CCSU DEPARTMENT OF MATHEMATICAL SCIENCES MATH CLUB AT CCSU

COLLOQUIUM

Friday, December 4 2:00 – 3:00 PM Maria Sanford, Room 101

EXTRACTING INFORMATION FROM NMR EXPERIMENTS PRESENTED AS AN INVERSE PROBLEM

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ABSTRACT

We begin by presenting the basics of Nuclear Magnetic Resonance (NMR) for samples in solution. We will show how to extract information that is useful in obtaining protein structures using these experiments, and describe how this extraction of information can be presented as an inverse problem in an appropriate system of ordinary differential equations. In the case of NMR of solids, the information that is present is much more abundant, and it is much more challenging to isolate and obtain the information of interest. We will just outline the role of NMR of solids in structural biology, and only address a few basic techniques used in this experimental method.

For further information:

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