The National Institute of Ocean Technology is set to spearhead a 6,000-metre dive into the Indian Ocean, a mission to explore marine biodiversity and potential of the seabed. The National Institute of Ocean Technology (NIOT), is in the process of developing a manned submersible vehicle called 'Matsya 6000'. This would be in partnership with the Naval Science and Technological Laboratory (NSTL), The programme is called 'Samudrayan' on the lines of 'Gaganyan'. Dr. Ramadass and his colleagues aspire to capture some of the aura of the ocean depths when India's indigenous submersible, MATSYA6000, plunges into the bowels of the Indian Ocean, with a three person crew onboard. At 6,000 metres, this will be shallower. If India's mission — expected to take place in late 2024 or in 2025 — were to be successful, it would make it only one among six countries to have piloted a manned undersea expedition beyond 5,000 metres. The submersible, oxygenated and equipped with lifesupport, is capable of floating underwater and collecting soil and rock samples from the seabed with attached robotic arms. "Except for the turbulence of surface waves, the

journey down is expected to be much smoother," said Dr. Sathianarayanan, a scientist who manages multiple components of Samudrayaan. Ensconced in a spherical, titanium hull, three navigators— over a fortnight and about 1,500 km away. from Kanyakumari — will undertake multiple

trips, each lasting about 12 hours. he manned submersible facilitates the direct observation by the human in the deep ocean in exploring mineral resources rich in Nickel, Cobalt, rare earth, manganese and other resources which can be used for scientific analysis. MATSAY-6000 vehicle, has an endurance of 12 hours in case of emergency for human safety. Matsya 6000, being developed under the Deep Ocean Mission. It aims to search for deep-sea resources and minerals, flora and fauna, including microbes, and studying ways to sustainably utilise them.

Q 1. 'MATSYA6000' is a

A. Navy Ship

B. submersible vehicle

C. Indian navy submarine

D. None of them

Q 2. What is the goal of ‘MATSYA6000’

A. to find out important Mineral inside sea

B. find out important deep sea flora and fauna

C. Only B

D. Both A and B

Q 3. Who made ‘MATSYA6000’

A. NIOT

B. DRDO

C. ISRO

D. NASA

Q 4. How much endurance life

A. 8 hours

B. 12 Hours

C. 4 Hours

D. 14 Hours

Q 5. How much deep it can go

A. 6 km

B. 600m

C. 6000km

D. 4km