



College of Science and Mathematics
Department of Mathematics

Infinite Horizons Lecture Series 2017 – 2018

Monday, March 19, 2018

SPEAKER: Dr. Kim Ruane, Tufts University

TITLE: *“Linear Algebra in the Real World”*

ABSTRACT: After telling you a bit about my days at KSU and how I ended up where I am today, I will discuss some applications of Linear Algebra that I like to cover when I teach this class for undergraduates. The main one I will focus on is the connection between Linear Algebra and the Page Rank Algorithm used by search engines such as Google. There is a very simple idea behind page rank and it uses elementary ideas from Linear Algebra and Graph Theory. Of course, the implementation of this simple idea is much more difficult but the linear algebra behind the basic principle is something we teach in a first year Linear Algebra course. I tend to present applications of linear algebra as soon as I start to see the students freaking out over the abstraction they are faced with in the course!