Title: Look, Ma, no gradient! Beyond simple differentiable functions in neural networks

Friday, 9/6/19 | 12pm-1pm | West Hall, W105
Speaker: Tom Arodz
Affiliation: Virginia Commonwealth University

Abstract: Traditional artificial neural networks are built from simple differentiable functions. In this talk, we will discuss techniques for dealing with functions lacking derivatives at some points in their domain. We will also explore neural networks built using elements that are not specified in terms of a simple function, such as the recently proposed ODE-Nets.

Bio: Dr. Tom Arodz is an Associate Professor in the Department of Computer Science at VCU. He holds BS-MS and PhD degrees in Computer Science from AGH University of Science and Technology in Krakow, Poland. He is also a graduate of the BS-MS program in Biotechnology at Jagiellonian University, Krakow. His research is focused on machine learning and its applications to biological data.