International Thermonuclear Experimental Reactor (ITER)

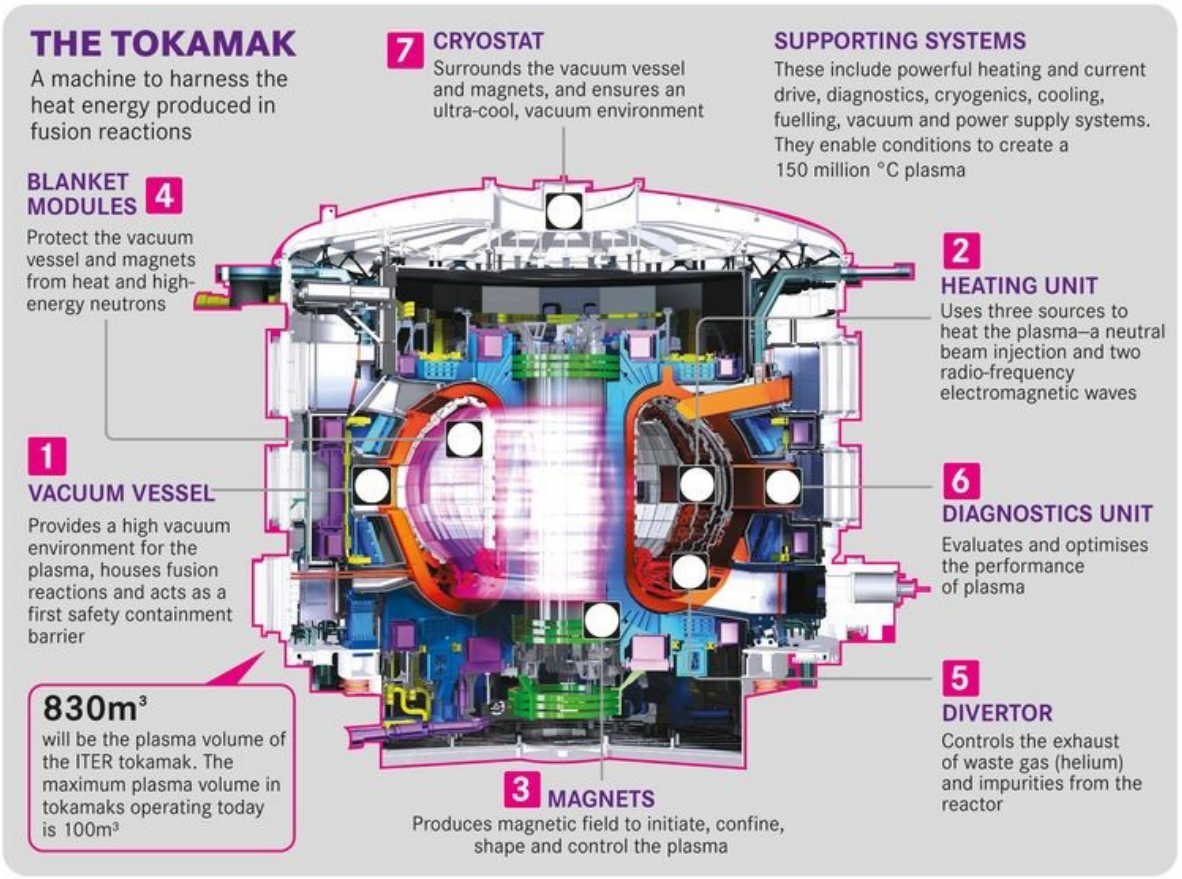
Why in news?

Prime Minister Shri Narendra Modi and the President of France, H.E. Mr. Emmanuel Macron, jointly visited the International Thermonuclear Experimental Reactor (ITER) in France recently.

- **ITER** – Is a large-scale scientific experiment intended to prove the viability of fusion as an energy source by building the world's largest tokamak.
- **Tokamak** – A magnetic fusion device that has been designed to prove the feasibility of fusion as a large-scale and carbon-free source of energy based on the same principle that powers our Sun and stars.
- **Location** – ITER is currently under construction in the *south of France*.

Fusion *is the nuclear reaction that powers the Sun and the stars, is a promising long-term option for sustainable, non-carbon-emitting energy.*

- **ITER Council** – Is the governing body that supervises the work of the ITER Organization.
- The ITER Council is responsible, in accordance with the ITER Agreement, for the promotion and overall direction of the ITER Organization.
- **ITER Organization** – Is an intergovernmental organization that was created by an international agreement signed in 2006, and formally established on 24 October 2007 after its ratification by all Parties.
- **ITER Members** – China, European Atomic Energy Community (Euratom), ***India***, Japan, Korea, the Russian Federation and the United States of America.
- **India** – Is among the seven ITER members contributing to the project over the last two decades.
- Around 200 Indian scientists and associates, as well as notable industry players such as L&T, Inox India, TCS, TCE, HCL Technologies, among others, are engaged in the ITER project.



References

1. PIB - ITER
2. Official website - ITER