

Values and New Models for Space Exploration (10)
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BENEFIT MANAGEMENT IN THE NEW EUROPEAN SPACE EXPLORATION ENVELOPE
PROGRAMME (E3P): ESA'S ANSWER TO THE EUROPEAN SPACE EXPLORATION VISION IN
THE AREA OF SPACE 4.0.

Abstract

In December 2016 the ESA Council at ministerial level (CM16) adopted the resolution “Towards Space 4.0 for a United Space in Europe”. This resolution encourages ESA to “pursue and further strengthen European cooperation in the space sector for the benefit of European citizens”. Under the roof of this overarching CM16 resolution and the 2014 European Space Exploration Strategy, ESA Member States also adopted the new European Space Exploration Envelope Programme (E3P). E3P, a sequence of exciting missions serving three destinations. The E3P programme adopted at CM16 comprises exciting missions serving the three European exploration destinations. Three European astronauts will perform science on ISS (LEO). ESA will contribute to the Russian Luna 25, 26 and 27 missions. The European Service Modules 1 and 2 will be critical components for getting humans travelling to Lunar vicinity, for the first time since the Apollo programme. The ExoMars 2020 mission will bring European drilling technology to Mars. Furthermore, E3P includes a compelling science programme (SciSpacE), as well as activities preparing for future missions (ExpeRT), and a “Commercial partnerships” initiative to support European industry to step up commercial exploration services in the light of Space 4.0. Bringing the benefits to society. E3P integrates the European space exploration efforts into a single programme. It is ESA’s answer to a European vision on how to achieve the horizon goal to have Europeans working and living on Mars. This vision calls to guide exploration activities by the objective to bring at the same time back benefits to society in four strategic domains: knowledge, economics, global cooperation, and inspiration. Fuelled by this vision, E3P therefore introduces a benefits management process in the life cycle of each new project. It aims to optimise, monitor and communicate the positive outcomes of E3P. It will allow to better focus investments having benefit targets in mind and optimise and specify broader expected outcomes upfront. Conclusion. The new European Space Exploration Programme E3P is conceived as an open ended programme. It can evolve within the 2014 strategic framework. Benefit management is an integral part of E3P and addresses both direct programme outcomes and downstream benefits generating an even wider positive impact on society. As such E3P delivers the 2014 European exploration vision, fully supporting the ESA 2016 Council resolution “Towards Space 4.0 for a United Space in Europe”.