

## INTERPLANETARY EXPLORATION THROUGH ART-SCIENCE

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### Abstract

In collaboration with ESTEC scientist Bernard Foing and the ArtScience Interfaculty (Royal Academy of Art, The Hague), Synergetica Lab (Amsterdam) is evolving a creative platform fusing interdisciplinary artists with ESA researchers.

### 1. Towards a platform for art-science collaborations at ESTEC

Observations of the night sky were among humanity's earliest sources of artistic inspiration. From elaborate observatories to the myriad of literary, pictorial and musical endeavors sparked by sky gazing, art and astronomy intimately emerged together through a mutual, multi-sensory history. Since the arrival of the Space Age, the artistic imagination has become ever more closely engaged with the continuous breakthroughs of space exploration and planetary science. At present, numerous artists are joining forces with space scientists, collectively fostering unprecedented cross-disciplinary artworks with pivotal aesthetic, philosophical and educational impact.

In 2013, in collaboration with ESTEC scientist Bernard Foing and the ArtScience Interfaculty (Royal Academy of the Arts, The Hague), Synergetica Lab (Amsterdam) developed a course for bachelor's and master's students aimed at seeding interactions with ESA researchers. The students created artworks investigating space travel, astrobiology, radio astronomy, microgravity, remote sensing as well as extraterrestrial physics and architecture. After their initial presentation at the Royal Academy, these artworks were shown at ESTEC and Art Rotterdam 2014. These presentations prompted a variety of future collaborations and outreach opportunities, including the AxS Festival (Los Angeles, 2014) and a large-scale exhibition dedicated exclusively to space art at the Electriciteitsfabriek (The Hague, 2015).

### 2. Participants

#### Synergetica Lab

Founded in Amsterdam in 2007, Synergetica Lab is a platform for art-science collaborations with an emphasis on photonics, fluid dynamics, acoustics, quantum chemistry and cognitive science. In addition to facilitating the production of artworks in these domains, Synergetica serves as a curatorial and educational entity, disseminating interdisciplinary art works and art-science research. In 2011, Synergetica was selected as the Dutch representative of Studiolab, a 12-country European Commission initiative bringing together major players in scientific research with centres of excellence in the arts and experimental design including Le Laboratoire (Paris), Science Gallery (Trinity College Dublin), Royal College of Art (London), Ars Electronica (Linz) and MediaLab Prado (Madrid).

#### ArtScience Interfaculty

As part of the ArtScience Interfaculty, the Royal Academy of Art and the Royal Conservatoire in the Hague have been offering a two-year interdisciplinary master since 2002. At the ArtScience Interfaculty students and teachers are developing new forms of interdisciplinary art, and the goal of the teaching programme of the Interfaculty is to investigate and possibly shape the intersection between artistic concepts and recent developments in science and technology.

