### 2013 MATH DISTINGUISHED LECTURE SERIES



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## DATE

October 17, 2013

## TIME

12:30 pm - 1:30 pm (Refreshments at 12:15 pm)

## LOCATION

3<sup>rd</sup> Floor Library Apse Kraemer Family Library

STUDENTS ARE STRONGLY ENCOURAGED TO ATTEND.

# SECRETS FROM DEEP HUMAN HISTORY

Spectacular advances in the technologies that produce genetic data and continued advancement in probability theory and statistical inference have combined to dramatically alter our understanding of deep human history. For example, the sequencing of ancient DNA from Neanderthal bones in Croatia and in Denisova Cave in the Altai Mountains came with new inferential strategies that led to the finding of their genetic signatures in modern humans. In this talk, we will explore the extent to which similar events took place in Africa where we have not yet found any ancient human remains to be sequenced.

Comparisons with primate genomes provide a second look at deep human history. Thus, we will spend a few minutes to introduce the steps our group is taking to examine how evolutionary pressures have impacted the human genome.



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