

Take A Bow, Isro

Lunar landing is the most significant Indian scientific achievement. Let's build on it

August 23, 2023, will be a red-letter day for not just Isro but all of Indian science. Chandrayaan-3 successfully landed on the south pole of the Moon, making India the first country to achieve this feat. It represents a successful culmination of the third attempt when Isro inserted a spacecraft into lunar orbit. The very first attempt, Chandrayaan-1 in 2008, which was India's first deep space mission, resulted in the discovery of water molecules in the lunar surface. It confirmed prior scientific speculation and again catalysed a global interest in Moon missions. It's fitting that Chandrayaan-3 was the first to successfully land where no one else has.

India's space activities were launched in 1962, with the formation of INCOSPAR, the forerunner of Isro. Against odds, it's taken India into the rarefied league of the top four space nations. The others being the US, China and Russia whose attempt to land a craft on the Moon's south pole on Saturday failed. The lander and rover configuration of



Chandrayaan-3 carries sophisticated scientific payload for exploration. It will be followed globally because the south pole is where other space powers want to send human missions.

The next critical phase for Isro will be its maiden human spaceflight, Gaganyaan. The aim is to send astronauts to space and the level of sophistication involved in this mission is huge. At this moment, consider what Isro's dogged persistence and achievements mean to India's scientific community. On shoestring budgets, they have enhanced India's capabilities in communication satellites and remote sensing. It's a remarkable homegrown effort. An RTI application a few years ago showed that only 2% of the employees were from IITs and NITs. It reveals the depth of India's scientific potential and the scale of yesterday's achievement will provide a shot in the arm for Indian science.

India's fast-growing space start-up segment is sure to attract a lot more talent and funding. For these trends to complement Isro, the institutional mechanism created in 2020 to draw the private sector into space needs to raise its game. Particularly, IN-SPACe, the single window agency to promote and supervise private agencies in the space sector. More than 150 private entities have approached it to date and the number's bound to increase fast. If India is now in a position to harvest the benefit of a spurt in interest in basic sciences there's one reason: Isro.