context:-

The recently released World Inequality Report 2022 states that economic inequality is at a 'peak' in India and Brazil in the group of low and middle-income countries. And there is a proportional relationship between economic inequality and carbon inequality.

Introduction:-

In the recently released Global Inequality Report, it has been said that India is a poor and highly unequal country where the elite is dominant. Only 10% of the people in India have 57% of the national income, and only 1% of the people have 22% of national income. At the same time, it was reported that global income and wealth inequality is proportional to environmental inequality and inequality in the relative contribution of climate change. Only 10% of the world's emitters account for 50% of all emissions, while the last 50% of the world's emitters contribute only 12% of emissions. Thus it is clear that there is a proportional relationship between economic inequality and carbon inequality. So we can say that India's promise in Glasgow (COP-26) and India's actual position is mutually dialectical.

Carbon inequality in India:-

Carbon inequality in India is widespread at the national and international levels, which is described as follows.

Inequality at the national level

- Per capita carbon emissions in India is 2.2 tonnes of CO₂ which is the national average. According to 2019 data, 40% of India's middle-income population emits 2 tons of CO₂ per capita, while the richest 10% of the population emits about 8.8 tons of CO₂ per capita. This demonstrates carbon disequilibrium.

International inequality

- Inequality is not only at the national level but also present at the global level. Where according to the 2021 figures, where the global carbon emissions are 6.5 tonnes of carbon dioxide per capita, the per capita carbon emissions in India are only 2.2 tonnes of carbon dioxide.
- Globally, the poorest 50% of the population emit only 1.6 tonnes of CO₂ per capita of carbon. The top 10% of the world's richest population emits carbon equivalent to 31 tons of carbon dioxide per capita. It should be noted that globally the richest 0.01 percent of the population emits carbon equivalent to about 2500 tons of carbon dioxide per person.
- These figures reflect the organic inequality prevailing in India at the national and international levels.

Reasons of carbon disparity:-

Effects of the industrial revolution:

This climate crisis has arisen as a result of the industrial revolution that took place in the world in the 18th century. This industrial revolution was started by countries like Britain, France, but now the whole world

is being affected by it. The western world has got the main benefit of the Industrial Revolution, at that time other countries like India, ASEAN, other regions of Asia, Africa, South America, etc. were suffering from colonialism where industrialization was not done. Countries that have benefited from the Industrial Revolution emit more carbon, while other countries emit less.

Excellent standard of living

A huge amount of energy is required in the use of physical items such as cars, AC, fridges, etc. for a good standard of living. The energy requirement is met at the cost of the environment. At the global or national level, the rich population uses these luxuries, while the poorest population is unable to use them, which becomes the main cause of carbon inequality.

Effects of capitalism

At present the whole world is moving towards the indiscriminate profit of capitalism, this is increasing inequality and getting richer and richer while the poor are getting poorer. Because economic conditions are directly related to carbon emissions, carbon inequality is widening even with the rise of capitalism.

Blind imitation of western civilization:-

- India blindly imitates western civilization where materiality is given utmost importance. This also affects the carbon affinity to some extent.
- unplanned urbanization

- Unplanned urbanization had wide-ranging effects. First of all, forests were cut to settle cities, which gave rise to a massive reduction in the natural relationship of carbon and on the other hand, due to the growth of capitalism in cities, on one side you will see big bungalows and on the other, you will see Dharavi. Carbon inequality is found in both these places as will also be seen in slums.

How to Reduce these inequalities Efforts to establish climate justice in Glasgow

India is continuously striving to establish global climate justice by reducing carbon inequality. In this context, some tips have been suggested by India in the Glasgow Conference which is as follows.

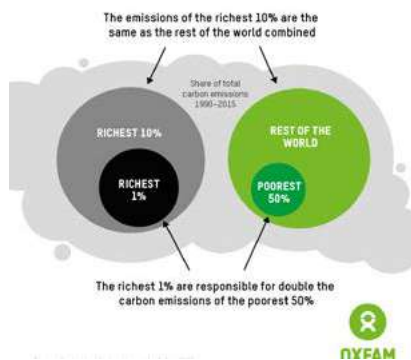
- Panchamrita Principle**

The Panchamrut principle has been given by the Prime Minister of India at the conference. Its 5 principles are as follows-

- India will reach 500 GW of non-fossil energy capacity by 2030.
- India will meet 50% of its overall energy requirement from renewable energy sources by 2030.
- India will reduce its total projected carbon emissions by one billion tonnes by 2030.
- By 2030, India will reduce the carbon intensity of its economy to less than 45%.
- By the year 2070 i.e. in the next 50 years, India will achieve the Net Zero target.

- Along with this, India has appealed for global cooperation to improve climate change. India is trying to transfer finance and technology from developed countries to reduce inequality.

- International Solar Alliance has been established by India which will reduce carbon pressure and carbon



inequality by increasing solar energy.

- Former Reserve Bank of India Governor Raghuram Rajan has suggested a Global Carbon Incentive (GCI) to tackle the carbon disparity. It is also a reliable option for addressing global carbon inequalities.

Efforts to reduce carbon emissions at the national level

- Along with this, India has made efforts to reduce carbon inequality at the national level.
- India is giving importance to environmental projects like electric vehicles, solar parks, and “Run of the River” at the domestic level.
- New vehicle policy released by India supports electric vehicles.
- Schemes like Kusum, Saubhagya, Deendayal Upadhyaya Gram Jyoti Yojana, Pradhan Mantri Awas Yojana are being run by India, which will reduce carbon inequality along with inequality at many levels of life.
- India will also benefit from following the Panchamrita principle.

Conclusion

According to the World Inequality Report 2022, while 63 percent of global carbon inequality in 1990 was due to ‘between countries, 63 percent of global carbon inequality in 2019 was due to ‘within countries’ disparities. India is fighting the fight to reduce the carbon inequalities that exist between the countries in

multilateral fora, along with this, India will also have to make efforts in the context of the inequalities prevailing in the country.

NOTES



The Need For A Balance Between India's Continental And Maritime Security Interests

Reference

There have been many such international developments in 2021, due to which India's foreign policies have become conflicted over continental and maritime security interests. The withdrawal of the Taliban in Afghanistan, the growing refugee crisis, the deepening crisis in Yemen, Iraq, Syria, Ethiopia, as well as the rise in the prices of energy resources (oil and gas), were many important events. As a result of these events, the geopolitical situation of India was also affected. In the face of these changing developments, India has to pay attention to its maritime security and continental security.

Status of India's Maritime Security Interests

India occupies a major strategic location in the Indian Ocean. The description of the positive and negative aspects of India's maritime security interests is as follows.

The positive side in maritime security interests

- India is in a very strategic position in the Indian Ocean and India has been described by the US as an important ally in the Indo-Pacific region.
- India is an important member of the Quad, the premier strategic organization in the Indian Ocean region. America, Japan, and Australia are its other members.

- EU, Germany, UK, etc all see the Asia Pacific region as a power center and they all want India's cooperation to bring stability in this region.

- India exercises direct control over the Strait of Malacca, one of the world's most strategic choke point through which world's 70% of the goods pass.

- India is being viewed by ASEAN as a fast-growing economic region in the Indian Ocean, which further enhances India's global leadership role.

- India has good relations with countries like Sri Lanka Bangladesh Maldives Myanmar, which prove to help safeguard India's maritime border.

Challenges In Maritime Security Interests

Increasing China's reach

- China is constantly trying to surround India in the Indian Ocean. China has leased ports in countries like Bangladesh, Australia, Sri Lanka under the Belt and Road Initiative and the Neo-imperialist strategy.
- The current government of Ethiopia is being supported by China in the recent civil war in Ethiopia, due to which China is also reaching the Horn of Africa. The Horn of Africa is an important strategic region in the western region of the Indian Ocean.
- Thus China is trying to establish its reach from the eastern coasts of India to the western coasts.

Establishment of AUKUS :

- Recently a strategic organization AUKUS has been created between the US, Australia, and the United Kingdom, this organization is mainly focused on the Asia Pacific region. But by not making India a partner in this organization, analysts believe that America is now showing a deviation from its policies and is starting to give importance to Australia instead of India.

Regional problems

- The agenda of the main opposition parties in Bangladesh, Maldives, and Sri Lanka are to oppose India. When these parties come to power, they give more importance to China than India. For example, recently India out campaign is being run in the Maldives. The military rule of Myanmar is contradictory to the democracy of India. In the above political changes, there is a slight deterioration in the maritime geopolitical position of India.

Challenges in Continental Security Interests

- The proximity of Russia and China
- At present, the centrality of Russia in Eurasian geopolitics is again increasing. Russia continues to intervene in crises in Belarus, Ukraine, the Caucasus, and Kazakhstan. The recent invitation to Russia by NATO countries for talks in Ukraine is



undermining Russia's centrality in Eurasia. Although India and Russia have good relations and two plus two talks have been organized between these two countries recently, the fact cannot be ignored that the proximity of Russia and China has increased in recent years.

- **Increase in China's interference**

China is expanding not only in the maritime domain, but it is also expanding its reach in the continental region. Through the Belt and Road Initiative, China is expanding from Central Asia to Middle-Eastern Europe. It is also a strong competitor of India in consolidating geopolitics in Central Asian countries.

- **Border dispute**

Presently India is suffering from a double border dispute with China and Pakistan. More recently, a new border law brought by China is adding to India's concerns, in which 15 places of Arunachal Pradesh have been given new names by China by showing them on its map. Along with this, objection has been lodged by Nepal on a road to be recently constructed in Uttarakhand and this is likely to increase regional tension between India and Nepal.

- **Connectivity problems**

- Pakistan has been making India a victim of site restrictions for the past several decades. That is, it does not

allow India to use its land for connectivity. This increases the cost of India's access to Afghanistan and Central Asia.

- Along with this, problems have also arisen due to the non-completion of connectivity projects like INSTC, BBIN by India on time.

- **Taliban in Afghanistan**

After America's withdrawal from Afghanistan, that Taliban regime has been established. This Taliban regime has been a supporter of Pakistan in the past. The Taliban government is negatively affecting India's influence in Afghanistan by hindering the goal of a stable and democratic Afghanistan.

- **US retreat**

At present, the US is only committed to the defense of Japan and the Korean Peninsula. Apart from this, it has withdrawn its forces from Central Asia, Afghanistan, Iraq, Iran. We have also seen the consequences of America's departure from Afghanistan. America's departure from the region is giving rise to regional instability.

India's prospects in continental security

- India has good relations with other important countries of the region such as Israel, Saudi Arabia, Iran, etc.

- The place of most strategic importance in the Eurasia region is the Central Asian country. India has very good relations with these Central Asian countries. Recently, talks were held between India and the Foreign Ministers of Central Asian countries, in which the rest of the relations between the two regions were to be enhanced.

- Before some time the foreign ministers of India, Israel, the US, and Saudi Arabia had a virtual meeting, which international analysts are see-

ing as the second quad.

- India has an army with a strength of 13 lakhs, which is one of the most powerful armies in the world.

Thus we can say that there are many challenges before India's continental security interests and India is continuously trying to solve them.

Conflict between continental security and maritime security

- Where India has to establish cooperation with America and Europe to establish maritime importance, it is necessary to have better relations with Russia for the fulfillment of continental interests. Due to the mutual dispute between Russia and America, it may be difficult for India to establish relations with both.

- Some countries of Europe want India's cooperation to establish their reach in the Indo-Pacific region, but they do not consider China to be a regional crisis to fulfill their economic interests.

Thus, there is a conflicting situation between India's maritime and continental security interests, which is extremely important for India to balance.

Way Forward

- Better relations with Central Asia to become important in the Eurasia region and with ASEAN countries for increasing importance in the Indo-Pacific region are essential. India has so far had a good relationship with these two regions which can help balance India's security interests.

- India needs to further expand its relations with Shanghai Cooperation Organisation, European Economic Union, Collective Security Treaty Organization, etc. Along with this, India will also have to consider strengthening the South and BIMSTEC.

- India has to strengthen its soft power diplomacy. Although India is

making better efforts in this direction, the corona vaccine has been sent by India to many countries including Afghanistan, which has increased India's credibility.

- It is clear that at present China has become a dual problem for In-

dia. India will have to get the cooperation of international and regional organizations against the aggressive attitude of China.

The present international situation indicates that India does not have the opportunity to choose

between maritime interests and continental interests. India should define continental and maritime security standards according to its interests, efforts should be made to achieve these demands through its diplomacy.



Taxing Crypto Currency Transactions

Why in News?

- Since crypto currencies are unlike any other asset class, stored and traded virtually, there are varied challenges which need to be addressed in order to streamline the process of taxing crypto transactions.

What is Crypto currency?

- Crypto currency is a specific type of virtual currency, which is decentralised and protected by cryptographic encryption techniques. Bitcoin, Ethereum, Ripple are a few notable examples of crypto currencies.
- Decentralisation implies that there is no central authority where records of transactions are maintained. Instead, anyone can create a transaction. This transaction data is recorded and shared across multiple distributor networks, through independent computers.

Why the Government plans to taxing crypto currency transactions?

- A liberal estimate suggests that as many as 10 crore Indians may already have investments exceeding a total of \$10 million in them. This

not only creates an avenue for generation of tax revenue for the nation but also tax evasion.

- Transparency in transaction of invisibility make tax evaders to park their black money abroad and fund criminal activities, terrorism, etc. so, transparency brought visibility of the transaction.

Taxing crypto currency transactions

- Although the Income Tax Act, 1961 ("IT Act") does not specifically mention cryptocurrencies, it does cast a wide enough net to bring crypto transactions under its ambit.
- Trading in cryptocurrency may be classified as transfer of a 'capital asset', taxable under the head 'capital gains'. However, if such cryptocurrencies are held as stock-in trade and the taxpayer is trading in them frequently, the same will attract tax under the head 'business income'.
- Even if one argues that crypto transactions do not fall under the above heads, Section 56 of the IT Act shall come into play, making them taxable under the head 'Other sources of income'.
- However, this in itself is not suffi-

-cient in order to put in place a simple yet effective taxation regime for cryptocurrencies. Since cryptocurrencies are unlike any other asset class, stored and traded virtually, there are varied challenges which need to be addressed in order to streamline the process of taxing crypto transactions.

Challenges for effective taxation regime for crypto currencies:

There are varied challenges which need to be addressed in order to streamline the process of taxing crypto transactions.

- **Varied interpretations:** The absence of explicit tax provisions has led to uncertainty and varied interpretations being adopted in relation to mode of computation, applicable tax head and tax rates, loss and carry forward, etc. For instance, the head of income under which trading of self-generated crypto currency (currencies which are created by mining, acquired by air drop, etc.) is to be taxed is unclear. If these are taxed under capital gains, what should be taken as the cost of acquisition for the purpose of computation? If the

acquisition cost is to be taken as the fair market value of the said cryptocurrency as on date of generation, how does one arrive at this value? Since there is no consistency in the rates provided by the crypto-exchanges, it is difficult to arrive at a fair market value.

- It is often tricky to identify the tax jurisdiction for crypto transactions as taxpayers may have engaged in multiple transfers across various countries and the crypto currencies may have been stored in online wallets, on servers outside India. In such cases, it becomes difficult to pinpoint which jurisdiction's tax laws would become applicable and what kind of tax treatment would be effected especially in light of various nations having differing tax treatment for crypto assets including imposition of a general ban on them.

- The identities of taxpayers who transact with crypto currencies remain anonymous. Each crypto address comprises a string of alphanumeric characters and not the person's real identity, giving tax evaders a cloak of invisibility. Exploiting this, tax evaders have been using crypto transactions to park their black money abroad and fund criminal activities, terrorism, etc.

- The lack of third party information on crypto transactions makes it difficult to scrutinise and identify instances of tax evasion. One of the most efficient enforcement tools in the hands of Income Tax Department is CASS or 'computer aided scrutiny selection' of assessments, where returns of taxpayers are selected inter alia based on information gathered from third party intermediaries such as banks. However, crypto-market intermediaries like the exchanges, wallet providers, network operators, miners, administrators are unregulated and collecting information from them is very difficult.

- Another consequence of this lack of information is that the tax authorities are left with hardly any tools to verify any crypto transactions which do get reported. They are instead forced to fully depend on the data provided by the taxpayers.

- Even if the crypto-market intermediaries are regulated and follow Know Your Customer (KYC) norms, there remains a scenario, where physical cash or other goods/services may change hands in return for crypto currencies. Such transactions are hard to trace and only voluntary disclosures from the parties involved or a search/survey operation may reveal the tax evaders.

What the government should do to provide a robust mechanism for taxing crypto transactions?

Certain steps can be taken to provide a **robust mechanism for taxing crypto transactions** are following:

- To begin with, the income-tax laws pertaining to the crypto transactions need to be made clear by incorporating detailed statutory provisions. These could include provision of a definition for crypto assets for tax purposes and guidelines addressing the major taxable events and income forms associated with virtual currencies. This should be followed by extensive awareness generation among the taxpayers regarding the same.

- The practice of having separate mandatory disclosure requirements in tax returns (as is the case in the United States) should be placed on the taxpayers as well as all the intermediaries involved, so that crypto transactions do not go unreported.

