Alex Brandmeyer

CONTACT INFORMATION

Music Mind Machine group, NICI
Radboud Universiteit
Postbus 9104
6500 HE Nijmegen
the Netherlands

Voice: +31(0) 63 872 7897
Fax: +31(0) 24 361 6066
E-mail: a.brandmeyer@nici.ru.nl
WWW: www.alexbrandmeyer.com

RESEARCH INTERESTS

Music cognition, computational modeling, machine learning, music technology, neuroscience, perception

EDUCATION

Radboud Universiteit Nijmegen, Nijmegen, the Netherlands

M.S., Cognitive Psychology (Cum Laude), November, 2006

- Thesis Topic: "Real-time visual feedback in music pedagogy: Do different visual representations have different effects on learning?"
- Advisor: Peter Desain

University of California, Berkeley, California USA

B.A., Cognitive Science, December, 2000
B.A., English Literature (Cum Laude), December, 2000
B.A., Philosophy, December, 2000

ACADEMIC EXPERIENCE

Nijmegen Institute for Cognition and Information, Nijmegen, the Netherlands

Junior Researcher (40% time) **September, 2006 - present**
Develop studies using real-time visual feedback on expressive percussion performances. Assist in the development of long-term project research goals and planning. Co-taught Music Cognition class at Radboud University for Spring 2007 (also Spring 2006), including lectures, course materials, grading, and exams.

Research Technician (60% time) **August 2005 - present**
Provide technical and programming services for the Music Mind Machine group, within the context of the PracticeSpace and the Brain Computer Interfacing projects. Designed and programmed the PracticeSpace system for running experiments using real-time visual feedback for expressive percussive and piano performances. Developed and implemented a hardware setup for the running of experiments using high-density EEG recordings and an online real-time networked signal classification application for the purposes of developing an EEG-based BCI. Provided technical support for the MMM group, maintained group servers, network services, maintained the MMM recording studio.

VA Speech and Hearing Research Program, Martinez, California USA

Research Assistant/Technician **May 2001 - May 2004**
Conducted research and experiments on speech perception in noise. Designed experiments and synthesized experimental materials. Ran participants on experiments and hearing tests. Developed a paired database and psychoacoustics testing application to run experiments and collect data. Maintained and developed the research group's technical facilities, including computer systems, servers, research hardware and other equipment. Assisted in the writing of scientific papers and the organization of a workshop on speech perception in noise.

Center for New Music and Technology, Berkeley, California USA

Student Assistant **September 2000 - December 2000**

Master and archive a library of digitally recorded performances at CNMAT. Assist in the setup of a multi-channel audio and Max/MSP setup for a series of performances of compositions by CNMAT composer Ron Smith.

Publications

Divenyi, P., and Alex Brandmeyer. The role of stress-accent in the understanding of sentences in noise. Journal of the Acoustical Society of America 117(4):2623

Papers in preparation

Brandmeyer, A., Renee Timmers, and Peter Desain. Learning of expressive percussion performance under different visual feedback condtions.

Conference Presentations

Alex Brandmeyer, David Hoppe, Renee Timmers, Makiko Sadakata, and Peter Desain. PracticeSpace: A platform for real-time visual feedback in music instruction. Proceedings of 9th International Conference on Music Perception and Cognition (ICMPC9), Bologna, Italy.

David Hoppe, Alex Brandmeyer, Renee Timmers, Makiko Sadakata, and Peter Desain. The effect of real-time visual feedback on the training of expressive performance skills. Proceedings of 9th International Conference on Music Perception and Cognition (ICMPC9), Bologna, Italy.

Alex Brandmeyer. "Visual feedback in learning to perform music." Presented for the Summer School in Sound and Music Computing 2006.

Pierre Divenyi, Brian Gygi, and Alex Brandmeyer. Dissection of the cocktail-party Effect: Informational masking of a speech-analog target by a simultaneous speech-analog distractor. Presented at the Association for Research in Otolaryngology 2004 Mid-Winter Meeting.

Pierre L. Divenyi, Alex Brandmeyer. The cocktail-party effect and prosodic rhythm: Discrimination of the temporal structure of speech-like sequences in temporal interference. Presented at the 15th International Conference on Phonetic Sciences.

Pierre L. Divenyi, Alex Brandmeyer. Selective attention to a given stream affects the segregation of simultaneous speech-analog streams. Presented at the Association for Research in Otolaryngology 2002 Mid-Winter Meeting.

Professional Experience

Santarella, LLC, Tyringham, Massachusetts USA

General Manager **May, 2004 - August, 2005**

Helped in the initial startup of a small family business, running and maintaining a historical property in the Berkshire region of Massachusetts. Developed advertising and marketing campaigns, handled relations with clients and suppliers, performed maintenance and repairs on the property, installed and developed network and multimedia facilities through multiple on-site buildings.

Independent musician and performer, various locations

Performed as a DJ and computer-based musician in locations such as San Francisco, San Diego, New York, Massachusetts, Mexico, British Columbia, Quebec, and the Netherlands. Organized, promoted, and performed on a weekly basis at well known clubs and bars in the San Francisco area throughout 2002-2003. Recorded and performed with bands such as the Last Hobson, Jack the Original, and Mechanism.

Computer Skills

- Languages: Java/C, Visual Basic, Matlab, Max/MSP, Unix Shell scripting, XML/HTML, LaTeX, ActionScript, AppleScript, Lisp

- Applications: Reaktor, Ableton Live, Logic, Flash, Dreamweaver, Quartz Composer, common database, spreadsheet, and presentation software, SPSS, JMP
- Operating Systems: Mac OS (Server), Linux (Ubuntu), Windows (2000/XP Server).

LANGUAGES English (native), Spanish (intermediate), Dutch (intermediate), French (beginner)