

Department of Statistics Purdue University

K. C. Sreedharan Pillai Memorial Lecture 2018

Friday, April 27, 2018 10:30 – 11:30 a.m. Wilmeth Active Learning Center (WALC) 2088

John Lafferty

John C. Malone Professor of Statistics and Data Science Yale University

Fruit Flies in Statistics and Machine Learning

Abstract

The fruit fly is the model scientific organism, employed as a laboratory animal to study the principles of life. Important advances in statistical methodology and theory have come from probing various statistical "fruit flies," as we illustrate with some examples. However, the use of fruit flies is less prevalent in recent machine learning research. With the accelerating use of machine learning to engineer complex systems, it is increasingly difficult to understand the statistical principles at play. We argue that there is a need for more methodical inquiry through the study of simpler "organisms" in machine learning research. Traditional statistical perspectives can be of service in this effort, but there is also room for more empirical approaches.

We will have a brief reception at 10:00 a.m. in HAAS 111 for Dr. Lafferty before his talk in WALC 2088.