**ESA Ministerial\_Navigation**

Ministers from the 22 ESA member states and Canada will gather in Lucerne, Switzerland on 1-2 December to discuss future spending priorities for the ESA space programme. ESA members fund a core programme of space activities but can also subscribe to optional programmes.

Before the meeting, each ESA directorate has drawn-up a list of priorities to be considered by ministers. In this report, we hear from ESA’s navigation directorate on its proposals for an innovation and support programme.

**A-Roll**

10:00:00

[LAUNCH OF LATEST 4 GALILEO SATELLITES ON 17 NOVEMBER 2016]

The latest launch for Europe’s new satellite navigation system, Galileo. With 18 satellites now in orbit, this highly accurate and civilian controlled network is more than halfway to completion.

[GALILEO IN-ORBIT ANIMATIONS]

Developed by ESA and now managed by the European Commission, the Galileo system will provide very accurate positioning and timing around the globe, and is fully compatible with GPS for the Open Service, used by the majority of citizens.

10:00:47

[Paul Verhoef, Director, Navigation Programme, ESA]

*As technology it has fantastic potential – everybody is using it, either in their cars or in their smartphones or professional applications, all the timing functions of the system are used for financial transactions and all sorts of other things. So there are many, many applications in everyday life.*

10:01:06

[GALILEO SATELLITE CLEAN ROOM GVS]

With the first Galileo services soon available, ESA is now looking to the future of satellite navigation with potential new applications and innovations. At the ESA Ministerial Council meeting, the Navigation Directorate is putting forward its proposal for the Navigation, Innovation and Support programme or NAVISP.

10:01:27

[Paul Verhoef, Director, Navigation Programme, ESA]

*With NAVISP we’re going to look at the integration of satellite navigation with terrestrial navigation, with communications, and we’re going to go well over the traditional boundaries of ESA in space and really look at how we can integrate space in the broader environment.*

10:01:43

[EGNOS Norwegian Air Ambulance Service helicopter flight GVs]

Satellite navigation technology like EGNOS, developed by ESA, is already accurate and reliable enough to be used by aircraft. NAVISP is aimed at investigating and increasing the range of services and benefits that could be provided by satellite navigation to European governments, businesses and citizens.

10:02:02

[Paul Verhoef, Director, Navigation Programme, ESA]

*We’re entering a new era with satellite navigation, it is relatively young. One can see a lot of people use it nowadays so we are starting a whole new field of work where satellite navigation needs to be integrated with terrestrial technologies in order to move forward to the future, in particular, for example, for autonomous driving.*

10:02:24

[Galileo in-orbit animation]

With Galileo, Europe now has a world leading satellite navigation system. With programmes such as NAVISP, ESA hopes to ensure that the full potential of the technology can be developed.

[ends]

10:02:37

**B-Roll**

10:02:37

Launch of Galileo 15-18, Kourou French Guiana, 17 November 2016 (no sound on some pictures)

10:05:34

Paul Verhoef, Director, Navigation Programme, ESA (Dutch)

10:06:37

Paul Verhoef, Director, Navigation Programme, ESA (German)

10:08:11

Paul Verhoef, Director, Navigation Programme, ESA (French)

10:09:12

Galileo satellite in clean room at Kourou, 6 March 2016

10:10:42

Animation: Galileo and Ariane 5 dispenser and latest constellation

10:12:49

[ENDS]