- Additionally, the existing international legal framework for exchange of information should be strengthened to enable collecting and sharing of information on crypto-transactions. This will go a long



way in linking the digital profiles of crypto currency holders with their real identities.

- Furthermore, the Government must impart training to its officers in block chain technology. In this regard, it may be noted that the United Nations Office on Drugs and Crime's 'Cybercrime and Anti-Money Laundering' Section (UNODC CMLS) has developed a unique cryptocurrency training module, which can aid in equipping tax officers with requisite understanding of the underlying technologies.

- Tax authorities should also equip themselves with the latest forensic software (such as Elliptic Forensics Software is being used by the USA Internal Revenue Service and Graph-Sense used in the European Union) which can analyse a high volume of crypto transactions at a time and raise red flags in cases of suspicious transactions.

Way forward:

- It is certain that crypto currencies are here to stay. A streamlined tax regime will be essential in the formulation of a clear, constructive and adaptive regulatory environment for crypto currencies.



Urban Paralysis: Consequence of Urban Disaster

Reference

Recently, due to heavy rains in the city of Chennai, the entire city was closed which is called Urban Paralysis. In India, the cessation of all processes in cities due to extreme weather events and floods resulting from monsoon rains exposes the problems of urbanization.

Causes of disasters in Indian cities

Presently the rapidly developing Indian urbanization is facing various problems. These problems are related to social, economic, environmental, geographical, etc. dimensions. The main problems of Indian urbanization are described as follows:

India's vulnerability to disaster

- According to the National Disaster Management Authority, 12% of the total land area of India is vulnerable to the threat of floods. Along with this, due to the contamination of river water and encroachment by people on the river banks, the risk of floods increases further, which affects the cities the most.
- India's coastline is about 7500 km long in the Indian Ocean. More than 75% of the Indian coastline is extremely vulnerable to Tsunami and Cyclones.

Growing Population:

- According to the 2001 census, where about 28% of the total population of India lived in cities, by 2011 this number reached 31%. It is

estimated that by 2030, about 40% of the Indian population will live in cities. Due to the rapidly increasing population in cities, the pressure on the space per square meter is increasing.

Encroachment of places of environmental importance:

- Simultaneously, due to the high demand for land, environmentally important places are being encroached, for example in 1960, Bangalore had more than 200 lakes, whose number has reduced to less than 10 at present. Similarly, 90% of the Pallikaralai wetlands in Chennai have been lost due to unplanned urbanization.

Urban pollution

- Due to the increasing use of automobile vehicles, industries, convenience items like AC fridges, etc. in the cities, there is a huge amount of pollution in the cities. The capital of the country, Delhi is one of the most polluted cities in the world. The decline in the environmental quality of the urban area is giving rise to many health and environmental problems, such as pollution of the Yamuna river in Delhi.

Ineffective Water Management:

- The situation of water management in cities is very serious. Old cities like Hyderabad and Delhi (which have been developed as cities since about 200 years ago) also have problems with water management.

- The main reason for the floods in Hyderabad in October 2020 was that the river water was not released in time, followed by the uncontrolled release of river water due to which many times it broke and the city was flooded. Kerala was flooded only after the uncontrolled release of river water.

- Due to daily rains in the city of Mumbai, a flood-like situation is created. In this city also the required improvements have not been made in the drainage system.

Climate change

- The whole world is facing the effects of climate change due to the increase in greenhouse gases at the global level. As a result of climate change, untimely rainfall, and phase weather events are taking place, which is becoming the main cause of urban disaster.

Administrative inaction

- According to a CAG report in 2017, the frequency of floods increases due to administrative inaction and tensions between states over inter-state river disputes. The CAG has also said that the government is not properly implementing the suggestions given by the National Flood Commission to prevent floods.
- As a result of the above reasons, disasters are increasing in the cities of India, due to which the cities have to be closed in a big

way. The cities were also closed due to the recent corona pandemic. The World Bank estimates that global disaster damage to cities has reached \$500 billion.

Effects of this problem

Due to this problem, the daily life of the people is badly affected and the common people have to face many types of losses.

- Economic activities are badly affected as a result of urban disasters. According to the World Bank report, the damage caused by urban disaster has reached about 500 billion dollars.
 - The density of population in urban areas increases the number of people affected by flood disasters. Along with this, due to the accumulation of dirty water in the absence of an improved drainage system, the number of viral diseases increases and spreads rapidly in the cities.
 - The presence of slums leads to a lack of sanitation which makes the diseases spread rapidly.
 - Due to disaster in the urban area, the logistics system and supply management come to a standstill. Employment in the unorganized sector is most affected by this problem.
 - The condition of the urban poor and migrant laborers becomes more pathetic.
 - Due to the closure or lockdown in the urban area, sometimes a situation of food crisis also arises.
 - Biodiversity has to face loss as a result of disasters in urban areas. For example, due to the floods in Assam, the Kaziranga National Park was flooded, causing extensive loss of flora and fauna.
- In this way, we can say that urban disasters widely affect the daily life of common people as well as create environmental and economic problems.



Efforts made by the government to solve this problem

Urban local self-government

- The provision of urban local self-government has been made through the Amendment Act 74 of the Indian Constitution. The main objective of this urban local self-government is that the third-tier government should know the basic problems of the people of the city and make arrangements for their redressal.

Swachh Bharat Abhiyan

The Swachh Bharat Mission was started by the Government of India as a mass movement for cleanliness. Efforts were made to clean the urban areas and slums under the Swachh Bharat Mission. Along with this, the rivers were also cleaned. Under this mission, efforts were made to make practical changes among the people, as a result of which the tendency of floods caused by sanitation-borne diseases and increase in siltation in the river can be reduced.

Disaster Resilient Infrastructure

Disaster Resilient Infrastructure has been started by the Government of India in collaboration with the countries of the Indian Ocean. Will enhance regional cooperation in dealing with disasters like tsunami cyclones.

Meteorological satellite

The Indian Space Research Organiza-

-tion is trying weather forecasting through projects like Megatrips which will help in infrastructure development for disaster management.

Way Forward

The frequency of urban disasters even after making many efforts shows that some other efforts are needed in this direction. To solve this problem, the government should make the following efforts with the cooperation of the public

- To solve this problem, it is most important that the financial empowerment of the urban local governments should be done.
- Along with this, the government should focus on planned urbanization by creating an integrated urban development plan involving urban local governments along with the Ministry of Housing and Urban Development, Ministry of Transport, Ministry of Jal Shakti, Department of Energy.
- Simultaneously, cities should move towards renewable energy sources. For example, solar parks are being set up by the government. Moving to renewable energy sources can reduce urban pollution.
- It is necessary to promote electric vehicles. The current vehicle policy of the government can prove useful in promoting electric vehicles.
- There is a need for creating inter-state coordination in river water projects. Along with this, the administration will have to show its activism towards disaster management. In this context, the National Disaster Management Authority must regularly conduct the training given to the officers every year.
- The government should implement the suggestion given by the National Flood Commission at the earliest.
- Under the Smart City project,

there is a need to implement better drainage management and watershed management in the existing cities.

- It is necessary that just as a mass

movement was carried out in the form of a Swachh Bharat Mission regarding cleanliness, in the same way, a mass movement should be launched for pollution, water con-

servation, and use of renewable energy.



Nepalese objection to widening of the road by India in Lipulekh and its intention

Context

• Recently an announcement was made by PM that India is further widening the road built in Lipulekh in Uttarakhand. In response Nepal minister asserted that territories, including Limpiadhura, Lipulekh and Kalapani East of Kali River, are an integral part of Nepal and any construction or expansion of roads thereby India must be stopped.

Lipulekh pass and its importance-

- Lipulekh sits atop the Kalapani Valley and forms a tri-junction between India, Nepal and China and has been used for centuries by Hindu and Buddhist pilgrims and tourists on their way to Kailash Mansarovar since its opening in 1982
- The Pass was never used by Nepal. The route as a trade and transit passage was legitimated by India and China through an agreement on Trade and Intercourse with Tibet signed in 1954, which stated that the traders and pilgrims from both the countries could travel by Lipulekh.
- Lipulekh is strategically located as it is nearest to the National Capital Region and can be of particular concern in case of an armed conflict with China.

• When pilgrimage to Kailash Mansarovar paused with the takeover of Tibet by Chinese forces in the mid-1950s, India deployed troops at the Lipulekh pass in 1959.

- ***In 1954, India and China signed a trade treaty, agreeing Lipulekh pass as the Indian gateway.***
- ***In 1962, India shut the Lipulekh pass fearing more Chinese incursions. Nepal is not known to have objected to its closure***

The Darchula-Lipulekh road

- The Darchula-Lipulekh road is an extension of Pithoragarh-Tawaghat-Ghatiabagarh road.
- It originates from Ghatiabagarh and terminates at Lipulekh Pass, the gateway to Kailash Mansarovar.
- On this 80 Km road, the altitude rises from 6000 feet to 17,060 feet.
- Nepal asserted that the road passed through its territory.

Importance of the wide motorable road to Lipulekh

- The road is important for “strategic, religious and trade” reasons.
- Significant for the annual Kailash Mansarovar Yatra. With the completion of this project, the arduous trek through treacherous high-altitude

terrain can now be avoided by the pilgrims of Kailash Mansarovar Yatra and the period of journey will be reduced by at least 6 days.

- The government has underlined that through this improved route, yatris do not need the alternative routes now available for the pilgrimage, one through the Nathu La border in Sikkim and the other via Nepal, which entailed “20 per cent land journeys on Indian roads and 80 per cent land journeys in China ... the ratio has been reversed. Now pilgrims to Mansarovar will traverse 84 per cent land journeys on Indian roads and only 16 per cent in China.”
- It would now be possible to complete the entire distance from Delhi to Lipulekh in 2 days
- The new road is also expected to provide better connectivity to Indian traders for the India-China border trade at the Lipu Lekh pass between June and September every summer.

Location of Kalapani region

- It is situated on the Kailash Mansarovar route. It shares a border on the north with the Tibet Autonomous Region of China and Nepal in the east and south.
- The region resembles a slice of

cake wedged in between Limpiyadhura, Lipulekh and Kalapani.

- The area is in India's control but Nepal claims the region because of historical and cartographic reasons.
- The area is the largest territorial dispute between Nepal and India consisting of at least 37,000 hectares of land in the High Himalayas.

Causes of the dispute related to Kalapani region

- The rival territorial claims over Kalapani region by India and Nepal is due to divergent views related to the source of river Kali.
- Both sides have their own British-era maps as proof of their positions.
- Maps drawn by British surveyors show the source of the boundary river at different places. This discrepancy in locating the source of the river led to boundary disputes between India and Nepal, with each country producing maps supporting their own claims.
- Nepal's case is that the river originates from a stream at Limpiyadhura, north-west of Lipulekh. Thus Kalapani, and Limpiyadhura, and Lipulekh, fall to the east of the river and are part of Nepal's Far West province in the district of Dharchula.
- India's position is that the border begins at Kalapani which India says is where the river begins. India contends that the river actually takes the name Kali near Kalapani.
- Further India holds that Kali originates in springs well below the pass, and that though the Treaty does not demarcate the area north of these springs but administrative and revenue records going back to the 19th century shows that Kalapani was on the Indian side, and counted as part of Pithoragarh district, now in Uttarakhand.

Who is in possession of the region?

- Kalapani is under the territorial



jurisdiction of India and after the British left India, it maintained a police post in Kalapani since mid-1950's.

- From 1979-80, the Indo-Tibetan Border Police (ITBP) has been manning the boundaries.
- India maintains a strict border regime to keep out criminals and control illegal cross-border activities from Nepal.

Revival of dispute over Kalapani between India and Nepal- Recent Events

- In November 2019 when India published a revised political map showing the newly created Union Territories of Jammu and Kashmir and Ladakh, the dispute over Kalapani, which lies on the easternmost corner of Uttarakhand's Pithoragarh district, between Nepal and India was revived.
- In the new political map of India all other boundaries except that of Jammu and Kashmir and Ladakh remained as has always been shown since 1947.
- Nepal raised an objection to the map while asserting claim over Lipulekh pass, Limpiyadhura pass and Kalapani along with Gunji, Nabi and Kuti villages.
- Both India and Nepal claim Kalapani as an integral part of their territory - India as part of Uttarakhand's Pithoragarh district and Nepal as part of Dharchula district.
- Meanwhile India inaugurated the

Darchula-Lipulekh pass link road, cutting across the disputed Kalapani area which is used by Indian pilgrims to Kailash Mansarovar.

- In 2020 Nepal released a new political map that claims Kalapani, Limpiyadhura and Lipulekh of Uttarakhand as part of Nepal's territory. The new map with the aforementioned territory was unanimously passed by Nepal's Parliament. The area of Susta (West Champaran district, Bihar) can also be noted in the new map.
- Currently, India and Nepal have border disputes over
 - o Kalapani- Limpiyadhura- Lipulekh trijunction between India-Nepal and China and
 - o Susta area (West Champaran district, Bihar).
- Lipulekh pass was opened for trade in 1992.

Lipulekh agreement between India and China

- In 2015 Lipulekh agreement between India and China renewed India's Mansarovar pilgrimage connection.
- Neither side consulted Nepal or sought its opinion before that agreement that boosted pilgrimage and trade to Tibet.
- This means that till very recently China has recognised Lipulekh as part of India.

Conclusion

- Although the Government of India's position on the India-Nepal boundary is well known, consistent and unambiguous, yet given the

fact that as close neighbours, India and Nepal share a unique relationship of friendship and cooperation characterized by open borders and deep-rooted people-to-people con-

tacts of kinship and culture, they should try to resolve the boundary dispute through diplomacy and dialogue.



Government Response Awaited on Law on Inter-Faith Marriages

Why in News?

Special Marriage Act (SMA), 1954 which governs inter-faith marriages in the country is being challenged for endangering the lives of young couples who seek refuge under it. Its more than a year and the government is yet to submit its response of the writ petition which was moved before the Supreme Court, seeking striking down of several of its provisions. Delhi High Court in August 2021 warned the SDM with a contempt notice for disregarding a 2009 order of the court requiring marriage officers to not dispatch notices to the families of the couple seeking to marry under the SMA

Inter-faith Marriage:

- Interfaith marriage, sometimes called a "mixed marriage", is marriage between spouses professing different religions. For individuals who choose interfaith marriage, love is their sole motivation and relationship is generally viewed in terms of individual compatibility. The right to marry is a part of the right to life under Article 21 of the Indian Constitution, it is a universal right and it is available to everyone irrespective

of their gender. A forced marriage is illegal and is invalidated in different personal laws on marriage in India, with the right to marry recognized under various religious laws. The Special Marriage Act, 1954 (SMA) was enacted to facilitate the marriage of couples professing different faiths, and preferring a civil wedding. The proportion of inter-religious marriages is highest at 2.8 % among the women of the young age group (15-19) than other age groups which decrease with increasing age at marriage with 2.3 % for those in the age group 20-24, 2 % for 25-29 and 1.9 % for those above 30

Special Marriage Act of 1954:

The law allows the solemnization of marriages without any religious customs or rituals. The law solemnizes marriages by the way of registration. Allahabad High Court observed the Special Marriage Act as 'one of the earliest endeavors towards Uniform Civil Code.

- Application:** The Act is applicable to all Indian citizens and Indian nationals who live in abroad.
- Age:** The marriage of any two persons may be solemnized under the

SMA, subject to the man having completed 21 years of age and the woman 18.

- Consent:** Neither should have a spouse living; both should be capable of giving valid consent, should not suffer from any mental disorder of a kind that renders them unfit for marriage and procreation.

- Liability:** They should not be within the degrees of prohibited relationship — that is, they should not be related in such a way that their religion does not permit such marriages

- Registration:** Parties to an intended marriage should give notice to the 'marriage officer' of the district in which one of them had resided for at least 30 days.

- Objections:** Any person can object to the marriage within 30 days of the publication of the notice on the ground that it contravenes one of the conditions for a valid marriage.

- Publication:** The notice will have to be entered in a 'Marriage Notice Book' and a copy of it displayed at a conspicuous place in the office. The Notice Book is open for inspection at all reasonable times without a fee.

- Inquiry and approval:** The marriage officer has to inquire into

the objection and give a decision within 30 days. If he refuses permission for the marriage, an appeal can be made to the district court. The court's decision will be final.

- **Severance from family:** Also, the Act says that when a member of a Hindu undivided family, gets married under SMA, it results in his or her "severance" from the family.

Issues related to the SMA law:

- **Practical Difficulties:** The provisions relating to notice, publication and objection have rendered it difficult for many people intending to solemnize inter-faith marriages.
- **Vulnerable to coercive tactics of the family members:** The objection provision may be used by the family members objecting to the union to seek to stop the marriage by coercion.
- **Danger posed by fringe groups:** There have been reports of right-wing groups opposing to inter-faith marriages. And misusing these data for communal propaganda.
- **Intrusion of Privacy:** The public notice provision places a question mark on the safety and privacy of those intending to marry across religions.
- **Pushes for religious Conversion:** Due to complexities involved in SMA, the intending couple finds it easier to settle for marriage under the personal law of one of them, with the other opting for religious conversion. While conversion to Christianity and Islam has formal means there is no prescribed ceremony for conversion to Hinduism.
- **Violation of right to Equality:** In the question of Hindu and Muslim marriage laws, there is no requirement of prior notice and therefore such a requirement in SMA is considered as violation of right to equality of those opting for marriage under SMA.



