



西北大学数学学院

SCHOOL OF MATHEMATICS NORTHWEST UNIVERSITY

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Darboux transformations for the KdV-type hierarchies and related curve flows

报告人：吴志伟

报告时间：2025年3月20日16:00-17:00

报告地点：长安校区东学楼二层凌岭报告厅

报告摘要： There are intrinsic relation between integrable systems and geometry. Equations such as the sine-Gordon, the nonlinear Schrödinger and the KdV equations have natural geometric correspondence. In this talk, we will discuss curve flows in affine space, whose invariants under certain group action are solutions to the KdV-type hierarchies. Darboux transformation and Permutability formula are constructed to get explicit solutions.

报告人简介： 吴志伟，中山大学数学学院（珠海）副教授。主要从事可积系统及其相关领域的研究，如可积序列的约化理论、可积曲线流、达布-贝克隆变换等。论文发表于J. Differential Geom., J. Geom. Anal., Comm. Anal. Geom., Stud. Appl. Math., J. Math. Phys. 等期刊。

邀请人：康静

欢迎各位老师和同学踊跃参加!

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