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## SEMINAR

on

### COMPLEX AND HYPERCOMPLEX ANALYSIS

Online, Departamento de Matemática

25/01/2021, 14:00

## Strange quantum phenomena on almost-Riemannian manifolds

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Almost-Riemannian manifolds are singular generalisations of Riemannian manifolds. In dimension two they admit smooth geodesics which can cross the singular set without losing regularity and give rise to a well-defined metric space. In this talk I will discuss some properties of the associated Laplace-Beltrami operator and its surprising (compared to Riemannian manifolds) properties, some already known in the literature and some obtained in a joint work with U. Boscain and E. Pozzoli.

#### Zoom Link:

<https://videoconf-colibri.zoom.us/j/84316713249?pwd=Y090WDBSVW1NNTFPbDd5MXJoTzNJZz09>

Meeting ID: 843 1671 3249

Password: 132742

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