

Spacecraft used by IRF

IRF has instruments in operation on 17 spacecraft:

4 x ESA Cluster (23 years!)

4 x NASA Magnetospheric Multi Scales (MMS)

3 x ESA Swarm

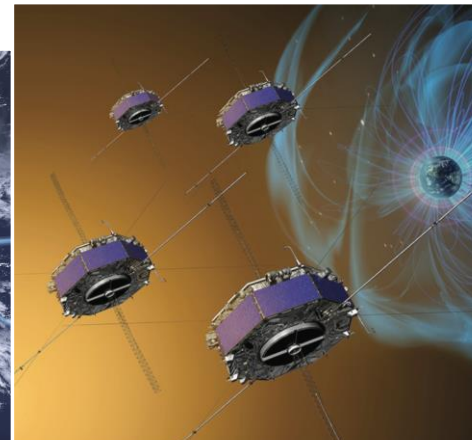
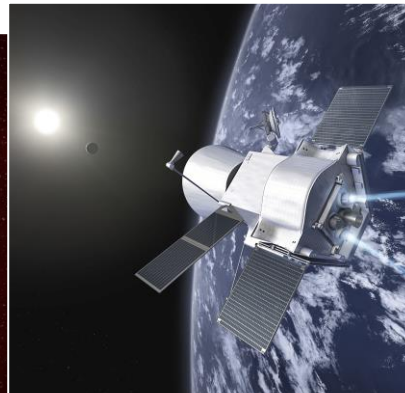
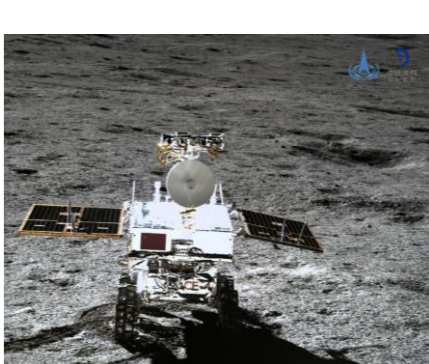
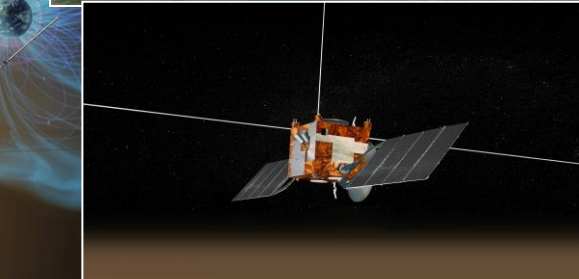
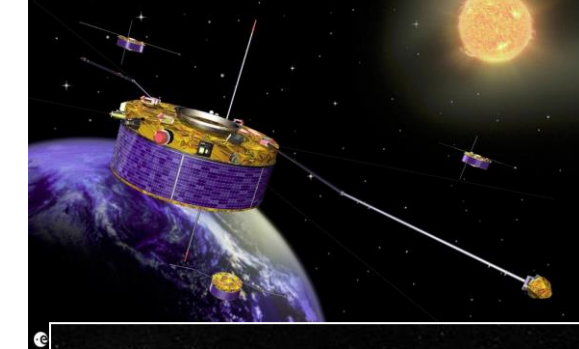
1 x ESA Mars Express (Mars, 20 years!)