- Conflict with Anti-Conversion Laws passed by a few States.

Judicial pronouncement regarding interfaith marriages and forcible conversions:

- The Rev Stanislaus vs Madhya Pradesh case: Supreme Court said Article 25 does provide freedom of religion in matters related to practice, profess and propagate, but the word propagate does not give the right to convert and upheld the laws prohibiting Conversion through force, fraud, or allurement.
 - o Based on the above case it is clear that forcible conversion or conversion through fraud and allurement is against the Right to Freedom of Religion.
- **Sarla Mudgal case:** The court had held that the religious conversion into Islam by a person from non-Islamic faith is not valid if the conversion is done for the purpose of polygamy.
- **Lily Thomas case:** In this case Court observed that marrying another woman after converting to Islam is punishable under the bigamy laws.
- **Hadiya Case:** Supreme Court said that the right to marry a person of one's choice is integral to Article 21 (right to life and liberty) of the Constitution.
- Allahabad High Court, in the case, Noor Jahan Begum @ Anjali Mish

ra and another vs. State of U.P. and Others observed that one shouldn't change one's faith just for the sake of matrimony. As two persons professing different religions can marry under the Special Marriage Act.

- But in the most recent judgment, Allahabad High Court itself overturned its previous judgment, calling the decision "bad in law". The division bench of the Allahabad high court said on November 11, that judgment does not take into account the right to life and personal liberty of mature adults.

Conclusion

Marriage is an extremely personal affair. The right to marry a person of one's choice or to choose one's partner is an aspect of constitutional liberty as well as privacy. The issue of conversion can be resolved by actually agreeing to not convert. Marriage done solely for the purpose of conversion and conversion by misrepresentation, force, fraud, undue influence, inducement, allurement should be discouraged. In short, we should be focusing on dismantling the barriers of religion, caste and other divisions rather than bring up more barriers in these endeavours as is the attempt now.

समाजवाद

SOCIALISM

The Importance of socialism growing stronger in the world

Introduction:-

In the present world, where on one hand the capitalist ideology is gaining its intensity and the concentration of wealth is increasing rapidly on the global level, on the other hand, there have been many such incidents in the world in recent times which have increased the credibility of the socialist concept. In fact, with the end of the Cold War in 1991, communism and socialist ideology had disappeared, which are now being reactivated on the global stage. Important international conditions that increased the credibility of the socialist concept

Retardation of globalization:-

- Globalization, which has been established as a key instrument of the global economy after 1991, has loosened up after the global economic downturn in 2008. As a result of many challenges like Brexit, WTO dispute, protectionism, America and Western countries became disillusioned with globalization. Although at present China is strongly supporting globalization, even after this the pace of globalization has slowed down.

Corona pandemic

- The influx of foreigners has also been one of the most responsible factors for the rapid spread of the epidemic of compassion. There was an increase in transnational activities

due to the movement of goods and services, due to which the infection spread from one country to another.

- On the other hand, after the rise of the corona pandemic, where private health institutions gave priority to their protection by leaving patients on their own, the priority of public health workers was the safety of patients. A huge amount was spent by the public sector to recover from the health expenditure during Corona and the damage caused to the economy by Corona. A self-reliant India, an economic package of 20000 crores, was announced by India alone to come out from the economic impact of Corona.

- An estimated \$16 trillion in emergency public spending was spent globally to tackle the pandemic and run the economy during the pandemic.

Chile's election

- Presidential elections were held in Chile some time ago. In these elections, with the concept of communism and the public welfare state, Gabriel Borish won 56 percent of the votes in the presidential election and registered a historic victory by defeating the moderate candidate José Antonio.

Oxfam's Inequality Kills Report

- According to this report, the wealth of the world's 10 richest peo-

-ple has doubled. While the income of more than 99% of the population has come down. The 10 richest people in the world have more wealth than the poorest population of 3.1 billion.

- The central sentiment of the report is that the problem of inequality is punishable by death for socially, economically, and politically disadvantaged sections. Along with this, this report is opposing the concentration of wealth and recommends its equitable distribution, which is a major principle of socialism.

Growing inequality

- The Global Inequality Report states that the world's poorest 50% of the population receives only 8% of global income. Whereas 10% of the rich get 52% of the global income. The Middle East and North Africa are among the most unequal in the world.

Environmental problem

- At present the whole world is facing climate change. It is well known that the indiscriminate profit race after the industrial revolution has made the environment prone to danger. Therefore, the general public is in favor of continuing this blind profit-oriented race with environmental balance, which will require strict regulation.

What is socialism

Socialism is a popular socio-political and economic philosophy of the modern era. There is a voice of a large section against individualism, capitalism, the concentration of wealth, and the tendency to limit the scope of work of the state.

Socialism has been defined by some philosophers as follows

- **According to Bertrand Russell**, if we take socialism to mean community ownership of land and property, then we will be closest to its essence.
- **According to Laski**, socialism is an ideal as well as a means. Its ideal is to establish a society where social control over the means of production and distribution leads to the elimination of various social classes. To achieve this ideal, it respects the social revolution, as a result of which the dictatorship of the proletariat can be established.
- **According to Acharya Narendra Dev**, the aim of socialism is to establish such a classless society in which there is no exploiter nor any exploited, but the society is a collective organization of individuals built on the basis of the cooperative.

Important features of socialism

On the basis of the above definition, some features of socialism have been indicated, which are described as follows.

- Socialism opposes capitalism and it wants the abolition of capitalism as soon as possible. Socialism considers capitalism as a factor of inequality in society and also considers it as a catalyst of class differences. That is why socialism demands the repeal of capitalism.
- Socialism is opposed to individual property. According to socialism, a person possessing personal wealth neglects the common interests of society in order to increase his

wealth.

- Socialism is opposed to competition in the economic field. According to socialism, the destruction of the competition economy gives rise to anti-social tendency and mutual animosity and the goal of equality can never be achieved by following the path of competition.
- In the concept of socialism, the ownership of land and material means of production has been talked about in the whole society. It exempts the minimum personal property for personal consumption but provides that this minimum personal property cannot be used in any way for the exploitation of others.
- Socialism also denies the concept of communism which denies the existence of the state. Socialist ideology accepts the existence of the state for the benefit of society.
- In the system of socialism, labor is placed at the center of the economy. According to socialism, one who does not work has no right to eat (One Who Didn't Work, Shall Not Eat).
- Socialist ideology gives more importance to equality than freedom.
- Socialism refutes Marxism's concept of class struggle.
- Socialism supports the concept of democracy in governance and welfare state in state policy.
- Socialism believes in the purity of the ends as well as the purity of the means. Along with this, it tries to achieve its goal under the democratic governance system by constitutional and peaceful measures.

Critique of socialism

- The principle of socialism is only concerned with the economic and material life of the individual. It is silent about the life of the individual.
- Socialism considers the individual as the means and the society as

the end, due to which the individual interest is neglected.

- The concept of socialism calls for an increase in the jurisdiction of the state. This growth sometimes empowers the bureaucracy and the governing authority so much that it starts exploiting the common people, so this concept does not fulfill the real goal of socialism.
- Socialism is an obstacle in the independent development of the individual, in which many restrictions would be imposed in the name of social interest.
- Socialism talks about economic equality while the basic philosophy of equality implied that economic equality is impossible. The state, society, or other systems can only give equality of opportunity to make economic progress.

Socialism in India

The challenges arising out of the Covid-19 pandemic have increased the public welfare role of the state.

Socialism in Indian Constitution

Fundamental socialist elements like "socio-economic-political justice" were present in the Preamble of the Indian Constitution. In addition, the following socialist provisions have been made under the Directive Principles of State Policy described in Part 4.

- **Article 38:** Ensuring socio-economic justice, reducing inequalities of facilities and opportunities.
- **Article 39:** To prevent the accumulation of material resources, to provide equal pay for equal work to both men and women.
- **Article 41:** To make provision for access to public services for the old, the unemployed, and the handicapped.
- **Article 42:** Ensuring safe human conditions at work

- **Article 43:** Ensuring a living wage for all workers
 - **Article 47:** Raising the nutritional status and standard of living of the people
 - In the year 1976 by the 42nd Constitutional Amendment, the word socialism was added to the Preamble of the Indian Constitution.
- "The Supreme Court has considered socialism to be a part of the basic

structure of the Constitution. But the Supreme Court has clarified that the socialism described in the Preamble of the Indian Constitution does not refer to any political ideology, but to a welfare state."

Conclusion

Globally, inequality is increasing very rapidly. The pace of this inequality intensified after the Corona epidem-

ic. Before this increasing inequality takes the form of public outrage, efforts will have to be made to reduce this inequality. Socialism can be a better option to solve inequality through the democratic method, that is why the thinking on the concept of socialism is being restarted at the global level.



ध्येय IAS
most trusted since 2003



DSC
DHYEYA SCHOOL OF COMPETITION
A unit of Dhyeya IAS

UPPSC MAINS BOOSTER 2022

TEST SERIES PROGRAMME

TOTAL TEST

06

FULL GS TEST

04

GENERAL HINDI

01

ESSAY

01

DHYEYA EDGE

- ☑ Time bound (12 Days) evaluation by experts close to real evaluators of UPPSC.
- ☑ Personalised interactive discussion by subject experts on one-on-one / Group discussion basis through online mode.
- ☑ Proper feedback on weakness, strength and scope of improvement.
- ☑ Bilingual Model answer of each question would be provided after the test.
- ☑ To develop the understanding of current UPPSC pattern and coverage of entire syllabus.
- ☑ To develop Answer-Writing Skills among candidates.

Fee Structure

For Offline Mode

For Dhyeya Students & those who have purchased our test series (Except Express test)

Rs. 3,500/- (Including GST)

For Other Students

Rs. 4,500/- (Including GST)

For Online Mode

Rs. 2,800/- (Including GST)

Call : 9205274741 / 42 / 44




dhyeyaias.com



SHORT ISSUES

NATIONAL

1

Amar Jawan Jyoti merged with National War Memorial

Recently, the Amar Jawan Jyoti, located at India Gate in Delhi for the last 50 years, was merged with the National War Memorial Jyoti on January 21 in a ceremony. The event was presided by Chief of Integrated Defense Staff Air Marshal Balabhadra Radha Krishna. The opposition has opposed this move.

India Gate was inaugurated in the year 1931 in honor of 70 thousand soldiers of Indo-UK who sacrificed their lives in the World War. Amar Jawan Jyoti was established after the Indo-Pak War in 1971. It was inaugurated on 26 January 1972 by the then Prime Minister Indira Gandhi. The National War Memorial was constructed by the Central Government in the year 2019. It was built in honor of 26,466 Indian soldiers who have been martyred since the country's independence in 1947. The memori-

al was inaugurated by Prime Minister Narendra Modi on 25 February 2019. There are 4 chakras named Amar Chakra, Vir Chakra, Tyag Chakra and Raksha Chakra in this mortal. There is a 15.5 meter high memorial pillar on the Amar Chakra in which the Amar Jyoti kindled. There are 600 trees in the Suraksha Chakra which represent the soldiers deployed in the defense of the country. Bronze statues of 21 Param Vir Chakra awardees have also been made near the National War Memorial.

On this decision, the government said that tribute was paid to the martyrs of 1971 and other wars through the flame of Amar Jawan Jyoti, but there is no name and address of many martyrs at that place. The names inscribed on the India Gate are only of a few martyrs who fought for the British in the First World War

and the Anglo-Afghan War. Thus, it is a symbol of our colonial past, while the National War Memorial houses the names of all the Indian martyrs of the wars including 1971, before and after. Therefore paying tribute to the martyrs there, is a true tribute. However, the government is facing criticism from the opposition on this issue. Many opposition parties say that the government is insulting the martyrs by extinguishing the Amar Jyoti burning for the brave soldiers. The government clarified that there are many misunderstandings regarding the merger of Amar Jawan Jyoti with the flame of the National War Memorial. The Amar Jawan Jyoti is not being extinguished, but it is being merged with the Jyoti lit at the National War Memorial.

2

India's first District Good Governance Index launched in Jammu and Kashmir

The concept of one nation, one symbol and one constitution gained momentum after the removal of Article 370 and Article 35A in Jammu and Kashmir. Jammu and Kashmir is now moving towards a new path of development. For the development of Jammu and Kashmir, the central government has started many important projects in the last 3 years. The Central Government has decided to launch the Good Governance Index in Jammu and Kashmir which was launched by the Home Minister of India Amit Shah

on 22 January. Union secretary of the Department of Administrative Reforms and Public Grievances B. Srinivas has handed over the first copy of "District Good Governance Index" for Jammu and Kashmir to Jammu and Kashmir Chief Secretary Arun Kumar Mehta and it has also been formally released by the Home Minister of the country.

Addressing the program, Home Minister Amit Shah said, 'Delimitation has started and elections will be held soon. I have given an assurance in

the Lok Sabha that as soon as the situation in Jammu and Kashmir becomes normal, the statehood will be given back to Jammu and Kashmir. A record number of tourists came to Jammu and Kashmir this year. People are getting direct benefit of the government scheme.

It has been decided to make Jammu and Kashmir the first Union Territory in the country to issue Good Governance Index at the district level.

The District Good Governance Index (DGGI) is based on the Good Governance Index 2021 launched on 25

December 2021.

The District Good Governance Index (DGGI) of Jammu and Kashmir is an initiative to assess the state of governance in the districts of Jammu and Kashmir with 58 indicators distributed across 10 sectors.

The Central Government will set up District Good Governance Index (DGGI) in Kashmir and the Depart-

ment of Administrative Reforms and Public Grievances (DARPG) will carry out this task in collaboration with the Government of the Union Territory.

The framework for the proposed index has been finalized in technical collaboration with the Center for Good Governance (CGG), Hyderabad. The DGGI framework has 58 indicators drawn from various

aspects of development and covers all 10 sectors such as agriculture and allied sectors, commerce and industry, human resource development, public health, public infrastructure and utilities, economic governance, welfare and development, public security and judiciary and citizen-centered governance.

INTER-NATIONAL

1 NATO-Russia Talks as Tensions Rises on Ukrainian Border

Recently the Geneva talks between the United States and Russia over NATO's expansion and over Russia's troop build-up on its border with Ukraine remained inconclusive. The NATO-Russia Council (NRC) convened on 12th January, 2022 in Brussels for the first time since July 2019. The talks were held in the backdrop of rising tensions due to mobilisation of about 100,000 Russian troops along Russia's border with Ukraine.

Ukraine Issue?

Ukraine shares borders with both the EU and Russia, but as a former Soviet republic it has deep social and cultural ties with Russia, and Russian is widely spoken there. Russia has long resisted Ukraine's move towards European institutions and it is now demanding it never joins NATO. It was when Ukrainians deposed their pro-Russian president that Russia moved in, seizing, then annexing Ukraine's southern Crimean peninsula. Russian-backed separatists then captured large swathes of Ukraine's two eastern regions collectively known as the Donbas.

Current situation at the Ukrainian border

Russia is accused of amassing 100,000 combat-ready troops just across Ukraine's eastern border. Ukraine has been fighting a pro-Moscow insurgency in two breakaway regions since the Russian annexation of Crimea in 2014. This was the first time since WWII that a European nation had annexed territory from another country. The region that Russia annexed in 2014 is now under Russian-backed separatists and even today fighting continues there.

Why Russia opposes NATO's further expansion into Eastern Europe?

The source of Russia's staunch opposition to NATO is its deep insecurity. After the disintegration of the Soviet Union in 1991 a substantially weakened Russian Federation saw NATO's continued expansion into Eastern Europe as a violation of the post-Cold War consensus. Russia responded militarily in 2008 when Georgia was considering joining NATO, and in 2014, it took Crimea from Ukraine after the pro-Russian regime in Kiev was toppled by protests.

Deadlock between Russia and Western powers

USA has publicly stated that it won't shut NATO's door on potential future members. Further, the West sees Russia as an aggressive, abrasive and destabilising giant that breathes down the neck of Europe.

What does the meeting mean for Russia-West relations?

Talks held on January 12th represented a "limited success" for Russia. However, the fact that all 30 NATO states came together with Russia is very significant, because the NATO-Russia council body — created to have such kind of dialogue — has been dead for almost two and a half years. Since annexation of the Crimean peninsula in 2014, Russia has been essentially isolated on the international stage. NATO expressing willingness to reestablish missions in Moscow and Brussels, as well as schedule more talks, is a positive sign for Russia.

Conclusion

Russia is still battling with the economic costs of his Crimea annex

ation, which has left a wide chasm in Russia's ties with Europe. Further aggression on Ukraine might serve his tactical interests but could leave

a deadly blow to any plan to bring the Russia-Europe ties back on track. A war is in nobody's interests. Russia and the West should keep that

in mind when they sit down for the next round of talks.

