

Department of Mathematics
University of Houston

Special Colloquium

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Day: Wednesday, Jan. 28, 2015

Time: 2 PM - 3 PM

Room: 646 PGH

Title: **A 'frame'work for compressed sensing**

Abstract: Compressed sensing aims to reconstruct sparse signals (most coordinates are zeros) from very few linear measurements. There has been an explosion of research activities in this area during the last decade due to its wide applications, including imaging (e.g., photography, MRI), radar, secure communication and machine learning. In this talk, I will give a brief introduction to compressed sensing. Then I will focus on the compressed sensing problem in the setting where signals are sparse in a frame/dictionary with the goal to build up a framework for this setting. Some interesting and surprising results are presented along the way.