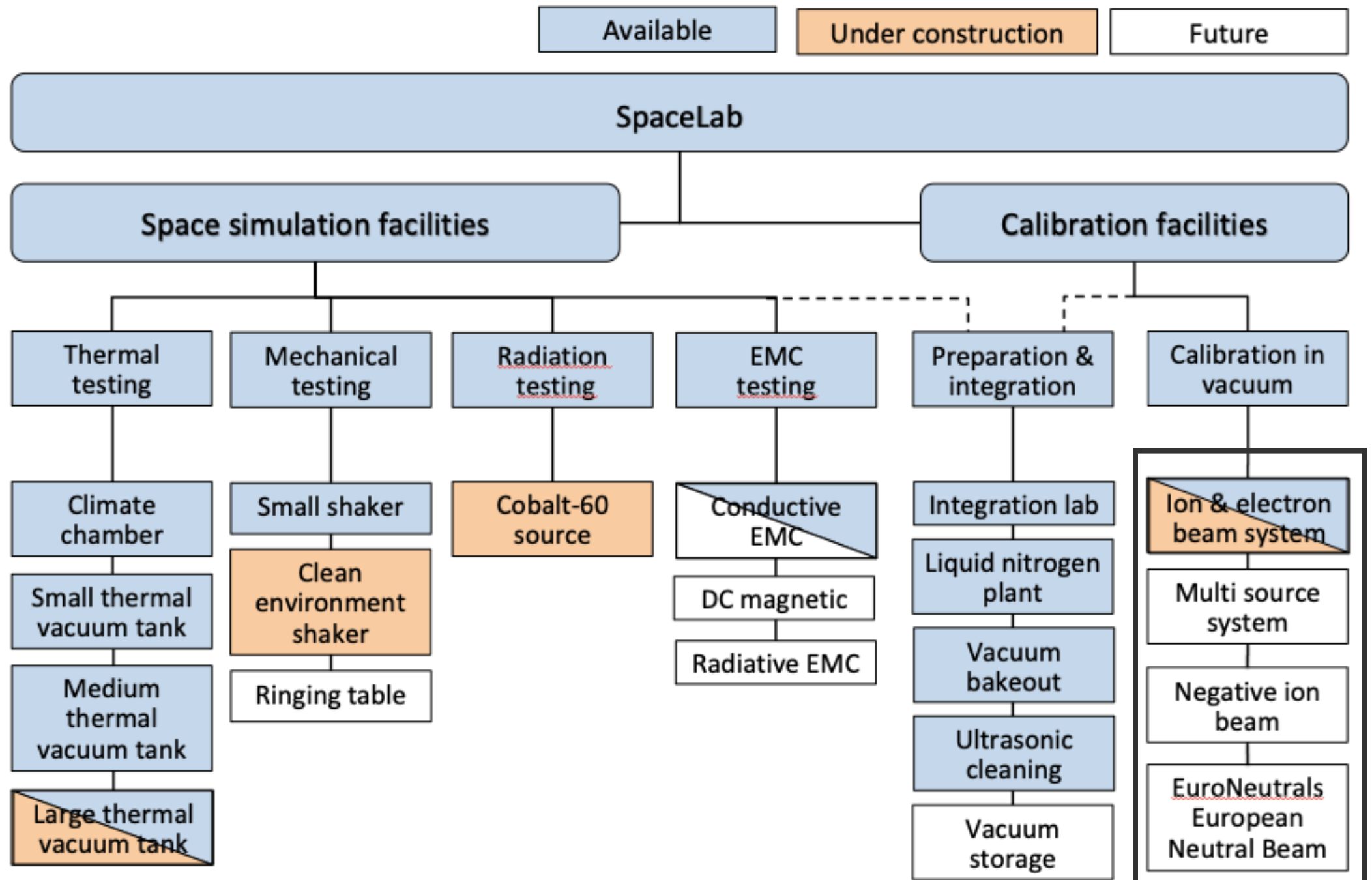
2 x ESA + JAXA BepiColombo (→ Mercury, 2025)

1 x CNSA Chang'e 4 (Lunar far side, 4 years)

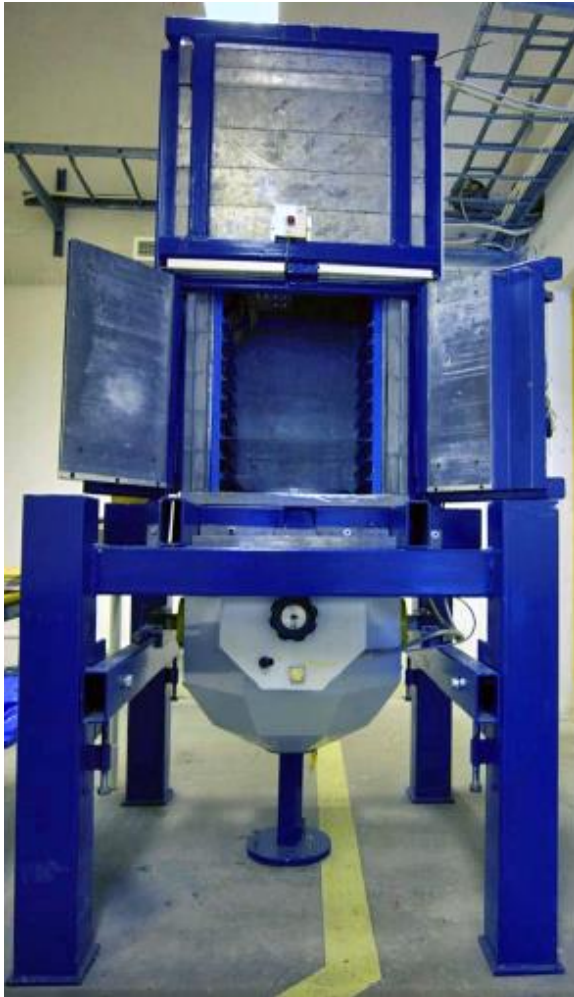
1 x ESA Solar Orbiter (→ orbit close to the Sun)

