

# First Soyuz launch from Europe's spaceport

Preparations for Russia's first space launch from French Guiana are fully underway. The Soyuz rocket, carrying a pair of satellites for Europe's *Galileo* navigation system, will blast off from the brand new Sinnamary spaceport near ESA's *Ariane 5* launch site

**SOYUZ 2-1b**  
**Height**  
50.7m



**Upper core stage**  
Ignites at lift-off

## Fregat upper stage

Houses first two Galileo satellites – Europe's answer to GPS system. Network of 30 satellites due to begin operating in 2014

**Third stage:** Improved engine burns longer using same amount of propellant. *Rocket can launch 3-tonne cargo to geosynchronous orbit (about 35,700km)*

## SINNAMARY SPACEPORT

**Lower core stage**  
Four booster rockets burn for two minutes, then jettisoned



**1 Launch pad:** Gantry withdrawn before launch

**2 Launch control**

**3 Rocket:** Can lift heavier payload due to proximity to equator – 3 tonnes compared to 1.7 at Baikonur

**4 Rail line:** Brings rockets to launch pad

**5 Rocket assembly**