



The University of Mississippi
Department of Mathematics

Number Theory Seminar

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Friday, April 3, 2009
1:00 P.M.
Hume 331

Title: Zeros of the Riemann zeta function: Computations and implications

Abstract: The Riemann Hypothesis is now left as the most famous unsolved problem in mathematics. Extensive computations of zeros have been used not only to provide evidence for its truth, but also for the truth of deeper conjectures that predict fine scale statistics on the distribution of zeros of various zeta functions. These conjectures connect number theory with physics, and are regarded by many as the most promising avenue towards a proof of the Riemann Hypothesis. However, as is often true in mathematics, numerical data is subject to a variety of interpretations, and it is possible to argue that the numerical evidence we have gathered so far is misleading. Whatever the truth may be, the computational exploration of zeros of zeta functions is flourishing.

Faculty, Staff and Students are welcome to attend