

# Nexus Experiments: Participative projects and ethical discourse on neuro-

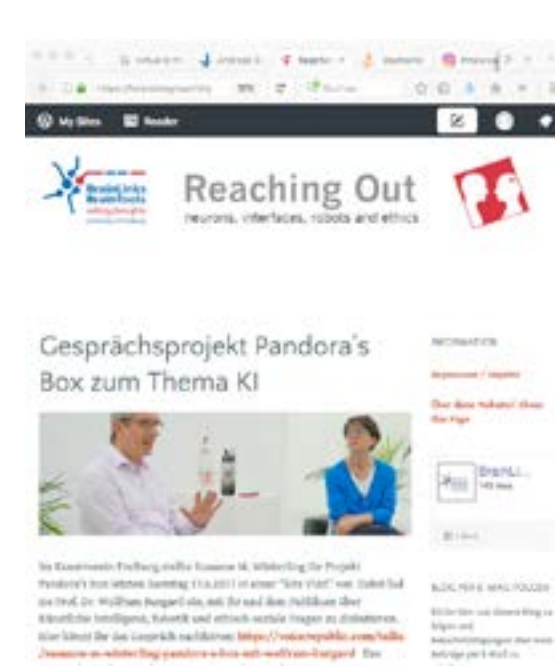
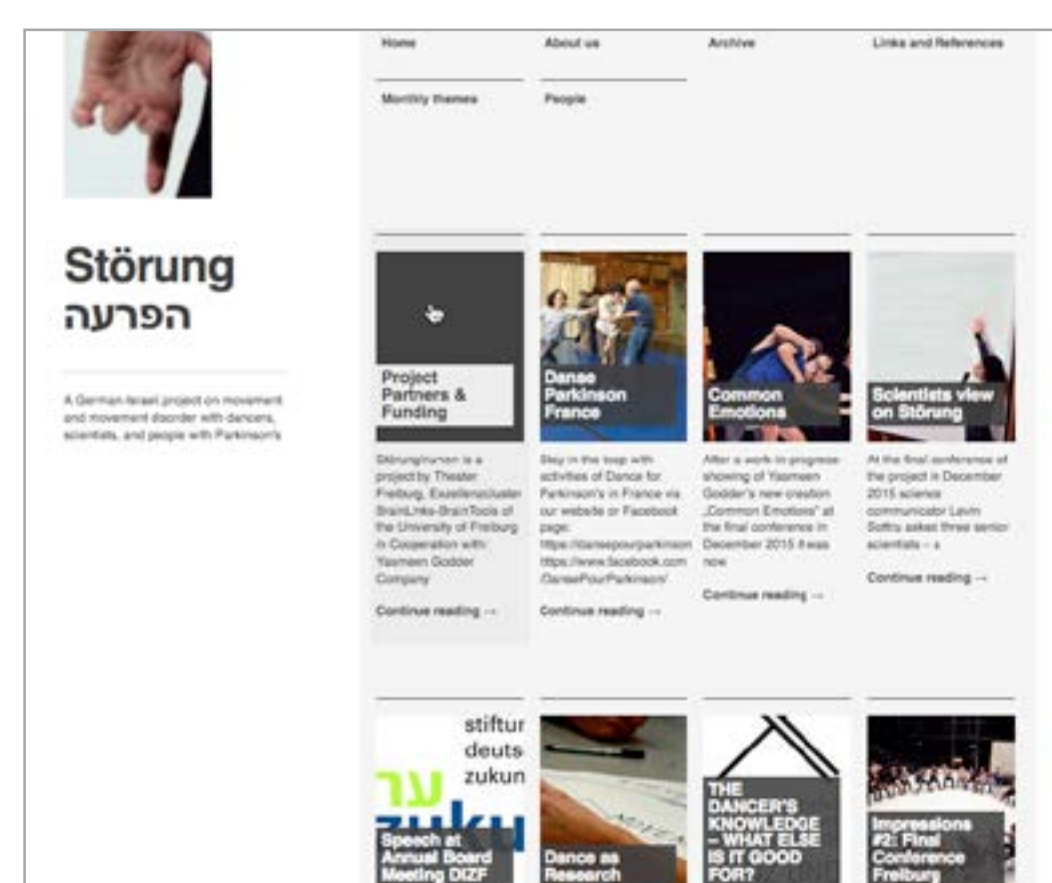
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## Introduction

Developing clinical applications of bi-directional communication between the brain and technical devices raises far-reaching ethical and societal questions. The Nexus experiments project fosters public engagement, exploring and implementing new ways of exchange about scientific findings and the conceptual background of BrainLinks-BrainTools – including their ethical implications. Endowing the classical science communication portfolio with novel and explorative approaches, we create forums for scientists to enter into a dialogue with the public.



