

## 'Speculations and Science'. Where imagination meets science.

### Studium Generale Programme, Commercial Practice, year 3.

**date:** November 1 2017  
**time:** 9.00 – 12.30 (public program) / 13.15 – 17.00 workshops (WdKA)  
**location:** Science Tower, Erasmus Centre for Entrepreneurship, Marconistraat 16 (9<sup>th</sup> floor), Rotterdam, <http://rotterdamsciencetower.eu/>

#### Theme

The Studium Generale program 'Science and Speculations' focuses on the value of curiosity driven research for a future society, culture and economy. Erasmus MC has expressed the need for visual communication of experimental scientific research, in order to show its relevance to a broader audience. What could be the role of speculation, experiment, serendipity and imagination for science and innovation? What happens when art, design and science meet? Collaborations between these fields provide new professional opportunities for artists, designers, animators, data designers and other fields of visual communication.

#### Aim

Erasmus MC and Willem de Kooning Academy invite their students (3<sup>rd</sup> year Commercial Practice) and staff to an interactive seminar that explores and discusses collaborative encounters between the Arts and Sciences. **Starting point is the research question: how to tell the story of experimental scientific research through speculation, storytelling and visualisation?**

#### Audience

Students from WdKA, students from the ErasmusMC PhD program, scientists, artists, designers.

#### Programme outline

The morning session introduces speakers from design, art, science, journalism. In their work, science, art and design merge. They will elaborate on the research question from their specific professional perspectives. In their presentations, questions for the afternoon session will be addressed.

The afternoon session includes a design challenge for WdKA students of Commercial Practice, year 3: Data Design (data visualization), Branding (communication, awareness), New Frontiers (speculation, bio design) and Service Design (designing human experiences).



Clever Francke, Living Cells

#### PROGRAMME

**Moderator:** [Michelle Kasprzak](#)

- 9.00 – 9.10**      **Opening: Jeroen Chabot (dean WdKA), Rini de Crom (director Education and Research, Erasmus MC).**  
How could collaborations between science, art and design be established and organized?  
Where do art, design and science meet?
- 9.10 – 9.20**      **Program introduction: Joyce Lebbink, PhD (Molecular Science, Erasmus MC)**  
Dr. Joyce Lebbink will discuss the urgency of visually communicating experimental scientific research for a broader audience. Collaborations between science and the arts could lead to new professional opportunities for artists, designers, animators, data visualisers.
- 9.20 – 9.40**      **Science and/ in Society: [Hidde Boersma](#), scientist, journalist, film maker.**  
Hidde Boersma will discuss how society is built on fundamentals of basic research. What big societal issues are connected to fundamental research? How is this communicated? Topics include the role of mass media in communicating science: populism, media speculations, facts and/or fictions, fake news and finding truth in science.
- 09.40- 10.00**      **On speculation, science, communication: Paulien Melis, Creative Care Lab Waag Society.**  
What is the role of artists and designers in communicating science and scientific research?  
How speculations can be used to raise both questions and awareness.
- 10.00 -10.20**      **Empathic Experiences: [Frank Kolkman](#), experimental designer.**  
Artist Frank Kolkman pushes the boundaries of medical science and its public perception. His projects 'Outrospectre' and 'Open Surgery' show how to make possible scenarios in medical science visible and almost tangible through speculative design. This speculation and his close collaboration with scientists create new insights, for example, by enabling us to feel the patients' experiences. How can we explore extreme scenarios of empathic experiences, for example, in Service Design?

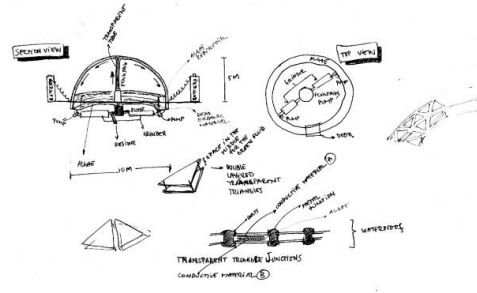


Frank Kolkman, Outrospectre

- 10.20- 10.40**      **coffee break**
- 10.40- 11.00**      **Communicating Science. David Koop, strategist, [Havas /Lemz](#)**  
Advertising agency Havas/Lemz intends to raise awareness for complex and sensitive subjects in society. A famous example is Sweetie, a campaign against online child abuse for Terre des Hommes. Taking their strategy as a starting point, they will discuss how to communicate science/scientific research to a broader audience and raise awareness for it. How do you (re-)brand science?

**11.00- 11.20** **Data Design: Science & Design: (im)possible collaborations, [Clever Franke](#) & Robert Hofstra (Clinical Genetics, Erasmus MC).**  
 Design agency C°F creates data driven experiences. An example is 'Living Cell' (a collaboration with the Genetics center Groningen), an interactive installation that allows viewers to delve into the micro-world of cells. C°F will discuss the (im)possibilities of working with scientific data and the need for specific skills for both scientists and designers.

**11.20- 11.40** **New Frontiers: SYMSE (Symbiotic Machines for Space Exploration) Raoul Frese, PhD (Biophysics Photosynthesis/ Energy, VU) & [Ivan Henriques](#), artist.**



Anthropocentric landscapes are characterised by reduced biodiversity and deteriorated ecosystems. In the meantime preparations are made for lunar and Martian habitats, requiring a tremendous advancement in the methods and instrumentation of ecosynthesis. How will scientists, engineers, artists and designers accomplish this? SyMSE aims to create an autonomous system for enhancing terrestrial ecosystems and facilitating atmospheric formation on other planets through artificial photosynthesis. Collaborators: VU Amsterdam, WdKA, CEFET-RJ, European Space Agency, FLiNT, CNRS, Synergetica (NWO- Research Through Design Award).

**11.40- 12.15** **Michelle Kasprzak, wrap up: interview with Joyce Lebbink, Robert Hofstra and Fred Balvert, communication officer Erasmus MC., introduction afternoon workshops.**

**12.15 - 13.15 BREAK**

**13.15 – 16.00 DESIGN CHALLENGE WDKA**

WdKA students will work in groups from their field (Data Design, New Frontiers, Service Design, Branding) in a pressure cooker format. Guidelines are the presentations and questions proposed by the speakers in the morning. The afternoon will be concluded with public presentations of the project.

**New Frontiers: SYMSE: Life on Mars?**

Tutor: Ivan Henriques, Michelle Kasprzak

How will scientists, engineers, artists and designers collaborate to make new scenarios for Mars?

**Service Design: Empathic Experiences**

Tutor: Sharon Vos

How can we explore extreme scenarios of empathic experiences in Service Design?

**Data Design: Science & Design: storytelling with science**

Tutor: Jeroen van Loon

How can we make stories out of scientific data and what does that imply for their 'truthfulness'?

**Branding: Communicating Science**

Tutor: Teun Castelein

How to communicate science to a broader audience and raise awareness for it? How do you (re-)brand science?

**16.00 – 17.00    Presentations, evaluations**