

Statistics and Data Science Seminar

On the uniqueness and properties of the Parisi measure

Wei-kuo Chen (University of Chicago)

Abstract: Spin glasses are disordered spin systems originated from the desire of understanding the strange magnetic behaviors of certain alloys in physics. As mathematical objects, they are often cited as examples of complex systems and have provided several fascinating structures and conjectures. This talk will be focused on one of the most famous mean-field spin glasses, the Sherrington-Kirkpatrick model. We will present results on the conjectured properties of the Parisi measure including its uniqueness and quantitative behaviors. This is based on joint works with A. Auffinger.

Wednesday, February 25 at 4:00 PM in SEO 636