Selected Projects

Completed

Current

November 8, 2012, Freiburg Theatre  
**"Technik im Gehirn: Was wollen wir können?"**  
 Intermedial discussion with a philosopher, a neurobiologist, and a neurosurgeon

November 23, 2013, University of Freiburg  
**CEREBROMATIK: Über Schnittstellen, Gerätschaften, Hirnbilder**  
 Enacted conversations by Hannah Hurtzig and Philipp Hochleichter (Mobile Academy, Berlin) with scientists from the cluster and guests

May 28-31, 2014, Freiburg Theatre  
**BrainDance Days: Tanz – Parkinson – Wissenschaft**  
 Internal and public discussions, lectures and performances

January-December 2015  
**"Störung / הפרעה"** (funded by the German Federal Cultural Foundation):  
 Continuation and extension of "BrainDance" with scientific and artistic partners from Israel

February - December 2015, Freiburg/Tel Aviv  
**"Close to the brain", The artist-in-residence programme:** Documentary filmmaker

November 25 2015, Bremen  
**Benjamin Staude & Rainer Dunkel — sensory neuronal network** - Vernissage with presentation by Prof. Dr. Stefan Rotter

December 7-8, 2015, Tel Aviv, 18-19, 2015, Theater Freiburg,  
**"Störung / הפרעה"** final public events: scientific talks, performances and presentation of the documentary film

April 27 2016, Bernstein-Werkstatt Freiburg  
**Science Jam Nr. 7:** Die Gedanken sind frei? Bewegen Sie einfach den Kopf!

April - July, 2016, Kommunales Kino and University Film Club Freiburg  
**Science Fiction in a Reality Check:** five movie showings followed by discussions by scientists and high-school students

October 2016 - March 2017, Freiburg  
**"Close to the brain", The artist-in-residence programme:** writer Annette Pehnt

October 31 - November 4, 2016, Freiburg  
**Hirn-Strips: Neurotechnology as a graphic novel.** With the help of an illustrator, high-school students develop a graphic novel about life with a neurotechnological implant

November 21- 26, 2016, Museum für Neue Kunst Freiburg  
**Exhibition - Hirn-Strips:** Neurotechnology as a graphic novel

November 25, 2016, Museum für Neue Kunst, Freiburg  
**Science Jam 8** Scientific talk with live illustration by Ludmilla Bartscht

December 10 2016, Bernstein Werkstatt, Freiburg  
**Science Jam 9** Robots and ethics - a dramatic reading of Isaac Asimov's "The Bicentennial Man"

October 2016 – February 2017 Museum für Neue Kunst, Freiburg  
**Exhibition** discussed with scientists - "wer wir sind" by Herbert Maier

February 2 2017 Literaturbüro Freiburg  
**Reading** Annette Pehnt "I fell in love with my brain"

March 9 2017 E-Werk, Freiburg  
**Performance:** Harald Kimmig, Annette Pehnt, Ephraim Wegner "brain writes sounds"

March 15 2017 Brain awareness week special at the University Library, Freiburg  
**Café Scientifique 10** Rehabilitation using brain waves? (with Michael Tangermann)

April 2017 Bernstein Werkstatt, Freiburg  
**Café Scientifique 11** Surgery of Emotions: can and should we, operate depression?  
 with Volker Coenen and Thomas Schläpfer

May 4-6 2017 Sommercasino, Basel  
**Performance, Discussion and Talks** about Artificial Intelligence  
 at Science + Fiction Festival Basel with **Science Jam 11**

October 2017  
**Website** with online exhibition and interactive element

June 2018  
**Anthology** "Science, Art and Neuroethics: Transdisciplinary Collaborations to Foster Public Engagement" - Transcript Verlag  
 confirmed authors: Helga Nowotny (reprint), Alfred Nordmann (reprint), Markus Schmidt

Spring 2018  
 L'homme machine: the art of puppetry and the brain/body connection

Fall 2018, University College Freiburg  
 Neurotechnology and Art – How two fields collide

## Outlook

We will continue to accompany the research done at BrainLinks-BrainTools with tailor-made **hands-on activities** that foster public engagement and the ethical and societal discourse on neurotechnologies. Thereby, we will set one focal point on **human-machine interactions**. In addition, we want to develop a **theoretical framework** for our art/science approach through scientific publications and make the cluster internationally renowned for its special concept of proactively fostering the dialogue between scientists and society by exchanging views with different artists.



Documentation on the blog  
[www.brainblogreachingout.wordpress.com](http://www.brainblogreachingout.wordpress.com)

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