ENVIRONMENT

1 Kerala launches Asia's largest "Bird Atlas"

The South Indian state of Kerala has launched its first Scientific Bird Atlas. This bird atlas is Asia's largest bird atlas in terms of geographic extent with coverage of 25,000 checklists. Kerala Bird Atlas is the first state-level bird atlas of its kind in India, under which solid baseline data has been prepared to know where different species of birds are found, in which areas their population is high or Low? This atlas covers all the major bird habitats. It has been designed as a citizen science-driven exercise in which 1000 volunteers from the bird watching community participat-

ed. This bird atlas has been prepared by conducting two bird surveys every year in the wet and dry seasons, from July to September and January to March respectively, between 2015 and 2020.

The Kerala Bird Atlas contains about three lakh records of 361 species. There are 94 very rare bird species, 103 rare species, 110 common species, 44 very common species and 10 abundant species.

A provision of 4000 grids has been made under this atlas for the assessment of birds. In Research, it has also

been found that the number of birds is found to be higher in the dry season as compared to the wet season whereas species richness and species evenness is more in northern and central districts of Kerala than in southern cities.

The survey was conducted in all the 14 districts by using the e-Bird platform and technological tools like Locus free which is an Android GPS application, so that the survey and documentation could've in a seamless manner.

2 India State of Forest Report (ISFR) 2021

Minister for Environment, Forest and Climate Change, has today released the 'India State of Forest Report 2021' prepared by the Forest Survey of India (FSI) which has been mandated to assess the forest and tree resources of the country.

India State of Forest Report-

India State of Forest Report (ISFR) is a biennial publication of Forest Survey of India (FSI) an organization under the Ministry of Environment Forest & Climate Change Government of India. The report is published by the Forest Survey of India (FSI) which has

been mandated to assess the forest and tree resources of the country including wall-to-wall forest cover mapping in a biennial cycle. Starting 1987, 17 assessment have been completed so far. ISFR 2021 is the 17th report in the series. In the current report, FSI has introduced a new chapter related to the assessment of forest cover in the tiger reserves, corridors, and lion conservation area of India.

Key findings of ISFR 2021:

Some key findings of this year's assessment include the following:

Forest and tree cover:

- According to the report, India's total forest and tree cover is now spread across 80.9 million hectares, which is 24.62 per cent of the geographical area of the country.
- The total tree-and-forest cover in the country includes an increase of 1,540 square kilometres of forest cover and 721 sq km of tree cover compared to the 2019 report.
- The top five states in terms of increase in forest cover are Andhra Pradesh (647 sq km), Telangana (632 sq km), Odisha (537 sq km), Karnataka (155 sq km)

and Jharkhand (110 sq km).

- The gain in forest cover or improvement in forest canopy density may be attributed to better conservation measures, protection, afforestation activities, tree plantation drives and agroforestry
- Area-wise, Madhya Pradesh has the largest forest cover in the country followed by Arunachal Pradesh, Chhattisgarh, Odisha and Maharashtra.
- The report also added that the north-east did not show positive results as the current assessment showed a decrease of forest cover to the extent of 1,020 sq km in the region.
- Arunachal Pradesh lost the maximum forest cover of 257 sq km, followed by Manipur which lost 249 sq km, Nagaland 235 sq km, Mizoram 186 sq km and Meghalaya 73 sq km.
- The report said 17 states/UTs

have above 33 per cent of the geographical area under forest cover.

- Out of these states and UTs, Lakshadweep, Mizoram, Andaman & Nicobar Islands, Arunachal Pradesh and Meghalaya have more than 75 per cent forest cover, while 12 states/UTs (Manipur, Nagaland, Tripura, Goa, Kerala, Sikkim, Uttarakhand, Chhattisgarh, Dadra & Nagar Haveli and Daman & Diu, Assam, Odisha) have forest cover between 33 per cent to 75 per cent.
- The Kanha to Navegaon-Nagzira-Tadoba-Indravati corridor has the highest area under 'Very Dense Forest' comprising 857.65 sq km.
- It also has the highest area under 'Moderately Dense Forest' at 882.87 sq km. The Pench-Satpura-Melghat corridor has the highest area under 'Open Forest' at 392.25 sq km.
- The Ranthambore-Kuno-Shivपुरi-Madhav tiger corridor in Rajasthan

and Madhya Pradesh has the highest area under scrub at 15.68 sq km.

Mangrove:

- Total mangrove cover in the country is 4,992 sq km.
- It also recorded an increase of 17 sq km in mangrove cover in the country as compared to the previous assessment of 2019.
- Top three states showing mangrove cover increase are Odisha (8 sq km) followed by Maharashtra (4 sq km) and Karnataka (3 sq km).

Carbon Stock:

- According to the report, the total carbon stock in the country's forest is estimated to be 7,204 million tonnes and there is an increase of 79.4 million tonnes in the carbon stock of the country as compared to the last assessment of 2019.
- The annual increase in the carbon stock is 39.7 million tonnes.

3

Red Sanders included in Endangered List

Recently, the red sander, which was listed as near threatened in the IUCN Red Data List, has now been put on the endangered list. This decision has been taken by IUCN.

It is the most smuggled wood in India which is found only in the hilly region of Seshachalam and some of its adjoining areas in the world. The regions of Andhra Pradesh and Telangana are its native place, i.e. it is endemic to this region. Its smuggling continues in Seshachalam Hills and Nallamala Hills.

This wood is found in Palkonda, Cuddapah, Chittoor, Anantapur, Prakasam, Nellore areas. The cost of a 1-ton red sander in the black market is 15 to 30 lakhs. Red Sander is a non-fragrant variety of sandalwood. It is an example of a dry deciduous

forest.

Red sander is used to make medicines, cosmetics, musical instruments (in Japan), furniture, and as an aphrodisiac.

It is found at an altitude of 500 feet to 3000 feet. Red sander wood takes 20 to 25 years to be in use. Its smuggling is happening on a large scale in China, Japan and South-East Asian countries.

India has also taken the help of Interpol to deal with the smugglers of Redsanders as smugglers are engaged in smuggling this rare wood from India to Sri Lanka, Nepal, Singapore, Myanmar. The Crime Investigation Department i.e. CID which is the nodal agency of Interpol in Andhra Pradesh has also made efforts to

have a cooperative tie-up with Interpol on this issue. Interpol has also issued a red corner notice for such smugglers. Apart from this, Andhra Pradesh had also formed the Red Sanders Anti-Smuggling Task Force to stop the illegal smuggling of it.

NOTES

Air India has cancelled a number of its long-haul flights to the United States, including on the Delhi-New York-Delhi, Delhi-San Francisco-Delhi, Delhi-Chicago-Delhi and Mumbai-Newark-Mumbai sectors, from January 19 until further notice. The cancellations come in the wake of concerns over the implementation of fifth generation (5G) mobile communications networks in the C-band, the frequency band that is allocated for commercial telecommunications via satellites.

Flights to the United States from India were briefly suspended after the Federal Aviation Administration warned that the rollout of new 5G technology could potentially lead to interference with on-board instruments. Besides AI, US-based American Airlines and Delta Airlines operate direct flights between the countries. These carriers, too, cancelled their flights. The deployment of 5G by AT&T and Verizon, two of the biggest wireless communications service providers in the US, has triggered concern among airlines, who have said that the frequencies used by the telecom companies is very close to the frequencies used by onboard instruments such as radar altimeters, which operate in the 4.2-4.4 GHz range. According to industry experts, there are chances of interference of the two bands : as telecom service operators, in order to extract the full value of 5G and give customers the best experience, push operations to the highest band possible. Altimeters too need to operate at higher frequencies in order to get

the most accurate readings possible. 5G is the 5th generation mobile network. It is a new global wireless standard after 1G, 2G, 3G, and 4G networks. 5G enables a new kind of network that is designed to connect virtually everyone and everything together including machines, objects, and devices. 5G wireless technology is meant to deliver higher multi-Gbps peak data speeds, ultralow latency, more reliability, massive network capacity, increased availability, and a more uniform user experience to more users. Higher performance and improved efficiency empower new user experiences and connects new industries.

5G is based on OFDM (Orthogonal frequency-division multiplexing), a method of modulating a digital signal across several different channels to reduce interference. 5G uses 5G NR air interface alongside OFDM principles. 5G also uses wider bandwidth technologies such as sub-6 GHz and mmWave.

The concerns are confined to the United States. It's not a global or European issue. It's really an issue specific to the use of 5G and its rollout in the United States in terms of frequency bands and power. US is having trouble with 5G deployment whereas countries like France and Japan have managed to evade the same issue. So US has to learn from other countries like. In Europe, 5G networks were given C-Band frequencies ranging between 3.4 and 3.8 GHz, thus providing more distance to those used by aircraft. So U.S can also use these C-Band fre-

quencies. In France, buffer zones were created around 17 large airports, restricting the strength of 5G signals and ensuring mobile base station antennas do not broadcast upwards. In the US, the buffer zones will only protect and not interfere with the last 20 seconds of flight while in France, the last 96 seconds of flight are not interfered with. The 5G power levels in the US are 2.5x higher than in France, making signal interference a problem, while the French government has also made it necessary for the 5G antenna to be tilted downward to limit "harmful interference", unlike in the US.

In India, where 5G is yet to be rolled out, the frequency range for 5G telecoms operations is pegged around 3.3-3.68 GHz. It is learnt that the Federation of Indian Pilots has, in its meetings with the Department of Telecommunications (DoT), expressed concern about the frequencies being close together. The DoT however, assured them that there would be no interference as the frequencies for commercial 5G services were at least 530 MHz away from those used by altimeters



2 A 'rare' opportunity for India i.e. Rare Earth Elements

Since the outbreak of Covid pandemic, supply chain resilience has gained prominence. Recent chip shortage that severely affected the global supply chain of several high tech products further has hastened urge for supply chain diversification of key inputs and Rare Earth Elements (REE) are on the top priority.

The rare-earth elements (REE), also called the rare-earth metals or (in context) rare-earth oxides, or the lanthanides. The rare earth elements (REE) are a set of seventeen metallic elements. These include the fifteen lanthanides on the periodic table (cerium (Ce), dysprosium (Dy), erbium (Er), europium (Eu), gadolinium (Gd), holmium (Ho), lanthanum (La), lutetium (Lu), neodymium (Nd), praseodymium (Pr), promethium (Pm), samarium (Sm), , terbium (Tb), thulium (Tm), and ytterbium (Yb)) plus scandium and yttrium. India is endowed with rich REE reserves. With almost 7 million tonnes of REE reserve, India accounts for more than 5 per cent of global REE reserves, fifth largest in the world. Production of Rare Earth Elements in World:

Application of Rare Earth Elements:

REE are crucial inputs for all high tech innovations of recent times including hybrid vehicles, cell phones, silicon chips, high strength magnets, next generation rechargeable batteries, biofuel catalysts, advance lesser guided system etc. and their global supply has remained extremely concentrated. The REE are essential raw materials for a wide range of applications, including metallurgy (metal refining and metal alloying), catalysts in the automotive and the petro-chemical industry, colouring of glass/ceramics, phos-

phors (LEDs, compact fluorescent lamps, flat panel displays), lasers, rechargeable solid state batteries (Ni-MH), fibre optics and others.

Reason for low Rare Earth Elements production in India:

India's inability to realise REE potential can mainly be attributed to passive government attitude. REE exploration and processing is fraught with financial, technological and environmental challenges and therefore needs government support in terms of clear policy and financial handholding in the initial phase of development. However, in spite recognising the importance of REE, the government failed to devise a clear policy or road map for the development of REE sector. Instead of having a separate policy for REE, government clubbed REE with atomic minerals which ensured state monopoly and kept the foreign and private domestic investors away, leading to a stagnant REE sector. Focus on few rare earth element: Ironically, IREL, which was established to produce REE, never actually focused on REE production. Instead, IREL gave more importance to thorium and other minerals such as limonite, zircon, rutile etc.

Steps for boosting REE industry in India:

- India should amend Atomic Mineral Concession Act (2016) which has reserved all beach Sand Mines deposits containing more than 0.75 per cent Monazite (source of REE) for government owned companies.
- Department for rare earths (DRE) could secure access to REEs of strategic importance by offering viability gap funding to companies

to set up facilities in the upstream sector. This could make Indian REOs globally competitive.

- The DRE will then look at deregulation of this sector and will also promote R&D in the field. Its sole focus will be on ramping up India's REE production and make India a part of the global supply chain. For this purpose supervision of IREL should also be shifted from the department of atomic energy (DEA) to the DRE, and its primary remit needs to change from atomic minerals to rare earths.

- There is also a need to look at introducing more players in the value chain and opening it up for investments. While private investments alone may not be able to suffice the upstream processing which require an enormous amount of capital investment and government financing. It is the downstream processes where a public-private approach can help attract investment and purchasers as more efficient processes are put in place.

- Government should also create an autonomous regulator, the Rare Earths Regulatory Authority of India (RRAI), to resolve disputes between companies in this space and check compliance.

- Finally, it could coordinate with other agencies to partner directly with groupings such as the Quad, building up a strategic reserve as a buffer against global supply crises.

ECONOMY

1

Inequality Kills: A study of the new Oxfam report

What is the “Inequality Kills” report?

“Inequality Kills” The unparalleled action needed to combat unprecedented inequality in the wake of COVID19” is a report released in January 2022 by Oxfam, a U.K based consortium of 21 charitable organisations that have a global presence. The report argues for sustained and immediate action to end the pandemic, address global inequality and initiate concerted measures to tackle the climate emergency.

Key highlights:

The central argument of the report is that inequality is a death sentence for people that are marginalised by social and economic structures and removed from political decision making.

A new billionaire has been created every 26 hours since the pandemic began. The world’s 10 richest men have doubled their fortunes, while over 160 million people are projected to have been pushed into poverty. Meanwhile, an estimated 17 million people have died from COVID-19—a scale of loss not seen since the Second World War.

The wealth of the 10 richest men has doubled, while the incomes of 99% of humanity are worse off, because of COVID-19. The 10 richest men in the world own more than the bottom 3.1 billion people. If the 10 richest men spent a million dollars each a day, it would take them 414 years to spend their combined wealth. It identifies “vaccine apartheid”

(unequal access to vaccines between countries) and the lack of universal vaccination programs in many countries as a cause of the emergence of multiple new strains of the coronavirus that has led to the continuation of the pandemic.

It also demonstrates how emergency government expenditure (estimated at \$16 trillion) that was meant to keep economies afloat during this crisis, inflated stock prices. This resulted in billionaires’ collective wealth increasing by \$5 trillion during the pandemic.

A 99% windfall tax on the COVID-19 wealth gains of the 10 richest men could pay to make enough vaccines for the entire world and fill financing gaps in climate measures, universal health and social protection, and efforts to address gender based violence in over 80 countries, while still leaving these men \$8bn better off than they were before the pandemic.

What Does The Report Say About India?

Report discussed India’s governance structures that promote wealth accumulation by a few and fail to provide safety nets to the rest of the population.

As per the report, the number of Indian billionaires grew to 142 in 2021 from 102 in 2020. It was when the share of the bottom 50 per cent of the population in national wealth was just 6 per cent.

And India’s top 10 per cent had around 45 per cent of the country’s

total national wealth in 2020. The report also talks about how imposing tax on the rich in India can take care of vital public services like health and education.

Likewise, imposing a 4 per cent tax on 98 wealthiest families in the country can look after the Ministry of Health and Family Welfare for more than two years, the Mid-Day Meal Programme for 17 years or the Samagra Shiksha Abhiyan for six years. Similarly, the Ayushman Bharat Scheme can be financed for more than seven years or the Department of School Education and Literacy of Government of India if 1 per cent wealth tax is imposed on 98 most affluent billionaire families in India.

The report also revealed that one-third of respondents with a ration card were not able to buy ration at a PDS outlet

Way Forward:

To tackle the growing inequality, Oxfam believes an immediate requirement to start disaggregating more public statistics by income and introduce a regular collection of data on income and wealth inequality.

Wealth from the super-rich should be redistributed to generate sources for the majority, and revenue should be generated to invest in the education and health of future generations.

—

2

National Startup Day

Recently, the Prime Minister has announced that every year on January 16, Startup Day will be celebrated in the country. In addition, 46 startups with one incubator and one accelerator were declared the winners of the National Startup Awards 2021. The winning startup founders will get a cash prize of Rs 5 lakh and a chance to present their solutions to the concerned government authorities and corporates. The Incubator and Accelerator will get Rs 15 lakh as the winning amount.

At present, there are around 60,000 startups in the country of these, 44 are unicorns. Unicorn means that the valuation of the startup is more than \$ 1 billion. Also, India is the third-largest startup ecosystem in the world. In the year 2020 alone, more than 15,000 startups were established here. This is the reason why promoting startups and their ecosystem is a priority for the government.

A startup is a company with a new idea that has started its new business. New businessmen work together on a new idea. Through this type of company, a new type of product or service is given to the customers. The Government of India has fixed certain definitions of startups such that the headquarter of such a company should be located in India; His annual income should not exceed Rs.100 crores; It should not have been more than 10 years since its inception and should have some new idea. At present, 5 sectors are witnessing maximum startup growth, which

includes cloud computing and big data, education, mobile, social media and e-commerce. The Government of India launched a Startup India initiative in the year 2016 to promote the innovation and startup ecosystem in the country. It focused on three-four key points such as facilitation and handholding, financing support and incentives, industry-academy partnership and incubation etc. The program was designed by the Department for Promotion of Industry and Internal Trade (DPIIT), Ministry of Commerce and Industry. Apart from this, several other steps have also been taken by the government to boost the startup ecosystem in India. This includes initiatives like ranking states on the basis of the startup ecosystem, SCO Startup Forum, 'Prarambh' summit, Startup India Seed Fund Scheme and Fisheries Startup Grand Challenge. However, there are still many challenges that remain in the way of realizing the true potential of startups in India. For example, issues

like regional imbalances, digital divide, funding issues and hiring of good employees, if resolved, can give further impetus to the startup ecosystem.

