Q: Consider the following statement:

- 1. National Metrology Institute (NMI) of India was established by Council of Scientific and Industrial Research (CSIR).
- 2. The Government of India enacted the "Standards of Weights and Measures Act" for the first time in 1956.
- 3. India is not the member of the General Conference on Weights and Measures (CGPM).

Choose the correct option from the codes given below:

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

Ans: a

Explanation:

- The CSIR-NPL, the National Metrology Institute (NMI) of India was established by Council of Scientific and Industrial Research (CSIR), New Delhi on January 4, 1947.
- The Government of India enacted the "Standards of Weights and Measures Act" for the first time in 1956 to ensure that every citizen has access to uniform standards of weights and measures those are traceable to the SI units.
- During the year 1957, India became member of the CGPM.

Q: Consider the following statement regarding General Conference on Weights and Measures (CGPM)

- 1. Ronna, Quetta and Ronto are the new unit for measuring wind.
- 2. Ronnagram can be used to measure weight of the Earth.
- 3. The CGPM also plans to resolve the issue of leap second.

Choose the correct option from the codes given below:

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

Ans: b

Explanation:

- This year CGPM has adopted 7 important resolutions including **new SI prefixes ronna** (10²⁷), **quetta** (10³⁰), ronto (10-²⁷) and **quecto** (10-³⁰).
- With this nomenclature, mass of the electron (1 quectogram) and weight of earth (1 ronnagram) can be expressed easily in SI units.
- The CGPM also plans to resolve the issue of leap second.

O: Consider the following statement regarding suicide in India:

- 1. Suicide rate has increased in last three year.
- 2. The most common reasons for suicide include family problems and illnesses.

Choose the correct option from the codes given below:

- a) 1 Only
- b) 2 Only
- c) 1 and 2
- d) None of the above

Ans: c

Explanation:

- In India, more than one lakh lives are lost every year to suicide, and it is the top killer in the 15-29 years category.
- In the past three years, the suicide rate has increased from 10.2 to 11.3 per 1,00,000 population, the document records.
- The most common reasons for suicide include family problems and illnesses, which account for 34% and 18% of all suicide-related deaths.

Q: Consider the following statement regarding Global Partnership on Artificial Intelligence (GPAI):

- 1. It is a congregation of 25 member countries
- 2. India had in 2020 joined the group as a founding member.
- 3. It works in collaboration with partners and international organisations.

Choose the correct option from the codes given below:

- a) 1 and 2
- b) 2 and 3

- c) 1 and 3
- d) 1, 2 and 3

Ans: d

Explanation:

- Global Partnership on Artificial Intelligence (GPAI) is a congregation of 25 member countries, including the US, the UK, EU, Australia, Canada, France, Germany, Italy, Japan, Mexico, New Zealand, Republic of Korea, and Singapore.
- India had in 2020 joined the group as a founding member.
- It is a first-of-its-type initiative for evolving better understanding of challenges and opportunities around AI.
- It works in collaboration with partners and international organisations, leading experts from industry, civil society, governments, and academia to collaborate to promote responsible evolution of AI and guide the responsible development and use of AI, grounded in human rights, inclusion, diversity, innovation, and economic growth.

Q: Consider the following statement:

- 1. Atoll refers to low-elevation islands situated on surfaces made of coral reef.
- 2. The coral reef platforms between Thoothukudi and Rameswaram in the Gulf of Mannar were notified as a marine biosphere reserve in 1989

Choose the correct option from the codes given below:

- a) 1 Only
- b) 2 Only
- c) 1 and 2
- d) None of the above

Ans: b

Explanation:

- In 2003, space-based investigations, using satellite remote sensing imagery, by researchers at the Space Applications Centre in Ahmedabad concluded that Ram Setu is not man-made, "but comprises 103 small patch reefs lying in a linear pattern with reef crest, sand cays and intermittent deep channels".
- Cays, also known as keys, refer to low-elevation islands situated on surfaces made of coral reef. Thus, it is reasonable to assume that Ram Setu is a linear ridge made of coral reefs and forms a shallow part of the ocean that is being constantly impacted by sedimentation processes.
- The coral reef platforms between Thoothukudi and Rameswaram in the Gulf of Mannar were notified as a marine biosphere reserve in 1989.