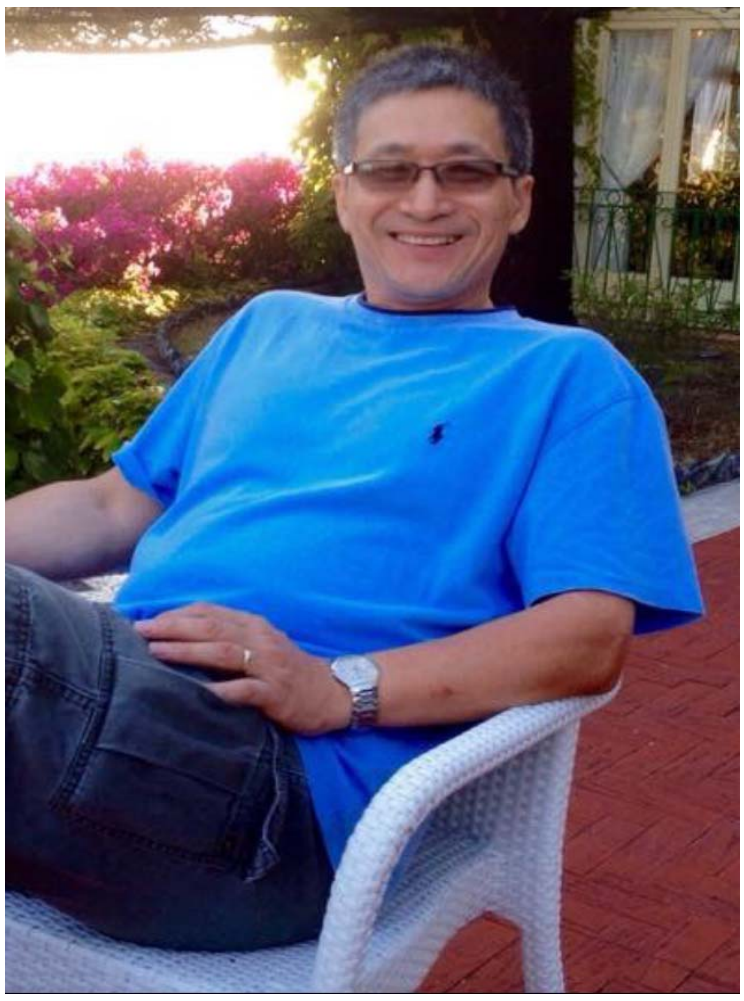
DISTINGUISHED VISITOR LECTURE SERIES



Zhang Shou-Wu

Princeton University, USA

About the speaker:

Prof Zhang has made significant contributions to number theory and arithmetic algebraic geometry, such as the Bogomolov conjecture, the Gross-Zagier formula, and the arithmetic dynamics. He has been a Sloan Foundation Fellow, a Guggenheim Fellow, and a Clay Research Scholar, and in 2011 he became a member of the American Academy of Arts and Sciences.

Torsion points and preperiodic points: the Manin-Mumford conjecture and its dynamical analogue

Lecture 1: 10 January 2017 (Tuesday), 10-11am, IMS Auditorium

I will talk about techniques used in different proofs of the Manin - Mumford conjecture and its analogue in dynamical systems: o-minimality geometry (Pila-Zannier), Arakelov geometry (Ullmo-Zhang), and perfectoid geometry (Xie-Qiu).

CM points and derivatives of L-functions: the Andre-Oort conjecture and Colmez' conjecture

Lecture 2: 12 January 2017 (Thursday), 10-11am, IMS Auditorium

I will talk about recent work about the Andre-Oort conjecture (Pila-Tsimmerman, et al), Colmez' conjecture (Yuan-S. Zhang), and some related work on derivatives of L-functions and Drinfeld's moduli of Shtukas over function fields (Yun-W. Zhang).

FREE ADMISSION

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