NOTES





1. Country's first "Digital Justice Clock"

Recently India's first digital justice clock has been inaugurated in Gujarat High Court. It was inaugurated by Supreme Court Judge Justice DY Chandra-chud in the presence of Justice MR Shah and Justice Bela Trivedi as well as Chief Justice of Gujarat High Court Arvind Kumar.

In recent times, the scope of e-facilitation has also increased in the state courts, in which other services including e-court fees are available through online digitization. Due to this the justice delivery system has become easier. There has to be a healthy balance between the use of technology and human intervention to make the experience of justice delivery systems better. Along with this, the electronic version of the Gujarat High Court e-court fees

system has also been launched in all the courts of the state of Gujarat. Thus the Gujarat High Court has become the first High Court in the country where Justice Clock has been launched.

Justice Clock means the installation of an outdoor display LED wall within the premises of the High Court and other courts of the State, in which the information about the disposal of pending cases will be continuously displayed.

2. Nusantara to be the new capital of Indonesia

Recently, the parliament of South East Asian country Indonesia has told that the capital of the country will be shifted from Jakarta to Nusantara. The new capital will be built in the jungles of Kalimantan on the island of Borneo, 2,000 km from Jakarta. Indonesia wants to move the capital away from the sinking and polluted city of Jakarta.

For this, the Parliament of the country officially passed a bill regarding the transfer of capital. The bill outlines how an assured \$32 billion will be spent to build the new capital.

President Joko Widodo said, "We want to build smart metro cities that will attract international talent and be centers of innovation." The vision document released by the government also states that the new capital will bring Indonesia into a strategic center of international trading routes, investment and technological development. The relocation of the capital to Kalimantan is based on a number of considerations, regional benefits and welfare and with a view to the emergence of a new economic center among the archipelago.



3. Medicinal plant Guggul included in IUCN Red Data List as Endangered

Guggul is a medicinal plant which has recently been included in the Red Data List of Threatened by the IUCN. It is mostly found in arid and semi-arid regions.

The botanical name of the valuable medicinal plant Guggul or Guggal is *Commiphora wheati*. It is found in abundance in the Aravalli hills of Rajasthan. Due to over-exploitation of the gum of this plant, this plant is currently placed in the Endangered category of the IUCN.

The results of the Guggul Bachao Abhiyan being implemented in Rajasthan since 2008 and the efforts of the Forest Department of the Government of Rajasthan are showing results. The number of this plant has increased in the Aravalli hills.



4. S. Somnath is the new chairman of ISRO

S. Somnath has been made the 10th chairman of ISRO. Somnath is a senior rocket scientist. He has replaced K. Sivan. He has also been made Secretary, Department of Space, Government of India. S Somnath will also be the new Space Secretary of India and Chairman of the newly formed Space Commission for 3 years. Till now S. Somnath was holding the post of Director of Vikram Sarabhai Space Center (VSSC). Prior to holding this position, he was the Director of Liquid Propulsion Systems Center (LPSC).

S. Somnath has made significant contributions in the development of high thrust semi-cryogenic engines in the field of space. His experience was use-

ful in the development of Throttle capable engines for the Chandrayaan 2 lander as well as the successful launch of the electric propulsion system in GSAT-9.

ISRO was formed in the year 1969. Space research activities in India began during the 1960s, when the applications using satellites were also in the trial stages in the United States of America. INCOSPAR (Indian National Committee for Space Research) was launched under the leadership of Dr. Sarabhai and Dr. Ramanathan. Its place was taken by ISRO in 1969.

5. BrahMos Supersonic Cruise Missile

The Philippines has signed an agreement of \$ 375 million (Rs 2,812 crore) with India for the purchase of BrahMos missiles. This deal was done at an event to be held at the Department of National Defense of the Philippines in Quezon City. Atul D Rane, CEO, BrahMos Aerospace India, Sanjeev Joshi, Deputy CEO, Lt. Col. R. Negi and Praveen Pathak were present on the occasion.

Till now India has been known as the largest importer of arms but now India will sell BrahMos supersonic missile to the Philippines Navy. This is the first foreign order to come to India for the export of BrahMos missile.

The BrahMos supersonic missile is capable of hitting three times the speed of sound i.e. at a speed of 4321 kilometers per hour.

The BrahMos deal was conceived in 2017 and the office of the President of the Philippines approved its inclusion in the Army's "Horizon 2 Priority Projects" in 2020.

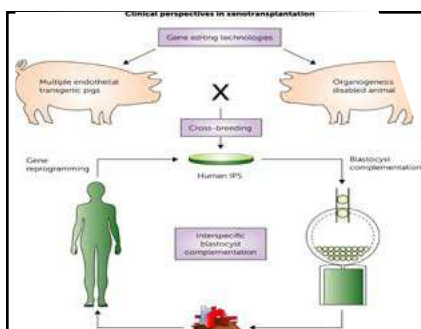


6. India's passport rank improved to 83

India's passport power has improved as compared to 2021. It is now ranked 83rd in the Henley Passport Index. It has moved up seven places from the 90th rank last year. Japan and Singapore topped the index. India shares the 83rd position with Sao Tome and Principe in Central Africa after Rwanda and Uganda.

The Henley Passport Index ranks the world's passports by their number of destinations where their holders can access without prior visa.

India now has visa-free access to 60 destinations across the world with the latest addition to Oman and Armenia. India has added 35 more destinations since 2006.



7. "Xenotransplantation"

Recently, the first time in the world, American doctors have transplant a pig's heart into a human. The process of using body parts or tissue between two different species is called "Xenotransplantation".

On January 7, doctors at the University of Maryland Medicine, USA, successfully transplanted a pig's heart into a person's body. The transplant has been done in the body of a 57-year-old man, David Bennett. This is the first such incident in the world when a pig's heart has been implanted inside a human. Because of heart failure and abnormal heartbeat, a human heart transplant was not possible in Bennett. He had no other option. The doctors

transplanted a pig's heart into his body as a last hope and it was successful. This heart is creating the same pulse and pressure inside the Bennett as the human heart. Just a few days ago, doctors in America had successfully transplanted a pig's kidney into the body of a person.

The pig whose heart was transplanted was genetically modified. For this, gene editing techniques were used. If the pig's heart had not been gene edited, it would not have been accepted by the person's body. Failure of an organ transplant can lead to many diseases for a person and there is also a danger to his life. In the 19th century, a lot of research was done in this area of xenotransplantation. Scientists tried to transplant organs ranging from rabbits, monkeys to langurs to humans, but pigs were considered the best option for this. Pig genes are very similar to humans, for example, the heart of a pig is about the size of an adult human heart. This is a significant scientific achievement in the field of xenotransplantation. After this success, the serious shortage of human organs will be overcome for organ transplant in the human body.

8. Announcement of Padma Awards

The Padma Awards are the country's highest civilian honours, which are conferred in three categories. These three categories include Padma Vibhushan, Padma Bhushan and Padma Shri. These awards are given in various disciplines/fields i.e. arts, social work, public affairs, science and engineering, trade and industry, medicine, literature and education, sports, civil service, etc. These awards are announced every year on the occasion of 'Republic Day'.

128 Padma Awards will be presented this year, including 2 in duo case (in a duo case, the award is counted as one). The list includes 4 Padma Vibhushan, 17 Padma Bhushan and 107 Padma Shri awards. Among the Padma awardees, 34 are women and 10 persons in this list fall under Foreign/NRI/PIO/OCI category and 13 persons have been given the award posthumously. CDS Bipin Rawat and Kalyan Singh and Shri Radheshyam Khemka will be awarded the Padma Vibhushan posthumously.

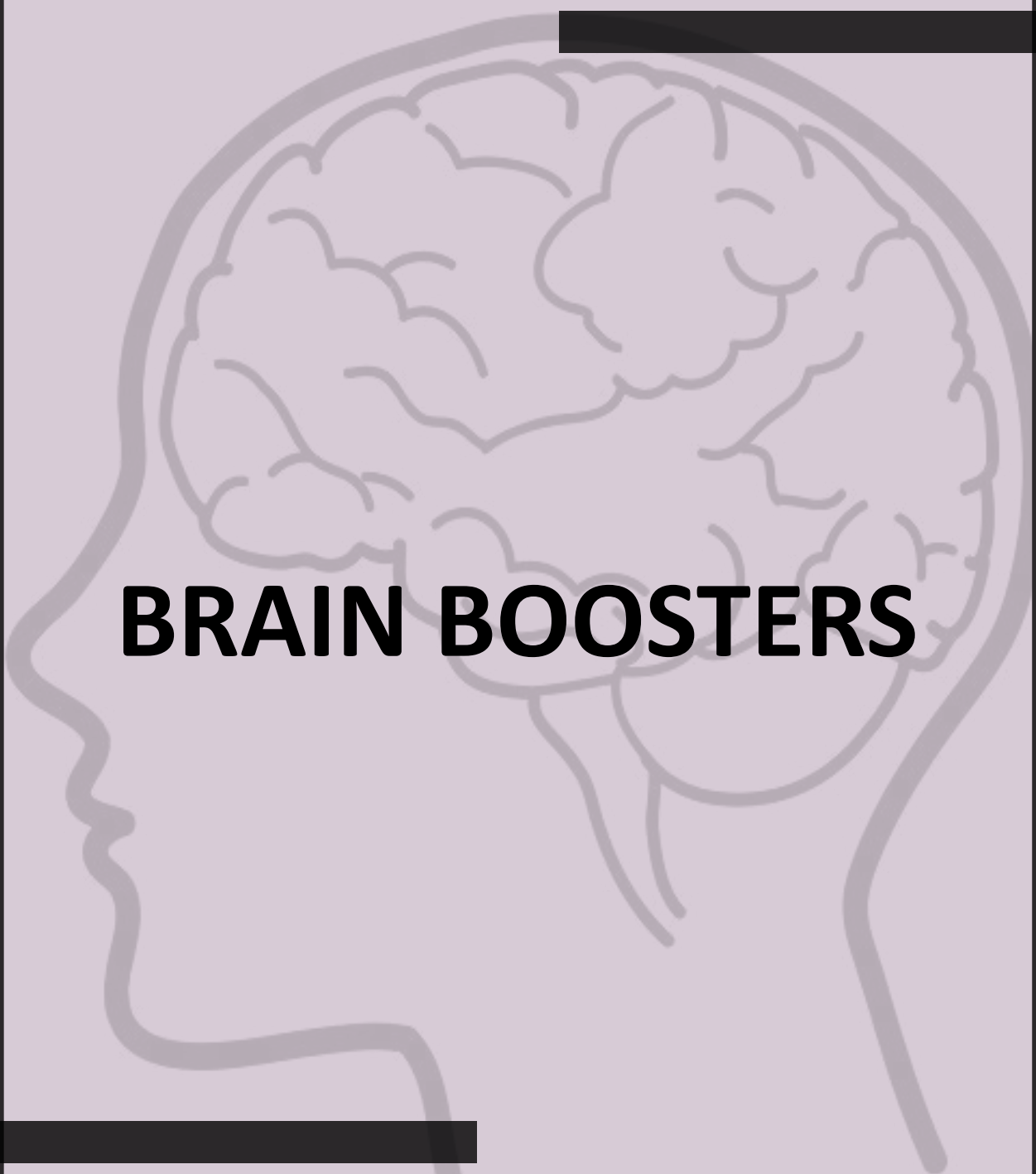
Microsoft CEO Satya Nadella, Alphabet CEO Sundar Pichai, Congress leader Ghulam Nabi Azad, late folk singer Gurmeet Bawa, Union Home Secretary Rajiv Mehrishi, Serum Institute of India founder Cyrus Poonawalla, Bharat Biotech Chairman Krishna Ella and Bharat Biotech co-founders Founder Suchitra Ella, former West Bengal Chief Minister Buddhadeb Bhattacharjee will be honored with the Padma Bhushan award, but Buddhadev has refused to accept the award.

107 people including playback singer Sonu Nigam, Paralympian Devendra Jhajharia, hockey player Vandana Kataria, Tokyo Olympic gold medalist Neeraj Chopra will receive the Padma Shri.



Current Affairs at a Glance

- Prime Minister Modi laid the foundation of Major Dhyan Chand Sports University in Sardhana town of Meerut.
- “Padhe Bharat” 100 day reading campaign launched on January 1, 2022.
- The central government constituted a task force for the development of 6G technology. This task force will be headed by N.G. Subramaniam .
- India won the Under-19 Asia Cup by defeating Sri Lanka at the Dubai International Cricket Stadium. This is India’s eighth Under-19 Asia Cup title.
- Foundation stone of Heartfulness International Yoga Academy was laid in Hyderabad by the Ministry of AYUSH.
- The new Director General of the National Mission for Clean Ganga will be G Ashok Kumar.
- Social activist and Padma Shri awardee Sindhutai Sapkal passed away. She was also known as ‘Anathanchi Mai’ or ‘Mother of Orphans’.
- Indian Navy’s multilateral ‘Milan’ exercise will be held in February 2022. 46 navies are expected to participate in the exercise. The member countries of the Quad (Japan, US and Australia) and the member countries of the AUKUS (UK, Australia and US) will participate in the exercise this year.
- Alka Mittal has been appointed as the CMD of ONGC. She has become the first woman to get this position.
- TRIFED and All India Vanvasi Kalyan Ashram will set up a TRIFED Park in Madhya Pradesh.
- Telangana has the highest number of open defecation free villages. Telangana is followed by Tamil Nadu and Karnataka respectively.
- Antigua and Barbuda join the International Solar Alliance.
- Founder of Shillong Chamber Choir and Padma Shri awardee Neil Nongkinrih passed away.
- Zishan-e-Latif won the Ramnath Goenka Award in the Photo Journalism category.
- Apple became the first company to touch the \$3 trillion market cap.
- Union Minister of State Jitendra Singh inaugurated India’s first Open Rock Museum in Hyderabad.
- Ministry of Home Affairs constituted a three-member committee headed by Sudhir Kumar Saxena to probe the security lapse during PM Modi’s visit to Punjab.



BRAIN BOOSTERS

1. Why in News

On December 30, China's Ministry of Civil Affairs issued "standardised" names for 15 places in the Indian State of Arunachal Pradesh. The issuing of the names came ahead of a new land border law taking into effect on January 1, 2022.

2. The New Law

- The Standing Committee of China's National People's Congress passed the law for the "protection and exploitation of the country's land border areas".
- The law says, "the sovereignty and territorial integrity of... China are sacred and inviolable". and the state needs to "take measures to safe guard territorial integrity and land boundaries and guard against and combat any act that undermines [these]".

3. The mandate

- strengthen border defence
- support economic and social development in border areas,
- improve public services and infrastructure
- encourage and support people's life
- promote coordination between border defence and social, economic development in border areas.

4. Reasons for bringing legislation by China

According to experts the reasons may be

- Beijing's renewed concerns over the security of its land border while it confronts a slew of unsettled disputes on its maritime front.
- The Covid-19 pandemic "also underscores the imperative for Beijing to exert greater control over its somewhat porous land border"
- The stability of Xinjiang bordering Central Asia, as the withdrawal of the US forces and Taliban takeover of Afghanistan has changed the geopolitical situations.
- Domestic politics is a contributing

5. Significance of the new law

- Proposed in March 2021, a year into the crisis along the Line of Actual Control, the border law, lists various responsibilities for civilian and military authorities in China to take steps to "safeguard national sovereignty".
- The law has 62 articles in seven chapters, covering delineation and border defence to immigration, border management and trade.

- The issuing of new names is related to Article 7, which calls for promoting border education at all levels of government.
- Article 22 calls for the Chinese military to carry out border drills and to "resolutely prevent, stop and combat" what it calls "invasions, encroachments and provocations".

6. Impact on India-China relations

- The view is still divided. Much depends on China's actions, regardless of the new law.
- Some experts feel the new law will make China dig its heels in the ongoing standoff as well as for resolution of the larger boundary issue.
- Others feel the new law is only a tool China government will use if it wants, as its actions have been aggressive even before this law.
- According to Brookings "Beijing appears to be signaling determination to resolve the border disputes on its preferred terms. The law sets an overall tone of resolve upfront."
- Gautam Bambawale, former ambassador to China, said the law only "states the obvious" as "every country is in the business of protecting its territorial integrity. The big question is what is your territory, and there we don't agree with each other". He said that with their actions in eastern Ladakh, "the Chinese are clearly indicating that they are tired of trying to resolve the boundary or the LAC through negotiations; they're indicating they'll do it through use of force."
- According to retired Army Major General Ashok Kumar, the new law is the "latest attempt by China to unilaterally delineate and demarcate territorial boundaries with India and Bhutan". The law has "huge implications for India. This problem requires a whole-of-nation solution. The Chinese Communist Party (CCP) has created conditions for a 'militarised solution' to the boundary issue."

