

Curriculum Vitae
Youki Tanaka
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Contact

INSTITUTIONAL ADDRESS: Psychological & Brain Sciences, Dartmouth College
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Hanover, NH 03755

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Education

METHODS IN NEUROSCIENCE AT DARTMOUTH summer school AUG 2017
Dartmouth College, Hanover, NH

NEURAL SYSTEMS & BEHAVIOR summer school JUN 2017 - JUL 2017
Marine Biology Laboratory, Woods Hole, MA

Ph.D. student of PSYCHOLOGICAL & BRAIN SCIENCE SEP 2015 - PRESENT
Dartmouth College, Hanover, NH
Supervisor: Matthijs van der Meer

M.Sc. student of BIOLOGY (*transferred*) SEP 2014 - AUG 2015
University of Waterloo, Waterloo, ON
Supervisors: Matthijs van der Meer, Jeff Orchard

Thesis proposal title: Using generative models to assess decoding methods of covert variables: A case study of hippocampal place cell sequences

Honours B.Sc. in NEUROSCIENCE & COGNITIVE SCIENCE SEP 2007 - AUG 2014
University of Toronto, Toronto, ON

Supervisor: Franco Taverna

Project title: Development of a Neuroscience Concept Inventory

Supervisor: Richard Zemel

Project title: A study of Determinantal Point Process Latent Variable Models

Research Experience

Master's student at UOFW SEP 2014 - AUG 2015
Conducted analysis and modelling of neural spiking data. Piloted first behavioural experiment with rats.

Undergraduate Research Assistant at UOFT SEP 2013 - AUG 2014
Developed programming skills and data collection.

Publications

van der Meer MA, Carey AA, **Tanaka Y** (In press) Optimizing for generalization in the decoding of internally generated activity in the hippocampus. *Hippocampus*. Available at <http://biorxiv.org/content/early/2017/01/24/066670>.

Presentations and talks

Towards a principled decoding of hippocampal replay, *Brain & Behaviour Brown Bag Talks, Dartmouth College, Jan 24 2017*. (Departmental talk)

Tanaka Y, Carey AA, Ackerman E, Kemere C, Pezzulo G, van der Meer MA, Towards a principled decoding of hippocampal replay. *Society for Neuroscience, San Diego, CA, USA, Nov 15 2016*. (Poster presentation)

A generative approach to sharp-wave ripple associated sequence analyses, *HFSP Hippocampal Sequence Workshop, Rome Italy, September 30 2016*. (Invited talk)

Carey AA, **Tanaka Y**, van der Meer MA, Motivational state influences the content of hippocampal sequences. *Society for Neuroscience, Chicago, IL, USA, Oct 21 2015*. (Poster presentation)

Modelling and decoding internally generated hippocampal sequences, *Brain & Behaviour Brown Bag Talks, Dartmouth College, Oct 6 2015*. (Departmental talk)

Modelling neural spiking data using determinantal point processes, *University of Waterloo, May 12 2014*. (Invited talk)

Awards and Honors

Marine Biological Laboratory

Post-Course Research Opportunity Grant AUG 2017

University of Waterloo

International Master's Student Award SEP 2014

Science Graduate Student Award SEP 2014

University of Waterloo Graduate Scholarship APR 2015

Professional Memberships

Member, Society for Neuroscience 2015-2016

Skills

Spoken Languages Fluent in English and Japanese. Basic knowledge of French.

Scientific Computing Matlab, Python, Bash, R

Productivity & Development HTML, Markdown, L^AT_EX, Graphviz, Git/Github, Excel

References

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