1 x ESA Juice (→ Jupiter, arrives 2031)

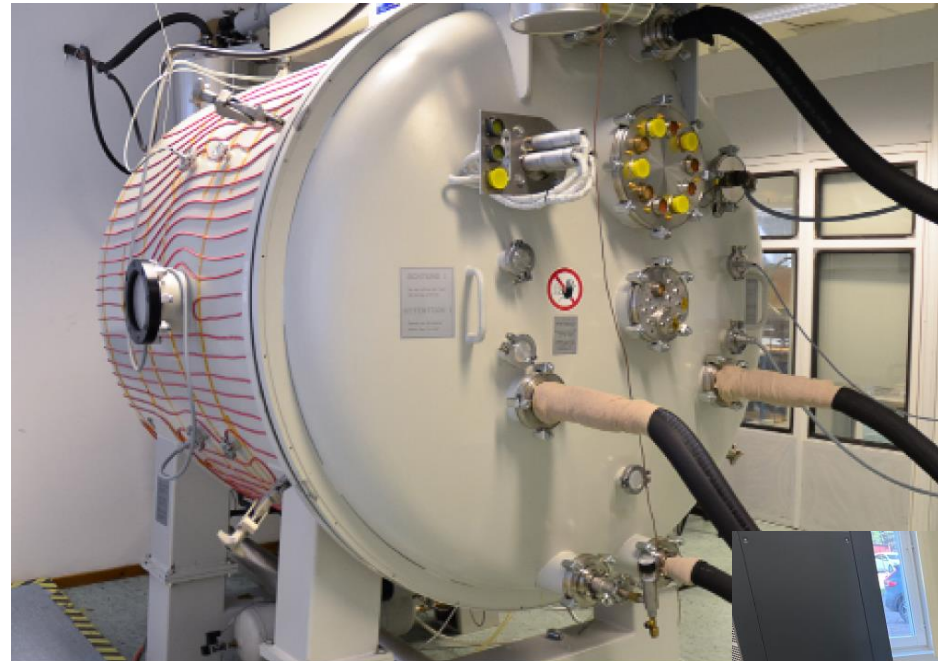




New SpaceLab equipment in 2023



Cobalt-60 radiation source moved from Uppsala to Kiruna



SOLAR SIMULATOR

Upgrade of the solar simulation vacuum system. UV solar lamps and liquid nitrogen cooling remains the same.



New vibration testing facility

Facilities at the LTU Kiruna Space Campus

Facilities at the start of RIT 2021:

- Cleanroom for Satellite Integration and Assembly
- Satellite Ground Station
- Balloon Experiment Preparation
- Friction-less Air-bearing Hardware-in-the-Loop Simulation Table
- Electronics Education Laboratory
- Project Laboratory

Additional facilities since the start of RIT 2021:

- Two Low Temperature Vacuum Chamber
- Penetrometry Testbed
- Two Solar Simulators
- Space Environment Testing Chamber
- Thermal-Vacuum Testing Chamber
- Industrial-grade Composite 3D-Printing Facility
- Extended Project Laboratory Space

Planned or in Preparation since the start of RIT Plus:

- Astronomical Observation Capabilities
- Diagnostics Lab
- Drilling Testbed
- Full Power Solar Simulator
- Propulsion Testbeds
- Satellite Simulation Testbench
- Light Gas Gun
- Plasma Wind Tunnel