China's Border Law

7. The border villages & the new law

- China has been building "well-off" border defence villages across the LAC in all sectors, which the new law encourages.
- Eastern Army Commander had said, "According to their own policy or strategy, model villages have come up near the border, for us, it is a matter of concern, how they can make dual civil and military use of these facilities and villages."
- During boundary talks these settled villages are going to weaken our position.

factor too, as President Xi Jinping's is going to secure a third term.

1. Why in New

China is building a bridge on the north bank of the Pangong Tso. The new bridge has been spotted in satellite images.

2. Location of the bridge under construction

- The bridge China is building is about 400 m long and 8 m wide, close to the friction points on the north bank of the Pangong Tso, and the Chushul sub-sector on the south bank.
- The bridge is around 20 km east (35 km by road) of Finger 8 on the north bank. In India's perception, the Line of Actual Control lies at Finger 8. The site of the bridge is within India's claim line, although the area has been under Chinese control since 1958.
- The bridge is being constructed east of an old ruin named Khurnak Fort. China, calls the area Rutong County.

3. About Pangong Tso

- Pangong Lake, situated at a height of almost 4,350m, is the world's highest saltwater lake.
- Pangong Tso is a 135-km-long landlocked lake.
- More than two-thirds are under Chinese control. The bridge is near the halfway mark.
- Pangong Lake, derives its name from the Tibetan word, "Pangong Tso", which means "high grassland lake"

4. Importance of the area

- The Fingers on the north bank have seen frequent clashes. Finger 4 was one of the first friction areas in the current standoff.
- The banks of the lake were among the most sensitive friction points in May 2020. Troops and tanks faced each other just a few hundred metres apart in some places, until the disengagement in February 2021.

5. Advantage to China

- Its main objective appears to be quick mobilisation of PLA troops between the two banks at one of the lake's narrowest points.
- The Kailash range is around 35 km west of the bridge site.
- The bridge will enable Chinese troops to simply cross over, slashing travel time to the Kailash range from about 12 hours to about four hours.

6. India's response

External Affairs Ministry spokesperson Arindam Bagchi said

- The "government has been monitoring" the bridge construction activity "closely".
- "This bridge is being constructed in areas that have been under the illegal occupation by China for around 60 years now."
- The government, "has been taking all necessary steps to ensure that our security interests are fully protected"
- As a part of these efforts the budget for development of border infrastructure has been significantly increased and more roads and bridges have been completed than ever before.
- Additional troops have been inducted, and infrastructure and billeting facilities created for 25,000 additional troops who had gone into these areas.
- In 2021, over 100 projects were completed by the Border Roads Organisation in the border areas, most of which were closer to the border with China.
- India is also improving surveillance along the border, along with building new airstrips and landing areas.

A Bridge on Pangong Tso

- India, at the end of August 2020, outmanoeuvred China to capture the previously unoccupied heights of the Kailash Range on the south bank.
- Indian troops were positioned atop Magar Hill, Gurung Hill, Mukhpari, Rezang La, and Rechin La, dominating the Spanggur Gap.
- Spanggur Gap can be used for launching an offensive, as China did in 1962—
- India had a gaining view of China's Moldo Garrison.
- Indian troops positioned themselves above the Chinese in the Finger area on the north bank too.

7. Status of the standoff

- Several friction points have been resolved. Both sides have disengaged from Patrolling Point (PP) 14 in Galwan Valley, north and south banks of Pangong Tso and PP17A near Gogra Post.
- Currently there is a platoon-sized strength of soldiers from either side at PP15 in Hot Springs.
- China has been blocking Indian troops from accessing its five traditional patrolling points in Depsang Plains — PP10, PP11, PP11A, PP12 and PP13.
- Each side has over 50,000 troops in the region, along with additional air defence assets, artillery, tanks and other weapons.



1. Why in news?

Ahead of the 46th meeting of the GST Council, the Finance Ministers of several States had a pre-Budget interaction with the Union Finance Minister and demanded the GST compensation scheme be extended beyond June 2022, when it is set to expire.

2. About GST Compensation

- With the introduction of the Goods & Services Tax (GST), States and Union Territories (with Legislature) were required to subsume their sovereignty in a GST Council.
- It raised the issue of loss of tax revenue on account of migration from Value Added Tax/Sales Tax to GST.
- Section 18 of the Constitution (101 Amendment) Act, 2016 prescribes: "Parliament shall, by law, on the recommendation of the Goods and Services Tax Council, provide for compensation to the States for loss of revenue arising on account of implementation of the goods and services tax for a period of five years."
- Parliament enacted the law, GST (Compensation to States) Act, 2017.
- Financial year 2015-16 shall be taken as the base year for the purpose of calculating compensation
- States were assured of a 14 per cent growth in revenues every year.

3. The funding

- In order to mobilise resources for compensation, a cess is being levied on such goods, as recommended by the Goods and Services Tax Council, over and above the GST on that item. It is called compensation cess.
- Compensation cess is levied on products such as pan masala, tobacco, aerated waters and motor cars apart from coal.

4. The chain of compensation

- The consumer pays the compensation.
- It is collected by the Centre which releases it to States.
- The proceeds of the compensation cess will be credited to a non-lapsable fund known as the Goods and Services Tax Compensation Fund in the public account.

- All amounts payable to the States as compensation will be released bi-monthly, provisionally, from said fund against figures given by the Central accounting authorities.
- Final adjustments will be done after receiving audited accounts of the year from the Comptroller and Auditor General of India.

5. Reason behind demanding an extension of the compensation

- Revenue situation of states have taken a hit due to
 - The introduction of the GST
 - The pandemic has affected revenue collection.
- Expenses have gone up and states are expecting a higher deficit as revenue growth is low.
- over the last five years, there had been a widening gap between the actual revenues realised and the protected revenues guaranteed.
- Due to these conditions, States are seeking an extension of compensation for five more years.

6. Shortfall for the current fiscal year

- On October 28, the Union government said the Ministry of Finance had released ₹ 44,000 crore to the States and Union Territories "under the back-to-back loan facility in lieu of GST Compensation".
- After taking into account earlier releases amounting to ₹1,15,000 crore, the total amount released in the current financial year as back to back loan in lieu of GST compensation was ₹ 1,59,000 crore.
- In September, the GST Council decided to extend the compensation cess period till March 2026 "purely to repay the back-to-back loans taken between 2020-21 and 2021-22".

GST Compensation

7. The deadline extension

- The deadline for GST compensation was set in the original legislation
- The GST Council must first recommend it and the Union government must then move an amendment to the GST law allowing for a new date beyond the June 2022 deadline at which the GST compensation scheme will come to a close.
- Even now the compensation cess will continue to be levied well beyond the current fiscal year since the borrowings made in lieu of the shortfalls in the compensation fund would need to be met.



1. Why in News

On January 3, 2022, the P-5 of United Nations Security Council i.e. China, France, Russia, U.K. and U.S., pledged to prevent atomic weapons from spreading and avoid nuclear conflict. The joint statement was issued after the latest review of the Nuclear Non Proliferation Treaty (NPT), which first came into force in 1970.

2. About NPT

- The NPT is a landmark international treaty.
- Its objective are
 - To prevent the spread of nuclear weapons and weapons technology,
 - To promote cooperation in the peaceful uses of nuclear energy
 - To further the goal of achieving nuclear disarmament and general and complete disarmament.
- The Treaty represents the only binding commitment in a multilateral treaty to the goal of disarmament by the nuclear-weapon States.
- Opened for signature in 1968, the Treaty entered into force in 1970.
- On 11 May 1995, the Treaty was extended indefinitely.
- A total of 191 States have joined the Treaty, including the five nuclear-weapon States.
- More countries have ratified the NPT than any other arms limitation and disarmament agreement, a testament to the Treaty's significance.

3. Other treaties and agreements on nuclear bans

Some other treaties are :-

- The Partial Test Ban Treaty (PTBT)
- The Strategic Arms Limitation Treaty (SALT I), which had the Interim Agreement and Protocol on Limitation of Strategic Offensive Weapons Offensive Arms,
- The Strategic Arms Limitation Treaty (SALT II),
- The Strategic Arms Reduction Treaties (I and II),
- The Comprehensive Nuclear Test Ban Treaty (CTBT),

4. Nuclear Weapon States

- Outside of the P5 (China, France, Russia, the U.K. and the U.S.),
- India and Pakistan are known to possess nuclear weaponry,
- While Israel is strongly suspected of possessing it.
- North Korea has a nuclear weapons programme but its actual possession of nuclear weapons is debated. It has a total of seven major types of long range missiles ranging from a limit of 1,500 km to 13,000 km

5. The stockpile

- China's current stockpile stands at around 350.
- France's at around 290,
- Russia's at around 6,257,
- The U.K.'s at around 225,
- The U.S.'s at around 5,600.
- The operational stockpile of Russia is about 1,600 and for the U.S. it is about 1,650.
- Pakistan possesses about 165,
- India possesses about 160,
- Israel and North Korea either possess or have enough fissile material to build approximately 90 and approximately 45 weapons respectively.
- The world's stockpile peaked during the 1980s and started to reduce considerably up until 2005.
- Since then, most of the reduction has come from the dismemberment of the retired stockpile.
- Development in technologies also means that the world keeps seeing new ways to deploy these nuclear weapons which is another worrying trend.

Nuclear Non-Proliferation Treaty

- The chequered history of nuclear weapons gives the impression that the NPT has not been entirely successful, but it hasn't been an abject failure either.
- The impetus is on the major powers to stay on the path which the NPT has paved and signal commitment through its actions towards putting an end to the arms race and hopefully complete disarmament.

VI. The Treaty on the Prohibition of Nuclear Weapons (TPNW)

6. The future

- Australia being on the road to acquire nuclear capabilities, will push other nations to work towards developing or acquiring nuclear weapons.
- This could, in principle, also reignite another arms race.
- The P5's joint statement, 'Preventing Nuclear War and Avoiding Arms Races', affirms to non-offensive uses of nuclear weapons and committing to the NPT agreement. But the wording of this statement and previous statements on arms reduction could be understood in a different light as well—to use nuclear weapons against conventional weapons if the nation feels its security to be threatened so as to merit the use of nuclear weaponry.

1. Why in News

Minister for Environment, Forest and Climate Change, has on 13 January, 2022, released the 'India State of Forest Report 2021'. The report is prepared by the Forest Survey of India (FSI) which has been mandated to assess the forest and tree resources of the country.

2. About India State of Forest Report

- India State of Forest Report (ISFR) is a biennial publication of Forest Survey of India (FSI) an organization under the Ministry of Environment Forest & Climate Change Government of India.
- The FSI has been mandated to assess the forest and tree resources of the country including wall-to-wall forest cover mapping in a biennial cycle.
- Started in 1987, 17 assessment have been completed so far. ISFR 2021 is the 17th report in the series.
- In the current report, FSI has introduced a new chapter related to the assessment of forest cover in the tiger reserves, corridors, and lion conservation area of India.

3. About Forest Survey of India

- Forest Survey of India started as an organization called Pre-Investment Survey of Forest Resources (PISFR) in 1965 as FAO/UNDP/GOI Project.
- The changing information needs resulted in enlarging the scope of activities of PISFR and it was re-organized as Forest Survey of India in 1981.

4. Forest cover

All lands more than one hectare in an area, with a tree canopy density of more than 10%, including tree orchards, bamboo, palms etc., occurring within recorded forest and other government lands, private community or institutional lands, are included in the assessment of Forest Cover.

5. Tree cover

Isolated trees and small patches of trees, which are less than one hectare in area and found outside recorded forest areas (RFA), are considered for assessment.

6. Classification of Forests

- Very Dense Forest (crown density of 70% or above)
- Moderately Dense Forest (crown density 40-70%)
- Open Forest (crown density 10-40%)
- Scrub (crown density less than 10 per cent)

7. Major findings of ISFR 2021

- India's total forest and tree cover is now 80.9 million hectares, which is 24.62% of the geographical area of the country.
- As compared to the assessment of 2019, there is an increase of 2,261 sq km in the total forest and tree cover of the country.
- The increase in the forest cover has been observed as 1,540 sq km and that in tree cover is 721 sq km.
- Increase in forest cover has been observed in open forest followed by very dense forest.
- Top three states showing increase in forest cover are Andhra Pradesh (647 sq km) followed by Telangana (632 sq km) and Odisha (537 sq km).
- Area-wise Madhya Pradesh has the largest forest cover in the country followed by Arunachal Pradesh, Chhattisgarh, Odisha and Maharashtra.
- In terms of forest cover as percentage of total geographical area, the top five States are Mizoram (84.53%), Arunachal Pradesh (79.33%), Meghalaya (76.00%), Manipur (74.34%) and Nagaland (73.90%)
- 17 states/UT's have above 33 percent of the geographical area under forest cover.
- Lakshadweep, Mizoram, Andaman & Nicobar Islands, Arunachal Pradesh and Meghalaya have more than 75% forest cover.

India State of Forest Report (ISFR) 2021

- Manipur, Nagaland, Tripura, Goa, Kerala, Sikkim, Uttarakhand, Chhattisgarh, Dadra & Nagar Haveli and Daman & Diu, Assam, Odisha, have forest cover between 33 percent to 75 percent.
- Total mangrove cover in the country is 4,992 sq km. An increase of 17 sq km in mangrove cover has been observed as compared to the previous assessment of 2019.
- Top three states showing mangrove cover increase are Odisha (8 sq km), Maharashtra (4 sq km) and Karnataka (3 sq km).
- Total carbon stock in country's forest is estimated to be 7,204 million tonnes and there an increase of 79.4 million tonnes in the carbon stock of country as compared to the last assessment of 2019. The annual increase in the carbon stock is 39.7 million tonnes.



1. Why in news?

As India is making strides to fulfil its solar dream, Loom Solar (a Start-up) and its smart methodologies shall continue to provide the Indian solar industry with much-needed assistance for 'Mission 2030'.

2. Indian's solar power

- Installed capacity of solar energy in India has increased by more than 18 times from 2.63 gigawatt in March 2014 to 47.66 gigawatt in October 2021.
- India's current share of non-fossil sources based installed capacity of electricity generation is more than 40 per cent.
- With about 150.54 GW of established renewable energy in 2021, there is another 350 GW commitment to be honoured by 2030.
- Solar power is expected to contribute around 55% of the overall installed capacity of 500 GW.
- Despite being the third-largest market for solar in the world, India still has a long way to go when it comes to the global solar landscape.

3. Bottlenecks for Indian Solar Industry

- Despite a significant push by government for rooftop solar installations, India has not attained desired momentum because of rise in solar power cost.
- The overall cost of ownership: The cost and GST have increased by 25% and 7% respectively in last one year. This has led to the breakeven being stretched from 7 to 8 years to another few years.
- Underdeveloped DISCOM Ecosystem: Current DISCOM ecosystem is dependent on thermal electricity. Shifting it to the solar will affect the financial conditions of DISCOM.
- Import dependency: India still imports the major components such as

4. Tackling the bottlenecks

- **Import Duty:** To promote local manufacturing under 'Make in India' mission, Government has imposing a 40% duty on the import of solar modules.
- **PLI Scheme:** Production Linked Incentive (PLI) Scheme has been introduced to boost India's manufacturing capabilities and exports of high-efficiency solar PV modules.

- **BIS Certification:** BIS certification has led to the establishment of higher quality parameters, which will also benefit the customers.

5. Initiatives to boost solar power

- **Solar Rooftop Scheme:**
 - Under the rooftop scheme executed by SECI (Solar Energy Corporation of India), 200 MW of projects has been allocated.
 - SECI is offering 30% subsidy to the residential sector, private not for profit education organizations, social sector, and the health institutions.
- **Solar Park Scheme:**
 - MNRE has come up with a scheme to set up a number of solar parks across India, each with a capacity of almost 500 MW.
 - Under this scheme government is providing financial assistance to establish solar parks. The help is in terms of allocation of land, transmission, access to roads, availability of water, etc.
- **VGF (Viability Gap Funding) Scheme:**
 - Viability Gap Funding scheme is implemented by SECI.
 - In the past few years, SECI has made multiple project allocations under the VGF mechanism.
- **Solar Energy Subsidy Scheme:**
 - Under this Scheme, financial assistance and capital subsidy will be provided to the applicant to the extent of 50%, 75% and 90% on the basis of the basic cost of the solar energy plant

Indian Solar Industry

solar cells, modules, and solar inverters. This leads to loss of huge foreign currency every year. In the first 9 months of 2021, India imported solar wafers, cells, modules, and inverters worth \$1.97 billion.

- There is a lack of closer industry-government cooperation for the technology to achieve scale.

- With solar panels and solar systems getting more efficient compared to their earlier generation, customers want to invest in such technology that will get them better output per square meter of the space they have.

- There is a constant need to invest in research & development of more efficient solar ecosystem involving energy storage systems.

- For India's "Mission 2030", start-ups have to come with initiative solutions.

6. Way Forward

- The need for focused, collaborative and goals driven R&D to help India attain technology leadership in PV.
- The need for a better financing infrastructure, models and arrangements to spur the PV industry and consumption of PV products.
- Training and development of human resources to drive industry growth and PV adoption.

