Andrew H. Bahle

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Massachusetts Institute of Technology Department of Brain and Cognitive Sciences 43 Vassar Street, Cambridge, MA 02139, USA

EDUCATION Massachusetts Institute of Technology 2016-present PhD Student, Department of Brain and Cognitive Sciences; Supervisor Dr. Michale Fee; Presidential Singleton Fellow Center for Neurobiological Engineering **Woods Hole Marine Biological Institute** 2017 Methods in Computational Neuroscience 2010-15 University of Michigan, Ann Arbor BS, Neuroscience; BMA, Music Performance, Percussion Thesis: "A Functional Analysis of Circadian Light Input in the Larval Brain of Drosophila" RESEARCH EXPERIENCE **Graduate Student** 2016-present Massachusetts Institute of Technology; Supervisor: Dr. Michale Fee In vivo neural recordings in songbirds, development of unsupervised learning techniques for data analysis **Fulbright Fellow** 2015-16 Norwegian University of Science and Technology; Supervisors: Dr. Edvard I. Moser and Dr. May-Britt Moser Extra-cellular recordings of grid cells in rats exploring flat and undulating floors **Research Associate** 2013-15 University of Michigan, Ann Arbor; Supervisor: Dr. Orie T. Shafer Functional investigation of temperature and light inputs to the circadian clock neural network of D. melanogaster **UROP Biomedical Research Fellow** 2013 University of Michigan, Ann Arbor; Supervisor: Dr. Orie T. Shafer Morphological and pharmacological properties of putative targets of the circadian clock of Drosophila

HONORS/AWARDS	
Graduate Research Fellowship National Science Foundation	2018
Scholarship for Methods in Computational Neuroscience Course Marine Biology Lab, Woods Hole, MA	2017
Presidential Singleton Fellowship Massachusetts Institute of Technology	2016
Fulbright Grant U.S. Department of State	2015
High Honors in Neuroscience University of Michigan Honors Program	2015

Summer Undergraduate Research Fellowship

2014, 15

Department of Molecular and Cellular and Developmental Biology, University of Michigan

UROP Fellowship in Biomedical and Life Sciences

University of Michigan

Presidential Scholar in the Arts Finalist 2010

U.S. Department of Education

TEACHING

Teaching Assistant 2017, 2018

Massachusetts Institute of Technology, 9.40 Introduction to Neural Computation

SKILLS

Programming and Software: MATLAB, Python, LaTeX, Adobe Illustrator, OnShape/Fusion360

Languages: Norwegian (B1 proficiency)

Other: Extensive performance experience as a percussionist, in numerous musical traditions

PUBLICATIONS

Mackevicius, E.L.,* **Bahle, A.H.**, * Williams, A.H., Gu, S., Denissenko, N.I., Goldman, M.S., Fee, M.S., (2018) Unsupervised discovery of temporal sequences in high-dimensional datasets, with applications to neuroscience <u>bioArxiv</u>

Yadlapalli, S., Chang, J., **Bahle, A.H.**, Reddy, P.S., Meyhofer, E., Shafer, O.T. (2018) The Circadian Clock Constantly monitors Environmental Temperature to Set Sleep Timing. <u>Nature</u> 555, 98-102

Bahle, A.H., Moser, E.I. & Moser, M. (2016) Grid spacing is related to total distance traveled on non-planar surfaces. <u>Society for Neuroscience Poster</u>. 46th Annual Meeting. San Diego, California.

Schlichting, M., Menegazzi, P., Lelito, K.R., Zepeng, Y., Buhl, E., Benetta, E., **Bahle, A.H.**, Denike, J., Hodge, J., Helfrich-Förster, C., Shafer, O.T. (2016) A Neural Network Underlying Circadian Entrainment and Photoperiodic Adjustment of Sleep and Activity in *Drosophila*. *J. Neuroscience* 36(35), 9084-9096

Collins, B., Kaplan, H.S., Cavey, M., Lelito, K.R., **Bahle, A.H.**, Zhonghua, Z., Macara, A., Roman, G., Shafer, O.T., Blau, J. (2014) Differentially Timed Extracellular Signals Synchronize Pacemaker Neuron Clocks. *PLOS Biology* 12(9): e1001959.

References

Michale Fee, Ph.D.

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Edvard and May-Britt Moser, Ph.Ds.

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Orie Shafer, Ph.D.

Associate Professor of Neuroscience University of Michigan 734.615.0610 - oshafer@umich.edu

2013