

INDIAN ECONOMY

Parliamentary Committee Report on Startups

Recently, the Parliamentary Standing Committee on Finance tabled a report related to startups in Parliament. The Government of India has initiated a Startup India Scheme in 2016.

Key Points

Recommendations:

- > Indian start-ups need to reduce their dependence on China and the USA, so that India becomes self-reliant by having several large domestic growth funds powered by domestic capital.
- > E.g Small Industries Development Bank of India (SIDBI) Fund-of-Funds vehicle should be expanded and fully operationalised to play an investment role.
- A fund-of-funds also known as a multi-manager investment—is a pooled investment fund that invests in other types of funds.
- > Foreign development finance institutions may also be encouraged to participate with local asset management companies to set up fund-of-funds structures.
- > The companies and Limited Liability Partnerships (LLPs) should be allowed to invest in startups without being classified as Non-banking Financial Companies (NBFCs) by the Reserve Bank of India (RBI) to expand capital sources for start-ups.
- Abolition of Long Term Capital Gains (LTCG) tax on Collective Investment Vehicles (CIVs) for at least the next two years to encourage investment in start-ups and to drive a sharp postpandemic revival.
- At present, LTCG earned by foreign investors in private companies attracts taxation at a rate of 10%, in comparison to the domestic venture capital investments which are taxed at 20% (for LTCG) with an enhanced surcharge of 37%.
- ❖ After a two-year period, the Securities Transaction Tax (STT) may be applied to CIVs so that revenue neutrality is maintained.
- A CIV is any entity that allows investors to pool their money and invest the pooled funds, rather than buying securities directly as individuals. It is usually managed by a fund management company which is paid a fee for doing so.
- **Examples of CIV:** angel funds, alternate investment funds and investment LLP.
- Benefits: A strong start-up ecosystem can propel investment, jobs, and demand creation in the economy. Cod

Additional Information

Startup India Scheme

- Information
 India Scheme
 It is a flagship initiative of the Government of India, intended to catalyse startup culture and build a strong and inclusive ecosystem for innovation and entrepreneurship in India.
- Since the launch of the initiative in 2016, Startup India has rolled out several programs with the objective of supporting entrepreneurs, and transforming India into a country of job creators instead of job seekers.
- A startup is an enterprise that is initiated by its founders around an idea or a problem with a potential for significant business opportunity and impact.

Securities Transaction Tax

- > It is a tax levied at the time of purchase and sale of securities listed on stock exchanges in India.
- ▶ Both purchaser and seller both need to pay 0.1% of share value as STT.

Capital Gain Tax

- Any profit or gain that arises from the sale of a 'capital asset' is a capital gain. This gain or profit comes under the category of 'income'.
- > Land, building, house property, vehicles, patents, trademarks, leasehold rights, machinery, and jewellery are a few examples of capital assets.
- > Hence, the capital gain tax will be required to be paid for that amount in the year in which the transfer of the capital asset takes place. This is called the capital gains tax, which can be both short-term or long-term.
- Long-term Capital Gains Tax: It is a levy on the profits from the sale of assets held for more than a year.
- Short-term Capital Gains Tax: It applies to assets held for a year or less and is taxed as ordinary income.

Small Industries Development Bank of India

Small Industries Development Bank of India (SIDBI) was set up in 1990. It is a statutory body established under an Act of Parliament.



It acts as the principal financial institution for promotion, financing and development of the Micro, Small and Medium Enterprise (MSME) sector as well as for coordination of functions of institutions engaged in similar activities.

INDIA IS THE

3rd LARGEST

startup ecosystem
in the world



by Department for Promotion of Internal Trade and Industry (DPIIT)



The current median age of founder entrepreneurs lies at only 31 YEARS



29 STATES AND UTS NOW HAVE A STATE STARTUP POLICY

The federal as well as state governments are increasingly recognising startups as important engines for economic growth



The entire startup ecosystem raised \$50 BILLION FUNDING² between 2014-2019



36 REGULATIONS

have been simplified for the startup ecosystem in India¹.

