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PSLV all set to ferry 31 satellites tomorrow

The PSLV rocket, after a shocking falter four months ago, will return to the launch pad at Sriharikota on Friday.

A successful flight of PSLV-C40 is expected to put behind the Indian light lift rocket's freak failure on August 31. During the forced hiatus, the Indian Space Research Organisation diagnosed why the nose cone of the previous C-39 rocket did not release the satellite; it took necessary corrective steps, officials said.

The launch is slated for 9.28 a.m. from the Satish Dhawan Space Centre in Andhra Pradesh. The countdown is set to begin Thursday morning.

Now among the world's favourite and reliable commercial launchers for small satellites, the upcoming 42nd PSLV will carry a total of 31 satellites including 28 paid riders.

The main payload, the 710-kg Cartosat-2F, is the seventh in the Cartosat-2 series and is built to work for five years. Said to have a high, sub-metre resolution, it is unofficially said to serve military surveillance purposes.

Small satellites

ISRO is putting up two of its own small satellites — a 100 kg micro satellite and the 11-kg nano satellite INS-1C. There are also 28 smaller customers.

The commercial satellites include three 100-kg class micro satellites and 25 nanosats (1-10 kg) from Canada, Finland, France, Korea the U.K. and the U.S.

The PSLV has so far launched 209 small and medium satellites for foreign countries and earned revenue for the commercial arm, Antrix Corporation Ltd.

ISRO will be trying a two-orbit feat with the PSLV for the second time. On Friday, just after 17 minutes from take-off, the main satellite will be released first into a 505-km orbit, followed by 29 others.

Almost 1.5 hours later, microsat will be released into a lower 359 km orbit. Between the two orbits, the engine in the fourth stage of the rocket will be re-started twice during the course.

The flight lasting 2 hours and 21 minutes will be the longest of the PSLV, about six minutes longer than C-35 which was launched in September 2016.

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