



Department of Mathematics
The Institute of Mathematical Sciences
The Chinese University of Hong Kong

數學系
數學科學研究所
香港中文大學

Phone: (852) 3943 7988 • Fax: (852) 2603 5154 • Email: dept@math.cuhk.edu.hk (Math. Dept.)
Room 220, Lady Shaw Building, The Chinese University of Hong Kong, Shatin, N.T., Hong Kong

Joint Geometric Analysis Seminar

(Part of MIST program)

Arnold-Thom conjecture for the arrival time of surfaces

Dr. Jingze, Zhu
Massachusetts Institute of Technology

Abstract

Following Łojasiewicz's uniqueness theorem and Thom's gradient conjecture, Arnold proposed a stronger version about the existence of limit tangents of gradient flow lines for analytic functions. In this talk, I will explain the proof of Łojasiewicz's theorem and Arnold's conjecture in the context of arrival time functions of mean convex mean curvature flows of surfaces. More generally, we prove the conjecture for mean curvature flows starting from two-spheres or generic closed surfaces and mean curvature flows with neck or non-degenerate cylindrical singularities. This is joint work with Tang-Kai Lee.

Date: 19 July 2024 (Friday)
Time: 10:30 am-11:30 am
Venue: Room 502a, AB1

All are Welcome