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## **Lax operator algebras**

Lax operator algebras form a new class of current algebras on Riemann surfaces introduced in connection with integrable systems. They generalize Kac-Moody and Krichever-Novikov algebras but, unlike those, do not split into the tensor product of any finite-dimensional Lie algebra and a functional algebra. They possess an almost graded structure and a unique (up to equivalence) central extension. The talk is based on the recent joint results of I. M. Krichever, M. Schlichenmaier and the author.