1. Why in News

The Afghan ministry of foreign affairs on January, 2022, has conveyed to the visiting Turkmenistan Deputy Foreign Minister Wafa Khadzhiyev that Kabul is willing to start the stalled TAPI Gas pipeline project.

2. About TAPI Project

- The Turkmenistan-Afghanistan-Pakistan-India (TAPI) pipeline will be a 1,814km trans-country natural gas pipeline running across four countries.
- This pipeline is also known as the Peace Pipeline or the Trans-Afghanistan Pipeline.
- The TAPI pipeline will begin in Turkmenistan and traverse Afghanistan to enter Pakistan and India.
- A special-purpose consortium known as the TAPI Pipeline Company (TPCL) was incorporated in November 2014 by Turkmenengaz (majority stakeholder with 85% stake), Afghan Gas Enterprise (5%), Inter State Gas Systems (5%), and GAIL (5%) to execute the \$10bn project, with Turkmenengaz leading the consortium.
- A stone-laying ceremony was held to commemorate the start of construction of the Turkmenistan-Afghanistan section of the TAPI gas pipeline in December 2015 in Mary, Turkmenistan, near the Galkynysh gas field.
- The investment agreement for the development of the TAPI project was signed by the four countries in February 2016.
- The ceremony marking the beginning of construction of the Afghanistan-Pakistan section of the pipeline was held in February 2018.

3. TAPI pipeline development background

- The plan for the TAPI project was originally conceived in the 1990s to generate revenue from Turkmenistan's gas reserves by exporting natural gas via Afghanistan to Pakistan and India.
- An inter-governmental agreement (IGA) was signed in 2010 by the heads of four member nations.

4. TAPI pipeline route details

- The TAPI gas pipeline will transport gas produced from the Galkynysh gas field in Turkmenistan to Afghanistan, Pakistan and India.
- The pipeline will start from Mary region of Turkmenistan and cover a total distance of 214km up to Afghanistan..
- The pipeline will run through Kandahar and Herat in Afghanistan, for a length of 774km.
- It will cover 826 km in Pakistan, across the cities of Quetta and Multan, finally terminating in Fazilka at the Indo-Pakistan border in Punjab, India.

5. Gas supply from TAPI gas pipeline

- Galkynysh gas field will feed gas to the pipeline section in Turkmenistan.
- Overall, the pipeline will supply 90 million metric standard cubic metres (Mmscm) of natural gas a day.
- Afghanistan will purchase 500Mmcfd, while Pakistan and India will buy 1,325Mmcfd of gas each.

6. TAPI pipeline benefits

- The pipeline is expected to facilitate a unique level of trade and co-operation across the region, while also supporting peace and security between the four nations.
- More than 1.5 billion people in Afghanistan, Pakistan, and India are expected to benefit from the long-term energy security provided by the project.
- The project is expected to boost the revenues of Turkmenistan via the sale of gas.
- Afghanistan and Pakistan will also receive benefits through transit fees.

7. Turkmenistan's diplomatic effort

- Turkmenistan has been a prime driver behind TAPI in recent years.
- Gas production at Galkynysh is understood to remain constrained due to limitations of export routes.
- Turkmenistan ships a large share of its gas to China via a three-line pipeline across Kazakhstan and Uzbekistan that already runs at full capacity.
- Russia has restricted Turkmenistan from using its trunkline network to transit and sell gas in Ukraine and Europe, insisting that all Turkmen gas will be bought by state owned Gazprom after it enters Russia.

TAPI Gas Pipeline Project

- A Gas Pipeline Framework Agreement (GPFA) was also signed by the petroleum ministries of the four countries in December 2010.
- The bilateral gas sale agreement was signed in May 2012.
- Turkmenengaz, Afghan Gas Enterprise, Inter State Gas Systems, and GAIL were nominated as shareholders by their respective countries to promote and invest in the pipeline project in 2013.
- The state-owned companies of Pakistan and India are each expected to purchase 42% of the total volume of produced gas, equating to approximately 14billion cubic meter (bcm).
- Afghanistan is expected to purchase 16% of the gas, which approximates to 5.11bcm. Afghanistan will also receive \$400m a year as transit fee for the pipeline.
- The pipeline will initially transport 27bcm of natural gas a year, which will be increased to 33bcm after one year of operation.

MCQs Based on Current Affairs

1. Consider the following statements
 1. The Kalapani region falls in the trijunction between India, China and Nepal.
 2. The Sugauli Treaty of 1816 outlines the Kali River as Nepal's western border with India.
 3. This area comes under the Chamoli district of Uttarakhand.
 Which of the above statement(s) is/are correct?
 - a) only 1
 - b) 1 and 2 only
 - c) 1, 2 and 3
 - d) only 3**Answer: b**

2. With reference to taxation on cryptocurrency transactions, consider the following statements:
 1. Cryptocurrency transactions are taxable under the Income Tax Act, 1961.
 2. In India, trading in cryptocurrencies is classified as a transfer of capital assets only and is taxable under the head 'Capital Gains'.
 Which of the above statements is/are correct? Select the correct option using the code.
 - a) only 1
 - b) only 2
 - c) Both 1 and 2
 - d) None of these**Answer: a**

3. Subhash Chandra Bose Aapda Prabandhan Puraskar, 2022 has been announced. Which are the 2 states that have received this award?
 - A. Uttar Pradesh and West Bengal
 - B. Rajasthan and Maharashtra
 - C. Gujarat and Sikkim
 - D. Manipur and Gujarat**Answer: C**

4. Certain standards have been set for any company to be included in the category of 'Startup' in India. Which of the following statement(s) is/are true in this regard?
 1. The headquarter of such company should be located in India;
 2. His annual income should not exceed Rs.10 crore;
 3. It should not have been more than 5 years since its commencement and
 He must have some new idea
 - A. 1 and 4 only
 - B. 2, 3 and 4 only
 - C. 1, 3 and 4 only
 - D. 1 2 3 and 4**Answer: A**

5. Which of the following statements related to the National War Memorial is false?
 - A. The National War Memorial was constructed by the Central Government in the year 2019.
 - B. It was built in honour of Indian soldiers martyred in the Indo-Pakistani War of 1971.
 - C. In this memorial there are 4 Chakras named Amar Chakra, Vir Chakra, Tyag Chakra and Raksha Chakra.
 - D. of these, there is a 15.5 m high memorial pillar on the Amar Chakra in which an Amar Jyoti lit.**Answer: B**

6. Recently who has been declared as the ICC Women's Cricketer of the Year 2021?
 - A. Tami Beaumond
 - B. Lizelle Lee
 - C. Smriti Mandhana
 - D. Mithali Raj**Answer: C**

7. Consider the following statements about Rare Earth Elements:
 1. Due to the lack of these minerals, they are called rare earth elements.
 2. Department of Rare Earth is the regulatory body in respect of Rare Earth Elements.
 3. At present, the United States is the largest producer of rare earth elements.
 Which of the above statements is/are correct? Select the correct option.
 - a) 1 and 2 only
 - b) 2 and 3 only
 - c) 1 and 3 only
 - d) Only 1**Answer: D**

Go to page no. 40

MCQs Based on Environment and Ecology

1. Consider the following statements:
 1. The United Nations organisation held the first international conference on human environment in stockholm 1972.
 2. The viena convention on the Ozone Layer and the subsequent Montreal Protocal on substance that depleted the Ozone layer, adopted in 1987.Which of the statements given above is/are correct?
 - (a) 1 only
 - (b) 2 only
 - (c) Both 1 and 2
 - (d) Niether 1 nor 2
2. Consider the following statements with reference to social forestry scheme:
 1. It is also known as 'extension' or 'community' forestry.
 2. It was launched by UNDP in 1978.
 3. It aims to provide food, fooder, fuel, fertilizer and fiber to population living closer to forests.Which of the statements given above is/are correct?
 - (a) 1 and 3 only
 - (b) 2 only
 - (c) 1, 2 and 3
 - (d) None of these
3. Consider the following statements:
 1. A sandy and saline area is the natural habital of Indian wild ass.
 2. The western Himalayas are covered with dense evergreen forests through out the year.
 3. India is one of the few developing countries in the world where the forest cover is increasing despite the rapid economic development.Which of the statements given above is/are correct?
 - (a) 1 only
 - (b) 1 and 3 only
 - (c) 2 only
 - (d) 1, 2 and 3
4. What is 'Hydrolysis'?
 - (a) Chemical weathering process that involves the reaction between mineral ions and the ions of water.
 - (b) A form of chemical weathering that involves the rigid attachment of H^+ and OH^- ions to the atoms and molecules of a mineral.
 - (c) The distinct zone in the Ocean below which the salinity increases sharply.
 - (d) None of the above
5. Consider the following gases:
 1. Carbon dioxide (CO_2)
 2. Chlorofluorocarbons (CFCs)
 3. Methane (CH_4)
 4. Nitrous Oxide (N_2O)
 5. Ozone (O_3)Which of the above gases are concerned with Green house Gases?
 - (a) 1, 2, 3 and 4 only
 - (b) 1, 2, 3 and 5 only
 - (c) 1, 2 and 3 only
 - (d) 1, 2, 3, 4 and 5
6. In an ecosystem, no organism can survive as an individual. Vital processes, such as growth, nutrition and reproduction depend on the interaction between living beings, But interaction is not always beneficial to all species. In this regard which among the following are an example of positive interaction?
 1. Mutualism
 2. Commensalism
 3. Colonisation
 4. Parasitism
 5. PredationSelect the correct answer using the codes given below:
 - (a) 1, 2 and 5 only
 - (b) 3, 4 and 5 only
 - (c) 1, 2 and 3 only
 - (d) 1, 2 and 4 only
7. With reference to the ecological pyramid, consider the following statements:
 1. The pyramids of energy are always upright
 2. The pyramids of numbers in all ecosystems always inverted
 3. The pyramids of biomass may be upright or invertedWhich of the statements given above is/ are correct?
 - (a) 1 only
 - (b) 1 and 2 only

- (c) 1 and 3 only
(d) 2 and 3 only
8. Consider the following statements:
1. Red algae appear black since they do not absorb light of any wavelength.
2. Yeast is commonly used for fermentation prior to baking.
3. Olive oil is extracted from seeds of olive plants.
4. Commercially used saffron represents dried stigmas from flowers.
Which of the statements given above are correct?
(a) 1, 2 and 3 only
(b) 1 and 3 only
(c) 2, 3 and 4 only
(d) 2 and 4 only
9. Which one among the following statements is not correct?
(a) Trophic dynamics represents the transfer of energy from one trophic level to another in a food chain
(b) In deeper parts of oceans primary production remains almost nil
(c) The primary consumers are called autotrophs
(d) The decomposers are called saprotrophs.
10. Within biological communities, some species may be important in determining the ability of large number of other species to persist in the community. These crucial species have been termed keystone species. In this regard consider the following kinds of organisms.
1. Bat
2. Tiger
3. Fig trees
Which of the above is/are keystone species(s):
(a) 1 and 2 only
(b) 2 only
(c) 1 and 3 only
(d) 1, 2 and 3
11. Consider upon the bioaccumulation of DDT in the aquatic food chain of Plankton – clams – Fish – Fish eating birds, which group of organisms exhibits highest concentration of DDT (in their bodies)?
(a) Plankton
(b) Clams
(c) Fish
(d) Fish – eating birds
12. With reference to the In-situ conservation, consider the following statements and choose appropriate code:
(a) A national park is an area which is strictly reserved for the betterment of the wildlife and where human activities are not permitted.
(b) A wildlife sanctuary is a protected area that is reserved for the conservation only of wildlife – animals and plants species. Human activities are allowed here.
(c) A biosphere reserve is a special area of land or coastal environment. Its boundaries are not sacrosanct and scientific management is lacking here.
(d) Both the statements (a) and (b) are correct in this context.
13. Consider the following documents:
1. A draft earth charter
2. Conventions on climate change and Biodiversity.
3. Convention on Forestry
4. Agenda-21 or Action Plan
Which of the above crucial documents were adopted at the Rio summit 1992?
(a) 1, 2, 3 and 4
(b) 1, 2 and 4 only
(c) 2, 3 and 4 only
(d) 1, 3 and 4 only
14. With reference to the popular medicinal plant “guggal” (*Commiphora wightii*), Which of the following statement(s) is/are correct?
1. It grows in the wild in the tropical rain forests of North-East India only.
2. The gum extract of the plant has the medicinal properties.
3. It helps in lowering the low-density lipoprotein cholesterol
Select the correct answer using the codes given below:
(a) 1 only
(b) 2 and 3 only
(c) 3 only
(d) 1, 2 and 3
15. Match List-I with List-II and select the correct answer using the code given below:
List – I (National Park/Sanctuary)
A. Kaziranga National Park
B. Dachigam Wild Life Sanctuary
C. Jim Corbett National Park
D. Mudumalai Wild Life Sanctuary

List – II (Important Protected Species)

1. Tiger
2. One horned rhinoceros
3. Hangul
4. Elephant

Code:

	A	B	C	D
(a)	2	1	3	4
(b)	4	1	3	2
(c)	4	3	1	2
(d)	2	3	1	4

16. Consider the following animals

1. Asian Elephant
2. Blue Bull
3. Red Panda
4. Indian Rhinoceros

Which of the above are belongs to the category of endangered species?

- (a) 1 and 2 only
- (b) 1, 3 and 4 only
- (c) 2, 3 and 4 only
- (d) 1, 2, 3 and 4

17. To conserve rare and threatened species, Govt. of India takes specific measures for conservation. Which among the following are an example of ex-situ conservation?

1. Genetic Engineering
2. Seed Banks
3. Botanical Gardens
4. Pollen Banks
5. Wildlife Sanctuaries

Select the correct answer using the code given below:

- (a) 1 and 5 only
- (b) 2, 3 and 4 only
- (c) 1, 2, 3 and 4 only
- (d) 1, 2, 3, 4 and 5

18. Consider the following:

1. Air pollution control
2. Biodiversity Analysis
3. Coastal zone Management
4. Sustainable Development
5. Soil and watershed Management

Which of the above are application of Geographical Information system (GIS)?

- (a) 1 and 2 only
- (b) 3, 4 and 5 only
- (c) 1, 2 and 5 only

- (d) 1, 2, 3, 4 and 5

19. Consider the following countries:

1. Brazil
2. India
3. Estonia
4. Madagascar
5. Philippines

Which of the above are known as Megabiodiversity Nations?

- (a) 1, 2, 4 and 5 only
- (b) 1, 2, and 4 only
- (c) 3, 4 and 5 only
- (d) 1, 2, 3, 4 and 5

20. Consider the following protected areas:

1. Kolleru Lake
2. Wular Lake
3. barna Lake
4. Harike Lake

Which of the above are declared as per list of wet lands of International importance under Ramsar convention in India?

- (a) 1 and 2 only
- (b) 1, 2 and 4 only
- (c) 2, 3 and 4 only
- (d) 1, 2, 3 and 4

21. Consider the following statements:

1. Convention on International Trade in Endangered species (CITES) was signed in 1985 in Vienna with the aim to put ban on international trade in wildlife.
 2. The Ramsar convention is Treaty on wetlands of International Importance became effective Since 1971. It provides the Framework for international collaboration on conservation of wetlands.
- Which of the statements given above is/ are correct?

