

SCMS Seminar



ON THE TAUTOLOGICAL RING OF THE MODULI SPACE OF SURFACE OF GENERAL TYPE

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Time: 3:30 p.m.-4:00 p.m., Monday, November 20, 2017

Venue: Room 2213, East Guanghua Tower (Main), Fudan University

Abstract:

Moduli space is a space parametrizing a class of algebraic objects satisfying certain conditions, which sits in the center of studies in Algebraic Geometry. One of the important problems concerning the geometry of the moduli space is to compute their Chow rings. The tautological ring, a subring of the Chow ring, was introduced by Mumford to study the enumerative geometry (i.e., the generators of the Chow ring and the relations between them) of the moduli space of curves. In this talk I will propose problems concerning the structure of the tautological ring of the moduli space of surfaces of general type, which was inspired by recent results in the case of K3 surfaces.

$$\Delta y_i = \int_{x_i}^{x_{i+1}} y' dx$$
$$\int_{x_k}^{x_{k+1}} f(x, y) dx = \int_{x_k}^{x_{k+1}} y' dx = y(x)$$
$$\sqrt{(y_n + 0.5\tau k_1)^2 + (t_n + 0.5\tau)^2}$$