## SCI-VI SEMINAR LISBON about SCIENCE ANIMATION

# How Can Animated Science Visualization Help Our Research?

25-29 November 2024 // 9-17h // NOVA FCSH Lisbon, Colégio Almada Negreiros Campolide















Photo at NOVA FCSH Science Communication MA 2022

The Sci-Vi (science visualization) Seminar Lisbon is the fourth yearly event organized and funded by iNOVA Media Lab/ICNOVA and FCT, hosted by NOVA FCSH in collaboration with the Sci-Vi Initiative (from The Animation Workshop, VIA UC, Viborg, Denmark) between 25th and 29th of November 2024. This year's program is a fusion of the last three years' seminars, where 2021 focused on the theoretical syllabus, 2022 introduced a science communication matchmaking session between researchers and artists, and 2023 allowed PhD researchers to develop plans for science animation videos summarizing their investigations. Science animation production as a collaborative process offers new opportunities for flexible production planning and tools to keep up with the media novelties. The 2024 seminar summarizes visual science communication theory and practice, where the participants use their own research and develop a short animated video with animation students with the help of communication and animation professionals. Besides learning and practicing audiovisual science communication theory, this week-long seminar allows the participants to collaborate with the visual artist to create a short animated explainer about their research. Subscription is obligatory by filling out the online application form Link: <a href="https://forms.gle/uKtFBQYTsF2Rnebo6">https://forms.gle/uKtFBQYTsF2Rnebo6</a>. The maximum participant number is 10. The application deadline is November 8th, 2024.

The seminar introduces science visualization possibilities and collaboration opportunities with the animation industry. Sci-Vi Initiative seeks to explore and unfold science animation as a field and improve audiovisual science communication. The Sci-Vi Initiative Team has ten years of experience producing science animations and seven years of creating conferences, seminars, and workshops where they nurture the bridge-building between visual storytellers and science researchers. The Sci-Vi core team is based in Denmark and Portugal: Sia Søndergaard from TAW (The Animation Workshop/VIA University College) in Viborg, Peter Vistisen from Aalborg University, and Ágota Végső from NOVA FCSH, Lisbon. They invite a list of professionals to guide the participants. From Portugal, Miguel Ferreira (University of Coimbra) will discuss video abstracts, José Sotero (NOVA FCSH, Digital Media PhD student) will speak about digital transition. From Hungary, Viktória Szabó (MOME Anim, Budapest) will introduce the role of AI and immersive technologies in animation. Award-winning animation directors will show their experience working on explainers, including TED-Ed video lectures. Zsuzsanna Kreif, from Hungary, and Mette Ilene Holmriis, from Denmark. The Sci-Vi Seminar brings researchers, animators, and visual storytellers together to discuss, exchange knowledge, and learn from state-of-the-art case studies and ongoing research projects.

#### **2024 PROGRAM**

The first day will focus on science communication theory and practice, transforming research into digestible messages. The participants will attend five lectures to establish their knowledge about science communication and current trends. The PhD students will practice summarizing and communicating their research, then be paired up with animation students with whom they will work together during the week. The second day will focus on science animation in practice, introducing case studies and group work to discuss science animation possibilities. The guest speakers will supervise and mentor the group work and help form feasible ideas for the week. On the third day, the groups will record their short videos in front of the green screen at the iNOVA Media Lab, where the PhD students will summarize their investigation in a one-minute monologue. On the fourth day, the PhD students will work hand in hand on the video and help the artists finalize the animation. The animation will follow an easy, loop-based structure combined with the green screen recording in post-production. The fifth day is the presentation day when the groups share their progress, experience, and the end product.

Time	DAY 1 Sci-Vi Theory & Practice	DAY 2 Artist-Researcher Matchmaking	DAY 3 Pitch Practice & Video Recording	DAY 4 Consultations and Art Making	DAY 5 Post-production and Presentation
9:00- 10:00	Introduction Ágota Végső	From idea to product, DanStem videos Sia Søndergaard	Pitch Practice and Forming Questions Ágota Végső	Group work with supervision	Group discussing the day and the order of the presentations
10:00- 10:45	The Sci-Vi Principles Peter Vistisen	Artist talk by Zsuzsanna Kreif	Participant Preparation for recording		Participants' short pitch Depending on the number of
10:45- 11:30	Video Abstract Miguel Ferreira	Artist talk by Mette Ilene Holmriis	Recording & Animation planning		participants, 20 minutes + Q&A
11:30- 12:15	Digital Transition José Sotero	Producer talk by Ágota Végső			
12:15- 14:00	Lunch Break				
14:00- 14:45	Al and Immersive Technologies in Animation Viktória Szabó	Group Work with the supervision of Zsuzsanna Kreif and Sia Søndergaard	Recording & Animation planning	Group work with supervision	Participant Presentations
14:45- 16:00	Participants present their projects quickly Matchmaking session with the Animators				
16:00- 17:00	Daily progress report				Final Feedback Session

#### Presenter Bio's



**Ágota Végső** (HU) is an animated film director and PhD student in Digital Media at NOVA FCSH Lisbon, investigating the vital role of animation in science communication at iNOVA Media Lab. She finished her studies at the Moholy-Nagy University of Art and Design (MOME). Between 2014 and 2024, she worked for The Animation Workshop/VIA University College as a production manager and producer, leading a collaboration with TED-ed.



