#### **BIOGRAPHICAL SKETCH**

Provide the following information for the key personnel and other significant contributors in the order listed on Form Page 2. Follow this format for each person. **DO NOT EXCEED FOUR PAGES.** 

NAME	POSITION TITLE
Karla Kristine Frietze	Research Scientist for Institute of Metabolic
eRA COMMONS USER NAME	Disorders

EDUCATION/TRAINING (Begin with baccalaureate or other initial professional education, such as nursing, and include postdoctoral training.)			
INSTITUTION AND LOCATION	DEGREE (if applicable)	YEAR(s)	FIELD OF STUDY
University of Texas at El Paso, El Paso TX	B.S.	2011	Biology
Princeton University, Princeton, NJ	Ph.D.	2017	Molecular Biology
Weill Cornell Medicine, New York, NY	Postdoc	2017-2019	Biochemistry/Cancer Biology/Development
			Biology/Bovolopinoin

Please refer to the application instructions in order to complete sections A, B, and C of the Biographical Sketch.

### A. PROFESSIONAL POSITIONS:

- 2017-2019 Postdoctoral Fellow, Department of Neurological Surgery, Weill Cornell Medicine
- 2019- Volunteer Assistant Professor, Department of Molecular Biology, Rowan University School of Osteopathic Medicine
- 2019- Research Scientist, Institute for Metabolic Disorders, Hamilton, NJ 08691

#### **PROFESSIONAL AWARDS AND HONORS:**

- 2015-2017 New Jersey Commission on Injury Research Predoctoral Award 2015
- 2011 Award in "Biomedical Research" from the University of Texas at El Paso
- 2011 Award for "Outstanding member of the American Chemical Society 2011"
- 2010 The American Society for Virology Award for Outstanding Research Presentation at the SACNAS 2010 National Conference in Anaheim, California.
- 2010 Outstanding Presentation at 2010 ABRCMS (Annual Biomedical Research Conference for Minority Students) in Charlotte, North Carolina.
- 2009 Undergraduate DuPont Award Winner in General Biology at the 2009 National SACNAS Conference in Dallas, Texas.
- 2009-2011 RISE Scholar (Research Initiative for Scientific Enhancement)

## **B. PUBLICATIONS:**

 Frietze K.K., Pappy A.L. II, Melson J.W., O'Driscoll E.E., Tyler C.M., Boulanger L.M. (2016). Cryptic protein-protein interaction motifs in the cytoplasmic domain of MHCI proteins. *BMC Immunology* 17: 24-42. [PMID: 27435737] http://bmcimmunol.biomodcontrol.com/articles/10.1186/s12865.016.0154.z

http://bmcimmunol.biomedcentral.com/articles/10.1186/s12865-016-0154-z

 Tetruashvily, M.M., McDonald M.A., Frietze K.K., Boulanger L.M. (2016). MHC class I promotes developmental synapse elimination and aging-related synapse loss at the vertebrate neuromuscular junction. *Brain, Behavior, and Immunity* 56: 197-208. [PMID: 26802986] <u>http://www.sciencedirect.com/science/article/pii/S0889159116300095</u>

# PRESENTATIONS:

- Frietze, K.K., Tyler, C.M., Boulanger, L.M. MHCI regulates NMDAR-mediated synaptic transmission through cell-autonomous postsynaptic signaling mechanisms. Program No. 209.17/B28. 2015 Neuroscience Meeting Planner. Chicago, IL: Society for Neuroscience, 2015. Online.
- Frietze, K.K., Tyler, C.M., Boulanger, L.M. MHCI regulates NMDAR-mediated synaptic transmission through cell-autonomous postsynaptic signaling mechanisms. Molecular Biology Annual Retreat. Princeton, NJ, 2015.
- Frietze, K.K., Tyler, C.M., Boulanger, LM. (2014). Molecular mechanisms of neuronal signaling by MHCI immune proteins. Society for Advancing Chicanos and Native Americans in the Sciences 2014 National Conference in Los Angeles, CA.
- Frietze, K.K., Kramer, T., Enquist, L.W., 2010. The role of psuedorabies virus glycoprotein E (gE) in anterograde neuronal spread. Society for Advancing Chicanos and Native Americans in the Sciences 2010 National Conference in Anaheim, California.
- 5. Frietze, K.K., Kramer, T., Enquist, L.W., 2010. The role of psuedorabies virus glycoprotein E (gE) in anterograde neuronal spread. Annual Biomedical Research Conference for Minority Students in Charlotte, North Carolina.
- Frietze, K.K, Rodarte L., Johnson K.L 2009. Expression of West Nile virus proteins from Nodamura virus RNA replicons. Society for Advancing Chicanos and Native Americans in the Sciences 2009 National Conference in Dallas, Texas.