The boom in women entrepreneurship is apparent in the growth story of women led startups -

MORE THAN
43% OF THE
TOTAL STARTUPS IN
INDIA HAVE ONE OR MORE
WOMEN DIRECTORS



INDIA IS HOME TO 32 UNICORNS

(Startups with valuation \$1 Bn+) with a combined valuation of \$100+ Billion



ON AN AVERAGE 12 JOBS CREATED PER STARTUP TOTALING UP TO 3,50,000+ JOBS

The startup
ecosystem, in driving
India's growth story,
tangibly adds to job
creation in the nation



LEADING SECTORS THAT PERVADE THE INDIAN STARTUP LANDSCAPE ARE³

\$5.7 BN

\$3 BN ENTERPRISES \$1.4 BN

HEALTH-TECH

\$11.7 BN E-COMMERCE

\$1.2 BN LOGISTICS

(While sector diversity visibly permeates Indian led businesses)

INTERNATIONAL RELATION

The Abraham Accord: Israel, UAE& Bahrain

• The Abraham Accord between Israel, the United Arab Emirates and Bahrain is mediated by the USA. It is the first Arab-Israeli peace deal in 26 years.

Key Points

- Previous Agreements: There were the only two peace deals between Israel and the Arab States in more than a quarter of a century.
 - > Egypt was the first Arab State to sign a peace deal with Israel in 1979.
 - > Jordan signed a peace pact in 1994.

The Agreement:

- As per the agreements, the UAE and Bahrain will establish:
 - **.** Embassies and exchange ambassadors.
 - ❖ Working together with Israel across a range of sectors, including tourism, trade, healthcare and security.
- The Abraham Accords also open the door for Muslims around the world to visit the historic sites in Israel and to peacefully pray at Al-Aqsa Mosque in Jerusalem, the third holiest site in Islam.
- In the Islamic tradition, the Kaaba in Mecca is considered the holiest site, followed by the Prophet's Mosque in Medina, and Al-Aqsa Mosque in Jerusalem.



Reason: Bringing Israel, the UAE and Bahrain together reflects their shared concern about Iran's rising influence in the region and development of ballistic missiles. Iran has been critical of both deals.

Significance of the Accord:

- * The agreement shows how the Arab countries are gradually decoupling themselves from the Palestine question.
- Palestine was among former Ottoman territories placed under UK administration by the League of Nations in 1922. All of these territories eventually became fully independent States, except
- Full diplomatic ties will be established between Israel, the United Arab Emirates and Bahrain which will have a positive impact on the entire region.
- The deal buys UAE a lot of goodwill in the US, where its image has been tarnished by its involvement in the Yemen war.
- In South Asia, it will put Pakistan in a bind, whether to follow UAE's steps (will be seen as giving up Islamic cause of Palestine) or not to follow the UAE (since it is already in feud with the Saudis over not taking up the Kashmir case. Pakistan cannot afford another hostile Islamic Country).
- In the upcoming presidential election in the USA, the accord could help shore up support among pro-Israel Christian evangelical voters, an important part of current President's political base.

More Deals:

- > Other gulf states in the region like Oman could follow suit and sign similar agreements with
- > One of the biggest Gulf Arab powers, Saudi Arabia could follow the suit as well.

Concern:

- The Palestinians have not embraced the USA's vision. 86% of Palestinians believe the normalization agreement with the UAE serves only Israel's interests and not their own.
- There is a possibility that the Palestine quest is further ignored.
- Saudi Arabia (Sunni) and Iran (representing Shia) have a long history of enmity. For decades, one of the main sources of instability in West Asia back.
- The Sunni-Shiite schism may also provoke violence between Muslims in such places as Pakistan, Nigeria and Indonesia.

Indian Interest in West Asia:

Geopolitical: West Asia occupies an important position in international relations due to its geographical location and proximity to continents and countries South Asia, China, Central Asia, Europe, and Africa.

Energy: The region is strategically significant due to its enormous energy resources, trade route links to different parts of the world.

It is the world's largest oil-producing region accounting for 34% of world production, 45% of crude oil exports and 48% of oil proven reserves.

Diaspora: Indian expatriates have constituted a substantial share of the regional labour market.

Remittances from the region constitute a major chunk of total remittances to India.

Opportunity for India:

- > Defence and Security: India should use this unexpected opportunity to give itself a bigger role in a region which is its strategic backyard. The first step should be to ramp up defence and security relations with UAE.
- Israel is already a very close defence partner.
- ➤ While some work has already happened, India should leverage its economy for a bigger opening in this region. Importantly, India can use its good offices to ensure that any future deal on a regional security framework gives adequate space to Iran, which may be weak but not so weak that it cannot be a hugely disruptive power if it so chooses.

