

Centro de Investigação em Matemática e Aplicações Departamento de Matemática Programa de Doutoramento em Matemática

Seminário / Seminar

Date: 24.10.2024, Room: 155 CLAV, Time: 15h00

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Higgs bundles: at the crossroads of algebra, geometry and physics

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Abstract: What do representations of the fundamental group of a surface in a Lie group and mirror symmetry (a branch of Physics arising from string theory) have in common? One common feature of these two subjects is that they share deep interactions with the theory of Higgs bundle over a compact Riemann surface. This talk will be a very brief overview of these two interactions, without entering in any detail. In particular, even the definition of Higgs bundle will be avoided (or at least we will not give too much attention to it).

Keywords: Higgs bundles, character varieties, mirror symmetry.

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