**Sia Søndergaard** (DK) is a Project manager and Producer at The Animation Workshop / VIA University College in Research, Development, and Projects, Center for Animation, Visualization, and Digital Storytelling in the pedagogical department Animated Learning Lab. Since 2017, she has been the Head of the Sci-Vi Initiative and the lead organizer of the yearly Sci-Vi Conference. Her main objective is to strengthen cooperation between scientists and visual storytellers.



**Viktória Szabó** (HU) is a creative producer and lecturer at the Moholy-Nagy University of Art and Design. Her areas of interest include immersive and interactive media, visual storytelling, and animation. Currently, she's conducting PhD research at Corvinus University of Budapest, focusing on the creative language of generative Al applications.



**Zsuzsanna Kreif** (HU) is an animation director and illustrator who graduated from the Moholy-Nagy University of Art and Design (MOME) in 2014. Her first film, Limbo-Limbo Travel, co-directed with Bori Zétényi, was selected for several festivals and was eligible for the Oscars in 2016. Between 2015-2018, she directed 13 episodes of the satirical TV series Candide, written and co-directed with Nándor Bera and Balázs Turai. Her last project, "Dino Doom On Desert Planet," was selected for the Annecy Residency program and was presented at MIFA in 2022.



Mette Ilene Holmriis (DK) graduated in 2009 from The Animation Workshop in Denmark. Currently, she is freelancing from Copenhagen, Denmark. Primarily educated in Character Animation with additional experience in illustration, storyboarding, layout, compositing, modeling, and production. In 2021, she worked on Cartoon Network's animated series called 'The Heroic Quest of the Valiant Prince Ivandoe' and, for the first time, in three distinct categories, Academy Award-nominated 'Flee' (Animated -, Documentary -, and International Feature).



**Peter Vistisen, PhD** (DK), is an Associate professor of Design & Visualization at Aalborg University in the Department of Communication & Psychology. He studies using animation as a functional design medium to facilitate communication of complex information. He has been teaching BA and MA students and has consulted for academic institutions and industry stakeholders. He is a member of the Sci-Vi Initiative and the advisory board of Viborg Municipality's Animation Strategy. His academic textbook is 'Sketching with Animation'.



**Miguel Ferreira, PhD** (PT), is the Head of the Science Communication Office at the University of Coimbra and a Video Editor. He received his PhD in 2024 from the History of Science and Scientific Education of the Institute for Interdisciplinary Research of the University of Coimbra with the thesis title: "Communicating Science Through Video: The Use of Video Abstracts in the Dissemination and Learning of Science(s)."



**José Sotero** (PT) is a Ph.D. candidate in Digital Media at the NOVA Faculty of Social and Human Sciences. José holds a Master's in Communication Sciences specializing in Cinema and Television. His master's thesis was awarded The Merit and Excellence Award 2021/2022 for Best Master in Communication Science. He is co-responsible for organizing the course "Artificial Intelligence for Education", promoted by iNOVA Media Lab (FCSH), and a visiting Professor at the NOVA School of Science and Technology.

### Previous Editions in 2021, 2022, and 2023

The spread of animation in education and science visualization has exploded due to technical developments like affordable and easy-to-use software, small and quality video formats, faster video streaming, and cheap mobile internet in the last ten years. It has been given a dominant role in classroom curricula with online education and on many other fronts due to its versatility. Reinforced by the need for online teaching during the 2020 COVID-19 pandemic, animation shows great importance in science communication. Using the opportunity of the growing need for storytelling training for science researchers and science communication training for visual storytellers, Sci-Vi wishes to organize seminars like this one to create more meeting points for researchers and artists. The role of animation is shifting from an applied art to a collaborative partner in research dissemination.





Sci-Vi Seminar Presentations by prof. Peter Vistisen and prof. Ana Figueiras on the 8th of October in 2021 at NOVA FCSH University Lisbon. Topic: Science for Society - Visual stotrytelling in science dissemination.

The first Sci-Vi seminar was held as an open seminar day on the 8th of October, 2021. The program contained a presentation about what Sci-Vi is, how animation contributes to the science communication field, and what are the critical discussion points regarding science animation production. Invited scholars, artists, and industry professionals to introduce their theoretical work, state-of-the-art case studies, and projects.

The second Sci-Vi Seminar was on the 25th of October, 2022. The participants enjoyed a more active and productive workshop-like seminar with a matchmaking session with visual artists. The ultimate aim was to spark interest and make science visualization project plans that help us map the science animation needs in research communication.



Matchmaking session and audio-visual project discussion between the Science Communication MA students and the Sci-Vi Animation Artists at NOVA FCSH University Lisbon /Sci-Vi Seminar on the 25th of October in 2022/.









Presentations and Artist-Researcher Discussion on the Sci-Vi Lisbon seminar on the 26th and 27th of October 2023.

The third Sci-Vi seminar occurred on the 26th and 27th of October, 2023, and had two main parts. The first day's program focused on science communication theory and practice, pitch training, and transforming research into digestible messages. In the first two hours, the participants attended three lectures, establishing their knowledge about science visualization as an academic discipline and learning about guiding principles for discussions, production details, and examples from the industry. After lunch, they practiced summarizing and communicating their research and collecting ideas for potential animated dissemination of their current topic.

The second day focused on science animation in practice, introducing case studies and creating groups where each PhD student discussed the possibilities of visual communication with the guest artists. Each participant had time to consult with both of the invited artists to collect various communication experiences. The consultation with the artists happened in groups to allow the participants to listen to each other's discussions and open new perspectives. After the seminar, the participants and the artist provided feedback built into the structure of the 2024 seminar edition.