Way Forward

- A balance between Shia and Sunni, between Persian and Arab, is key to any sustainable peace.
- > The US may be a pre-eminent power in the Middle East, but Russia has made a space for itself, spending a lot less money. In recent years, China has indicated its willingness to play a larger role in this region, and is close to both UAE and Israel and, increasingly, Saudi Arabia.
- India should make its moves before this market and this extended neighbourhood come under the Chinese sphere of influence.



A deal that could, if played right, open the doors for a changed geopolitical arrangement in the Middle East should have a stronger Indian footprint.

ENVIRONMENT AND BIODIVERSITY

Living Planet Report: WWF

According to the Living Planet Report 2020 released by the **World Wide Fund** for Nature, the population of vertebrate species has largely declined in the past half- century.

➤ Vertebrates: Vertebrates are animals that have backbones or vertebral columns. They are also characterized by a muscular system consisting primarily of bilaterally paired masses and a central nervous system partly enclosed within the backbone..

Key Points

- Methodology: The Report used the Living Planet Index to calculate the decline in vertebrate species.
- Living Planet Index (LPI): It is a measure of the state of the world's biological diversity based on population trends of vertebrate species in terrestrial, freshwater and marine habitats.
- It is released by Institute of Zoology (Zoological Society of London)
- Founded in 1826, Zoological Society of London is an international conservation charity working for wildlife conservation.
- LPI tracked almost 21,000 populations of more than 4,000 vertebrate species between 1970 and 2016.

Findings:

- It shows an average 68% decline in global vertebrate species populations, between 1970 and 2016. In the Asia Pacific the decline stands at 45%.
- A 94% decline in the LPI for the tropical subregions of the americas is the largest fall observed in any part of the world.

Freshwater species populations have reduced by 84% on average since 1970.

- Freshwater species populations are being lost faster than terrestrial or marine species. According to the International Union for Conservation of Nature (IUCN), almost 1/3rd of freshwater species are now threatened with extinction.
- Wildlife populations in freshwater habitats suffered a decline of 84%, equivalent to 4% per year, particularly in Latin America and the Caribbean.
- Megafauna, or bigger species in terms of size, are more vulnerable because they were subjected to intense anthropogenic threats and overexploitation.
- For eg. Large fishes are also heavily impacted by dam construction that blocks their migratory routes to spawning and feeding grounds.

Since 1970, our Ecological Footprint has exceeded the Earth's rate of regeneration.

- Ecological Footprint measures the ecological assets that a given population requires to produce the natural resources it consumes (including plant-based food and fiber products, livestock and fish products, timber and other forest products, space for urban infrastructure) and to absorb its waste, especially carbon emissions.
- ➤ The human enterprise currently demands 1.56 times more than the amount that Earth can regenerate. It is like living off 1.56 Earths.

Threats to Biodiversity:

- Changes in Land and Sea Use, including Habitat Loss and Degradation: This refers to the modification of the environment where a species lives, by complete removal, fragmentation or reduction in quality of key habitat.
- **Species Overexploitation:** Direct overexploitation refers to unsustainable hunting and poaching or harvesting. Indirect overexploitation occurs when non-target species are killed unintentionally.
- Pollution: Pollution can directly affect a species by making the environment unsuitable for its survival. It can also affect a species indirectly, by affecting food availability or reproductive performance.
- Invasive Species and Disease: Invasive species can compete with native species for space, food and other resources, can turn out to be a predator for native species, or spread diseases that were not previously present in the environment. Humans also transport new diseases from one area of the globe to another.



Climate Change: As temperatures change, some species will need to adapt by shifting their range to track a suitable climate. The effects of climate change on species are often indirect. For eg, change in migratory patterns of birds.

Way Forward

- Research shows the world could start to stabilize and reverse the loss of nature by embracing bolder, more ambitious conservation efforts as well as making transformational changes in the way food is produced and consumed, such as making food production and trade more efficient, reducing waste, and favouring healthier and more sustainable diets.
- > The report also underscores the need for a global New Deal for Nature and People with clear, ambitious goals, to see us on the path to recovery by 2030.
- Diseases like Covid-19 are one of the many connections between the health of people and the planet. How humanity chooses to recover from the pandemic, and address the looming threats from global environmental change, will influence the health and livelihoods of generations to come.

