

## **HIGHER RATIONAL AND HIGHER DU BOIS SINGULARITIES AND APPLICATIONS**

**Speaker: Radu Laza**

**Stony Brook University**

**Time: Mon, Sep. 11, 2023, 16:00-17:00**

**Venue: Room Gu Lecture, Shanghai Center for Mathematical  
Sciences**

**Abstract:** Two standard notions of singularities are rational and Du Bois singularities. In this talk, I will discuss recent generalizations of these notions - the higher rational and higher Du Bois singularities. After reviewing the definitions and basic properties of these classes of singularities, I will discuss about some concrete geometric applications, specifically to the geometry of moduli spaces of Calabi-Yau varieties.