

Environmental Clearance for Neutrino Observatory

What is the issue?

 $n\n$

\n

- India-based Neutrino Observatory (INO) is proposed to be established in the Tamil Nadu section of the Western Ghats for furthering research.
- \bullet As the site is being mapped in an eco-sensitive, environmental clearances and other compliances are to be strictly adhered to. \n

 $n\$

What is the INO project?

 $n\n$

۱'n

- India-based Neutrino Observatory (INO) is a particle physics research project to primarily study the elusive sub-atomic particles called neutrinos.
- A neutrino (ν) interacts only via weak short range subatomic forces and gravity, which makes it very hard to detection it.
- Neutrinos typically pass through normal matter unimpeded and undetected, and its rest mass is almost zero (1 millionth of an electron).
- Its detection needs high-end instruments and an environment that is effectively shielded from other radiant interference.
- Hence, a cavern is being carved out at the depth of 1,300 meters (4,300 ft) below the Western Ghats stretch near Theni for establishing the research site.

\n

- The site will underlie more than 1000 meters of overhead rock that will effectively shield it from natural cosmic radiation from outside.
- The observatory is said to symbolise India's quest for research in particle physics and demonstrate intent to nurture centres of excellence.

Has environmental clearance been secured?

 $n\n$

\n

- The project has become controversial as the proposed site lies close to the Mathikettan Shola National Park, which is a biodiversity hotspot.
- About a year ago, the National Green Tribunal (NGT) had suspended the environmental clearance granted to the INO.
- But recently, the NGT verdict on the Rs. 1500 crore project was overturned and has been cleared by the Union Environment Ministry as a special case.
- The approval is only conditional and it needs the consent of the Tamil Nadu Pollution Control Board and the National Board for Wildlife.
- The Expert Committee had laid down 17 conditions for granting approval, but the clearance process was shabby and needs to be bettered.

 $n\n$

What are the problems with the environmental clearance?

 $n\n$

\n

- The approval was done under category B of the Schedule to the "Environmental Impact Assessment" (EIA) Notification, 2006.
- \bullet But it should have been ideally been treated as category A as the project lies just 4.9 km from an eco-sensitive national park. \n
- Additionally, EIA was done by the Salim Ali Centre for Ornithology and Natural History, which is an "unaccredited agency".
- \bullet While the project is indeed important, treating it as a special case to bypass the environmental clearance protocol sets a wrong precedent. \n

 $n\n$

 $n\n$

Source: The Hindu

\n