Additional Information:

World Wildlife Fund for Nature

- It is the world's leading conservation organization and works in more than 100 countries.
- It was established in 1961 and is headquartered at Gland, Switzerland.
- Its mission is to conserve nature and reduce the most pressing threats to the diversity of life on Earth.
- WWF collaborates at every level with people around the world to develop and deliver innovative solutions that protect communities, wildlife, and the places in which they live.

SCIENCE AND TECHNOLOGY

STAMP ON A-SAT MISSILE

A Customized My Stamp on India's First Anti Satellite Missile (A-SAT) launch was released by the Department of Posts on the occasion of **Engineers Day**.

Key Points

- My Stamp: It is the brand name for personalized sheets of Postage Stamps of India Post.
 'My Stamp' was first introduced in India during the William of the Willi
- Customized My Stamp is a personalized sheet of Postage Stamps wherein the corporate, organizations and institutions can get their customized sheets printed from India Post.

A-SAT Missile

- It is an interceptor missile that destroys or jams satellites in space.
- Two types of A-SATs: Kinetic and Non-Kinetic A-SATs.
- Kinetic A-SATs, like ballistic missiles physically strike an object in order to destroy it.
- Non-Kinetic A-SATs: A variety of nonphysical means can be used to disable or destroy a space object. These include frequency jamming, blinding lasers or cyberattacks.

Mission Shakti

- > Defence Research and Development Organisation (DRDO) successfully conducted India's first Anti-Satellite (A-SAT) missile test 'Mission Shakti'.
- It was launched from Dr APJ Abdul Kalam Island in Odisha on 27th March 2019.
- > The interceptor missile was a three-stage missile with two solid rocket boosters.

Significance:

- > The entire effort was indigenous which demonstrated the Nation's capability to develop such complex and critical missions.
- With this success, India became the fourth nation in the world to possess such capability.
- With the establishment of India as a space power, India will be accorded a place in any future international treaty that relates to the governance or usage of Space.
- In case of Pakistan, a terrestrial power, the use of nuclear arsenal can now come at a heavy cost.
- As of now Pakistan presumes that the no first use doctrine of India gives it an advantage, but with the development of ASAT capabilities, India would be able to destroy an incoming Pakistani nuclear missile.
- This will create a significant deterrence vis-a-vis the position of Pakistan.
- In case of China, which is a significant space power, counter-space capabilities of India will provide a critical balancing deterrent.



Engineers Day

- ➤ 15th September is observed as Engineer's Day in India to mark the birth anniversary of Sir Mokshagundam Visvesvaraya (1861-1962), a civil engineer and statesman.
- ➤ He was a pioneer in his field, credited for inventing the Block System for dams the automated doors shut during an overflow.
- ➤ He was appointed Chief Engineer of Mysore State in 1909, given the status of Diwan of Mysore in 1912, awarded the Bharat Ratna in 1955.
- ➤ His books, "Reconstructing India" and "Planned Economy of India" were published in 1920 and 1934, respectively.

GEOGRAPHY

Re-Measuring of Mount Everest

- China and Nepal are soon expected to announce Mount Everest's latest official height.
- In 2019, both countries agreed to re-measure the elevation of the world's highest mountain and announce the findings together.

WHICH MOUNTAIN RANGE HAS THE HIGHEST NUMBER OF TOP 10 PEAKS?



Key Points

About:

- ➤ Mount Everest (also called Sagarmatha in Nepal) is Earth's highest mountain above sea level, located in the Himalayas between China and Nepal with their borders running across its summit point.
- ➤ Its current official elevation is 8,848m which places it more than 200m above the world's second-highest mountain, K2, which is 8,611m tall and located in Pakistan-occupied Kashmir.
- Mount Everest gets its English name from Sir George Everest, a colonial-era geographer who served as the Surveyor General of India in the mid-19th century.
- ➤ It was first scaled in 1953 by the Indian-Nepalese Tenzing Norgay and New Zealander Edmund Hillary.



First Survey of Everest:

- > The first effort was carried out in 1847 by a team led by Andrew Waugh, Surveyor General of India.
- > The survey was based on trigonometric calculations and is known as the Great Trigonometric Survey of India.
- The team discovered that 'Peak 15' (as Mount Everest was referred to then) was the highest mountain, contrary to the then-prevailing belief that Mount Kanchenjunga (8,582m and the 3rd highest peak in the world now) was the highest peak in the world.