- (a) 1 only
- (b) 2 only
- (c) Both 1 and 2
- (d) Neither 1 nor 2

22. Chinkara is considered as the integral part of which one among the following communities?

- (a) Apatanis
- (b) Lepchas
- (c) Bishnois
- (d) Bhutias

23. Over 90% of the world's biomass is in
- (a) Tropical rain forest
 - (b) Freshwater wetlands
 - (c) Topsoils
 - (d) Oceans
24. In wildlife conservation, which one among the following best defines an 'endemic' species?
- (a) When the critical number of a species declines in a forest due to parasitic attack
 - (b) A species which is cosmopolitan and can be commonly found in a biosphere
 - (c) An endangered species which is found in a few restricted areas on Earth
 - (d) A species confined to a particular region and not found anywhere else
25. Consider the following organisms:
1. Flying squirrel
 2. Porcupine
 3. Barking deer
- Which of the above is/are naturally found in India?
- (a) 1 and 2 only
 - (b) 2 and 3 only
 - (c) 3 only
 - (d) 1, 2 and 3
26. The Lion-tailed macaque is naturally found in
- (a) Eastern Ghats of Andhra Pradesh
 - (b) Western Ghats of Kerala
 - (c) Shivalik Hills of Northern India
 - (d) Hills of North-East India
27. Which one of the following place is well known for the annual mass nesting of olive Ridley turtles?
- (a) Gopalpur
 - (b) Gahirmatha
 - (c) Paradeep
 - (d) Puri
28. Consider the following species:-
1. Termite
 2. Ant
 3. Butter fly
 4. Bee
- Which of the above are a social insect?
- (a) 1, 2 and 3 only
 - (b) 1, 3 and 4 only
 - (c) 2 and 4 only
 - (d) 1, 2, 3 and 4
29. Consider the following gases:-
1. Carbon dioxide (CO₂)
 2. Methane (CH₄)
 3. Nitrogen Oxide
 4. CFCs
 5. Water Vapour
- Which of the above are mainly responsible for the greenhouse effect and global warming?
- (a) 1, 2, 3, 4 and 5
 - (b) 1, 2, 3 and 4 only
 - (c) 1, 2, 4 and 5 only
 - (d) 2, 3, 4 and 5 only
30. Consider the following factors:
1. Continental Drift
 2. Earth's Tilt
 3. Volcanoes
 4. Burning of Fossil fuels
 5. Deforestation
- Which of the above are responsible for climate change?
- (a) 1, 2, 4 and 5 only
 - (b) 2, 3, 4 and 5 only
 - (c) 3, 4 and 5 only
 - (d) 1, 2, 3, 4 and 5

Answers

- | | |
|---------|---------|
| 1. (c) | 18. (d) |
| 2. (c) | 19. (a) |
| 3. (b) | 20. (b) |
| 4. (a) | 21. (c) |
| 5. (d) | 22. (c) |
| 6. (c) | 23. (a) |
| 7. (c) | 24. (d) |
| 8. (c) | 25. (d) |
| 9. (b) | 26. (b) |
| 10. (d) | 27. (b) |
| 11. (d) | 28. (d) |
| 12. (d) | 29. (a) |
| 13. (a) | 30. (d) |
| 14. (b) | |
| 15. (d) | |
| 16. (b) | |
| 17. (c) | |

NOTES

Rest part of page no. 35

8. Consider the following statements.
1. Guggal is a medicinal plant which has recently been included in the Red Data List of Threatened by IUCN.
 2. It is mostly found in Arid and Semi-Arid areas.
- Which of the above statements are true?
- A. only 1
B. 2 only
C. Both 1 and 2
D. Neither 1 nor 2
- Answer: C**
9. Which of the following organizations/events are associated with the life of Subhas Chandra Bose?
1. Independence League
 2. Forward Block
 3. Slogan of 'Delhi Chalo'
- A. 1 and 2 only
B. 2, and 3 only
C. 1 and 3 only
D. 1, 2 and 3
- Answer: D**
10. Which one of the following non-fossil fuel sources contributes the most to electricity generation in India?
- a) solar energy
 - b) wind power
 - c) biomass energy
 - d) hydroelectric energy

Answer: A

Case Study

You are a Medical Officer posted at the critical care unit of a hospital. A girl has been admitted to the emergency ward. The patient is a victim of a serious accident and needs an immediate blood transfusion to save her life. You are a dedicated doctor, recognised for your commitment to your duty.

However, the patient belongs to a religious community that forbids her from taking blood into her body from outside her community.

She is accompanied by her family, relatives, and community leaders from her community, all of whom are strongly against any blood transfusion. They have threatened you, not to provide girl, blood from outside. Any such attempt by you and your hospital have to face retaliation. What would you do in such a situation?

Some of the options are given below. Evaluate the merits and demerits of each of these options and finally suggest what course of action you would like to take, giving reasons.

- (i) Agree with the family members and relatives and act according to them.
- (ii) You will provide blood to the girl but not inform family members.
- (iii) You will consult your head of the department and follow his instructions.
- (iv) You will arrange security for the hospital before providing blood.

Ans.

In the given case study, I am a doctor and I have to treat a girl patient who needs an immediate blood transfusion but her community members are against it. The values involved are integrity, responsibility, compassion, empathy and spirit of service.

Evaluation of the given options-

- Complying with the demand of family members can risk the life of the patient and we cannot compromise with treatment.
- In this option, the patient will get proper treatment but hiding this fact is not ethical and may create problems in near future.
- Consulting a senior doctor is a good option as he has more experience but acting according to his advice depends on the advice given and the situation.
- Taking security may be a good step but here priority is saving the life of the patient. Waiting for security can endanger her life.

My course of action: After giving her first aid I will immediately arrange for a blood transfusion. As she is accompanied by her family members, relatives and community leaders so I will motivate them to donate blood as they belong to the same community. After matching their blood group I will choose the appropriate person as the donor and provide her blood. In any case, if I am not able to match blood in her community members then I will arrange it from the blood bank and save the life of the patient. After that, I will convince her relatives about the need and make them understand the value of life and my duty. Even if they will not cooperate I will ask security to manage them and call the police.

NOTES

Birthday Special: Netaji Subhash Chandra Bose



Subhas Chandra Bose was born on 23 January 1897 in a Bengali family in Cuttack, Orissa. His father Jankinath Bose was a famous lawyer and his mother Prabhavati Devi was a pious and religious lady. After completing his primary education from the Protestant European School in Cuttack, he joined Ravenshaw Collegiate School in 1909. The personality of college principal Benimadhav Das had a good effect on Subhash's mind. Later, due to some difficulties, he left this college and joined the Scottish Church College. He left for England on 15 September 1919. There he was admitted to the Kitts William Hall to study the Tripass (Hons) examination of mental and moral sciences. In England he appeared for the ICS competitive examination in 1920 and secured fourth in order of merit. The ideas of Swami Vivekananda and Maharishi Aurobindo Ghosh had made a deep impact on Netaji's mind, so by becoming an ICS he could not work under the British and on 22 April 1921 he resigned.

After coming back to India, he first went to Mumbai on the advice of Rabindranath Tagore and met Mahatma Gandhi. There on July 20, 1921, the first meeting between Gandhiji and Subhash took place. There were two special phases of Netaji's politics and ideology. During 1920-30, the Congress started leaning towards socialism, in which Netaji had an important role.

Major changes took place in international politics during 1938. During this, the Second World War started. In these circumstances, three types of thinking emerged in the freedom movement. The communists wanted some leniency against the British in the fight against fascism, while Subhash wanted to take advantage of the world war and intensify the fight against the British. Due to this,

he had differences with Gandhiji. It is said that in order to get Bhagat Singh's execution pardoned, Subhash wanted Gandhi to break the agreement made with the British government on this subject and try to pardon Bhagat Singh, but Gandhiji did not agree to break the promise made by him.

He also became the President of Congress twice, but due to differences, he left the Congress and from the year 1942, he started the freedom struggle in his own way. Despite the difference of opinion, both Gandhiji and Subhash had great respect for each other. Both the great men had the same goal, but the paths were different.

During the Second World War, to fight against the British, he formed the Azad Hind Fauj with the help of Japan. In 1943, while addressing the army as 'Supreme Commander' in the Town Hall of Singapore, he gave the slogan "Dilli Chalo". "You give me blood, I will give you freedom" was also his slogan, which was very popular at that time. In October 1943, Subhas Bose formed the Provisional Government of independent India as the Supreme Commander of the Azad Hind Fauj, which was recognized by the governments of 11 countries including Germany, Japan, Philippines, Korea, China, Italy, Manchukuo and Ireland. Japan gave the Andaman and Nicobar Islands to this provisional government. Subhash went to those islands and renamed them also. Except for the Azad Hind Fauj, there is no such instance in world history where, about thirty to thirty-five thousand war prisoners organized such a power struggle for the independence of their country.

Netaji's name is first taken as a true and brave son of Mother India. On the occasion of the 125th birth anniversary of Netaji Subhas Chandra Bose, the government has announced that this day will now be celebrated every year as Parakram Diwas and a grand statue of Netaji Subhas Chandra Bose will also be installed at India Gate in New Delhi.

POLITY TERMINOLOGY

Evolution of Indian Constitution- II

The Crown Rule (1858-1947)

1. Government of India Act 1858:

- After the revolt of 1857, Rule of Company was replaced by Rule of Crown in India.
- Powers of the British Crown were to be exercised by the Secretary of State of India, assisted by the Council of India having 15 members.
- Governor General was made Viceroy of India.
- Abolition of Board of Control and Court of Directors.

2. Indian Councils Act 1861:

- Decentralization initiated by restoration of the legislative powers of Madras and Bombay Presidencies.
- For the first time, Viceroy's extended Council had 3 Indians.
- Bengal, North-western Provinces and Punjab were provided new legislative councils.
- Viceroy empowered to issue ordinances, during an emergency.

3. Indian Councils Act 1892:

- Introduction of indirect elections.
 - Governor-General's council enlarged.
 - Functions of the Legislative Council increased.
- Power given to them to discuss budget and address questions to the executives.

4. Indian Councils Act 1909:

- Also known as Marley- Minto reforms.
- Size of Legislative Councils at Centre and provinces was significantly increased. Members in Central Legislative Council increased from 16 to 60.
- Communal representation introduced, separate electorate for Muslims. Lord Minto became Father of Communal Electorate.
- Indians were allowed in the Executive Councils of the Viceroy and Governor.
- Councils given the right to discuss any matter, move resolution on budget and ask supplementary questions.

5. Government of India Act 1919:

- Also known as Montagu-Chelmsford Reforms.

- Central subjects were demarcated and separated from those of the provincial subjects.
- 'Dyarchy' introduced at provincial level.
- Under Dyarchy system, provincial subjects were divided in Transferred and Reserved Subjects. Governor was not responsible to the Legislative Council on reserved subjects.
- For 1st time, bicameralism was introduced in the centre.
- Direct elections.
- Act mandated, 3 of 6 members of the viceroy's executive Council but not the Commander-in-chief, to be Indians.
- Provided for the establishment of Central Public Service Commission.

6. Government of India Act 1935:

- Act proposed for the establishment of an All India Federation consisting of the provinces and the Princely states as Units, though the federation never came into being.
- Act divided the powers between the Centre and units into Federal list, Provincial List and Concurrent list.
- Residuary powers were vested in Viceroy.
- Provided for adoption of dyarchy at Centre.
- Introduced bicameralism in 6 provinces i.e., Bengal, Bombay, Madras, Bihar, Assam and United Provinces.
- Reserve Bank of India established.
- Provided for the establishment of Federal Court.

7. Indian Independence Act of 1947:

- It ended British rule in India and declared India as an independent state.
- Provided for partition of India.
- The office of the Secretary of State for India abolished.

AN INTRODUCTION



DHYEYA IAS[®]
most trusted since 2003

DhyeyaIAS, one and half decade old institution, was founded by Mr. Vinay Singh and Mr. Q. H. Khan. Ever since its emergence it has unparalleled track record of success. Today, it stands tall among the reputed institutes providing coaching for Civil Services Examination (CSE). The institute has been very successful in making potential aspirants realize their dreams which is evident from the success stories of the previous years.

As the nation progresses, the young generations become more conscious and aware about their career options. There is plethora of jobs and one among them is civil services, the most prestigious service in the country, which needs no introduction. It attracts many young minds hailing from almost all spectra of academic disciplines. The popular belief that the examination for this service is only meant for the brilliant lots has become a taboo as it also attracts the hardworking, sincere and disciplined minds. The saying- "In the end passion and hard work can substitute natural talent" holds true. It gives immense power and opportunity for young folks to bring about the positive changes in the society which would bring harmony and development. It inculcates values, moral, ethos and feeling of national integrity.

Quite a large number of students desirous of building a career for themselves are absolutely less equipped for the fairly tough competitive tests they have to appear in. Several others, who have a brilliant academic career, do not know that competitive exams are vastly different from academic examination and call for a systematic and scientifically planned guidance by a team of experts. Here one single move may invariably put one ahead of many others who lag behind. Dhyeya IAS is manned with qualified & experienced faculties besides especially designed study material that helps the students in achieving the desired goal.

Civil Services Exam requires knowledge base of specified subjects. These subjects though taught in schools and colleges are not necessarily oriented towards the exam approach. Classes at Dhyeya IAS are different from classes conducted in schools and colleges with respect to their orientation. Classes are targeted towards the particular exam. Classroom guidance at Dhyeya IAS is about improving the individuals' capacity to focus, learn and innovate as we are comfortably aware of the fact that you can't teach a person anything, you can only help him find it within himself.

We feel that despite brilliance and diligence, most of the students are lacking proper guidance and aptitude needed to clear Civil Services Examination. This is why, we at Dhyeya IAS amalgamated the traditional as well as modern approach of teaching by incorporating best educators of the industry ably supported by Academic Associates, Class Notes and printed Study Material, routine as well as surprise Tests. Due to its arduous efforts, Dhyeya IAS is able to carve a niche among all the civil services coaching institutes in India. Access to an institution is as important as the quality of Institution. Our faith in this philosophy made us grow. With 12 Face to Face Centers located in different parts in India, Distance Learning Program, Live Streaming Centers and Residential Academy, we have made truly pan India presence. Ever since the foundation the institute has produced a heavy pool of bureaucrats both at central and state level. Dhyeya IAS not only aims at imparting the content of civil services in best way but also nurturing the aspirants as leaders of tomorrow who have a responsibility of fulfilling the dreams of around 1.4 billion Indians. Dhyeya IAS has guided over 50,000 aspirants with more than 4000 selections in civil services. Our journey is a small contribution for the development of the society and nation by nurturing the potential civil services aspirants.

Considering the toughness of Civil Services Exam, where success rate is a meager 0.1 percent, Dhyeya IAS has continuously produced phenomenal results over the years. Year after Year Dhyeya IAS is being recognized for imparting guidance to civil services aspirants using benchmarked quality practices. On the basis of scalability, innovation, achievements, impact potential our efforts and contribution have been acknowledged and rewarded with Education Excellence Awards by ET NOW, Brands Academy, Times of India, etc. This has enhanced motivation, pride and self-esteem of entire Dhyeya family.



dhyeyaias.com

Face to Face Centres

North Delhi : A 12, 13, Ansal Building, Dr. Mukherjee Nagar, Delhi - 110009, Ph: 9205274741/42/44 | **Laxmi Nagar** : 1/53, 2nd floor, Lalita Park, Near Gurudwara, Opposite Pillar no.23, Laxmi Nagar, Delhi -110092, Ph: 9205212500/9205962002 | **Greater Noida** : 4th Floor Veera Tower, Alpha 1 Commercial Belt., Greater Noida, UP - 201310, Ph: 9205336037/38 | **Prayagraj** : II & III Floor, Shri Ram Tower, 17C, Sardar Patel Marg, Civil Lines, Prayagraj, UP - 211001, Ph: 0532-2260189/8853467068 | **Lucknow (Aliganj)** : A-12, Sector-J, Aliganj, Lucknow, UP- 226024, Ph: 0522-4025825/9506256789 | **Lucknow (Gomti Nagar)** : CP-1, Jeewan Plaza, Viram Khand-5, Near Husariya Chauraha, Gomti Nagar, Lucknow, UP - 226010, Ph: 7234000501/ 7234000502 | **Kanpur** : 113/154 Swaroop Nagar, Near HDFC Bank, Kanpur, UP - 208002, Ph: 7887003962/7897003962 | **Gorakhpur** : Narain Tower, 2nd floor, Gandhi Gali, Golghar, Gorakhpur, Uttar Pradesh 273001, Ph: 7080847474 | **Bhubaneswar** : OEU Tower, Third Floor, KIIT Road, Patia, Bhubaneswar, Odisha - 751024, Ph: 9818244644/7656949029

Dhyeya IAS Now on Telegram

We're Now on Telegram



Join Dhyeya IAS Telegram Channel from the link given below

"https://t.me/dhyeya_ias_study_material"

You can also join Telegram Channel through Search on Telegram
"Dhyeya IAS Study Material"

Join Dhyeya IAS Telegram Channel from link the given below

https://t.me/dhyeya_ias_study_material

नोट : पहले अपने फ़ोन में टेलीग्राम App Play Store से Install कर ले उसके बाद लिंक में क्लिक करें जिससे सीधे आप हमारे चैनल में पहुँच जायेंगे।

You can also join Telegram Channel through our website

www.dhyeyaias.com

www.dhyeyaias.com/hindi



Address: 635, Ground Floor, Main Road, Dr. Mukherjee Nagar, Delhi 110009
Phone No: 9205274741, 9205274742, 9205274744

Subscribe Dhyeya IAS Email Newsletter

(ध्येय IAS ई-मेल न्यूजलेटर सब्सक्राइब करें)

जो विद्यार्थी ध्येय IAS के व्हाट्सएप ग्रुप (Whatsapp Group) से जुड़े हुये हैं और उनको दैनिक अध्ययन सामग्री प्राप्त होने में समस्या हो रही है | तो आप हमारे ईमेल लिंक Subscribe कर ले इससे आपको प्रतिदिन अध्ययन सामग्री का लिंक मेल में प्राप्त होता रहेगा | **ईमेल से Subscribe करने के बाद मेल में प्राप्त लिंक को क्लिक करके पुष्टि (Verify) जरूर करें** अन्यथा आपको प्रतिदिन मेल में अध्ययन सामग्री प्राप्त नहीं होगी |

नोट (Note): अगर आपको हिंदी और अंग्रेजी दोनों माध्यम में अध्ययन सामग्री प्राप्त करनी है, तो आपको दोनों में अपनी ईमेल से **Subscribe** करना पड़ेगा | आप दोनों माध्यम के लिए एक ही ईमेल से जुड़ सकते हैं |



ध्येय IAS®
most trusted since 2003



Join Dhyeya IAS Whatsapp Group by Sending "Hi Dhyeya IAS" Message on 9205336039.

Subscribe Dhyeya IAS Email Newsletter

Step by Step guidance for Subscription:

- **1st Step:** Fill Your Email address in form below. you will get a confirmation email within 2 min.
- **2nd Step:** Verify your email by clicking on the link in the email. (Check Inbox and Spam folders)
- **3rd Step:** Done! you will receive alerts & Daily Free Study Material regularly on your email.

Subscribe