Need for Re-measurement:

- Everest's current official height has been widely accepted since 1956 when the figure was measured by the Survey of India.
- ➤ However, the height of a summit changes due to tectonic activities like the 2015 Nepal earthquake.
- Its measurement over the decades has also depended on who was surveying.
- > Previous measurements of the mountain were by Indian, American or European surveyors.
- > The joint effort represents national pride for Nepal which will come up with its own findings on the height.

Survey of India

- ➤ It is the National Survey and Mapping Organisation of the country under the Department of Science and Technology.
- > It was established in 1767 and is the oldest scientific department of the Government of India.
- ➤ Headquarters: Dehradun, Uttarakhand.
- It acts as an adviser to the Government of India on all survey matters, viz Geodesy, Photogrammetry, Mapping and Map Reproduction.
- > Geodesy is the science of accurately measuring and understanding the Earth's geometric shape, orientation in space and gravity field.
- Photogrammetry is the science of making measurements from photographs.

Himalayas

Origin: The northward drift of the Indo-Australian plate resulted in its collision with the much larger Eurasian Plate. Due to which, the sedimentary rocks which were accumulated in the geosyncline known as the Tethys were folded to form the mountain system of western Asia and Himalaya.

Features:

- The Himalayas are geologically young and structurally folded mountains and represent the loftiest and one of the most rugged mountain barriers of the world.
- They form an arc, which covers a distance of about 2,400 km. Their width varies from 400 km in Kashmir to 150 km in Arunachal Pradesh.

Orientation:

- The general orientation of these ranges is from northwest to the southeast direction in the northwestern part of India.
- ► Himalayas in the Darjeeling and Sikkim regions lie in an east west direction.
- > In Arunachal Pradesh they are from southwest to the northwest direction.
- In Nagaland, Manipur and Mizoram, they are in the north south direction.
- The Himalayan mountains consist of three parallel ranges in longitudinal extent:
- ➤ Great Himalaya or Himadri: It is the northernmost and the most continuous range consisting of the loftiest peaks with an average height of 6,000 m. World's highest peaks are located in it.
- Lesser Himalaya or Himachal: To the south of Himadri, it is the most rugged mountain system and is known as Himachal or lesser Himalaya. The altitude varies between 3,700 and 4,500 m. It is well known for its hill stations like Kashmir, Kangra and Kullu Valleys.
- > Shiwalik: It is the southernmost range with an altitude varying between 900 and 1100 m. These ranges are composed of unconsolidated sediments brought down by rivers from the main Himalayan ranges located farther north.

There are large-scale regional variations within the Himalayas. On the basis of relief, alignment of ranges and other geomorphological features, the Himalayas can be divided into the following subdivisions:

- * Kashmir or Northwestern Himalayas.
- Himachal and Uttaranchal Himalayas.
- Darjeeling and Sikkim Himalayas.
- Arunachal Himalayas.
- **&** Eastern Hills and Mountains.



IMPORTANT FACTS FOR PRELIM

Adjornment Motion

Recently, an adjournment motion notice was moved in the Lok Sabha over the surveillance of key Indian personalities by a firm linked to the Chinese government.

Key Points

- Adjournment motion is introduced only in the Lok Sabha to draw the attention of the House to a
 definite matter of urgent public importance.
- It involves an element of censure against the government, therefore Rajya Sabha is not permitted to make use of this device
- It is regarded as an extraordinary device as it interrupts the normal business of the House. It needs the support of 50 members to be admitted.
- The discussion on this motion should last for not less than two hours and thirty minutes.
- However, right to move a motion for an adjournment of the business of the House is subject to the following restrictions. i.e. It should:
 - Raise a matter which is definite, factual, urgent and of public importance.
 - Not cover more than one matter.
 - > Be restricted to a specific matter of recent occurrence.
 - Not raise a question of privilege.
 - Not revive discussion on a matter that has been discussed in the same session.
 - Not deal with any matter that is under adjudication of court.
 - Not raise any question that can be raised on a distinct motion.

DAILY ANSWER WRITING PRACTICE

Qns. "Without a focus on habitat conservation, success of project tiger may lead to human animal conflict. Discuss.(250 words)

Ans.

- According to the 4th Tiger Census, there are approximately 2,967 tigers in India. Tigers count in India has increased from 1,411 in 2006 to 1,706 in 2010 and to 2,226 in 2014, marking the success of Project Tiger. Through this, India has achieved the goal of doubling the number of tigers as highlighted by the St Petersburg declaration 2010.
- However, according to the National Tiger Conservation Authority (NTCA), India can have a maximum of 3,000 tigers with respect to the available area of tiger reserves. As the current tiger population is reaching a maximum level of carrying capacity of the ecosystem, this could result in increased human-animal conflict.
- Increased Tiger population has resulted in Human-Animal Conflict, as the human population expands and natural habitats shrink, people and animals are increasingly coming into conflict over living space and food
- This conflict has become the main threat to the survival of many species as well as local human populations in different parts of the world.
- According to data from the Union environment ministry, more than 1,608 humans were killed in conflict cases involving tigers, leopards, bears and elephants between 2013 and 2017.

Reasons for Human-Animal Conflict:

- **Habitat Loss:** Only 5% of India's geographical area is in the protected area category. This space is not enough to have a full-fledged habitat for wild animals.
- A territorial animal like a male tiger needs an area of 60-100 sq km. But the area allocated to an entire tiger reserve, like the Bor Tiger Reserve in Maharashtra, is around 140 sq km.
- The territorial animals do not have enough space within reserves and their prey does not have enough fodder to thrive on.
- This has forced the wild animals to move out and venture close to human habitation in search of food, resulting in human-animal conflict.
- Increasing Infrastructure Development: Recent relaxations in norms to allow for a widening of highway and railway networks near these protected areas are the new threats, adding to the old ones of retaliatory poisoning and poaching.
- Apart from highways, railway and irrigation projects are coming up in tiger reserves. For example- the Ken-Betwa river interlinking project will submerge 100 sq. km of Panna Tiger Reserve.
- Also, wildlife experts estimate that 29% of the tigers in India are outside the protected areas.



Effects:

- Man animal conflict leads to crop damage, animal deaths, loss of human life, injuries to people, injuries to wildlife, livestock depredation, and low compensation for such incidents further leads to degraded living standards of the affected population.
- The outcome of this conflict is very severe and it not only results in the loss of crops to farmers but also in the decline of wildlife populations.

Way Forward

- According to the Wildlife experts, if wildlife protection is confined to reserves and parks alone, several species will stand at the brink of extinction.
- For example, the Great Indian Bustard, which is a Schedule-I animal. Despite having sanctuaries to itself, the bird has been driven to the brink of extinction.
- Co-occurrence approach: Building community participation in conservation is a better idea than just having protected areas.
- Events of Human-Animal conflict can be reduced by integrating early warning systems with simpler damage-prevention practices (such as improving fencing of crops or better livestock husbandry).
- Hunting of prey animals, such as deer and pig, needs to stop as they form the base for the growth of tiger and other carnivore populations.
- Efforts can be taken to better wildlife management practices and understanding of animal behaviour. So that people don't kill an animal out of panic.
- Crop insurance should be provided in the event of destruction by wild animals.
- Safeguarding Tiger corridors, building eco-bridges and such conservation measures can be part of corporate social responsibility.

Conclusion

The tiger population seems to be growing in various states which is a positive sign but as the country celebrates its conservation success, policymakers and scientists will have to put their heads together to devise more creative solutions and find homes for the increasing number of tigers, because without the focus on habitat conservation, the human-animal conflict is bound to rise.

DAILY QUIZ

1. With reference to Living Planet Index, consider the following statements:

- 1. It is released by the Zoological Society of London.
- 2. It is a measure of the state of the world's biological diversity based on population trends of vertebrate species in terrestrial habitats only.

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

- 2. Which of the following statements about Phytoplankton is not correct?
 - a) They reduce global warming by absorbing human-induced carbon dioxide.
 - b) They also serve as the base of the ocean food chain.
 - c) They can swim in the ocean water.
 - d) They are important bioindicators and their abundance determines the overall health of the ocean ecosystem.

3. With reference to the Phosphine, consider the following statements:

- 1. It acts as a biosignature.
- 2. It is only made naturally by aerobic bacteria.
- 3. It is also used as a chemical weapon.

Which of the statements given above is/are correct?

a) 1 only b) 2 and 3 only c) 1 and 3 only d) 1, 2 and 3 only

4. With reference to Adjournment motion, consider the following statements:

- 1. Adjournment motion is introduced only in the Lok Sabha to draw the attention of the House to a definite matter of urgent public importance.
- 2. Right to move a motion for an adjournment of the business of the House is subject to the restriction that it should not raise a question of privilege.

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

5. On which of the following rivers Mekedatu Project is located?

a) Tungabhadra **b) Cauvery** c) Krishna d) Vagai