

# SEMINARIO DE ANÁLISIS Y APLICACIONES

Viernes 24 de Noviembre 2023,

11:30–12:30, [Aula Naranja](#), ICMAT

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UPV/EHU & Ikerbasque

Directional singular integrals in two and higher dimensions

## Resumen:

In this talk I will give an overview of the theory of directional averages and singular integrals, firstly in dimension 2. We will see the main obstructions to the boundedness of these objects which will naturally lead us to the discussion of the connections with the Kakeya conjecture and the Stein and Zygmund conjectures. Finally, I will present a sharp estimate for directional singular integrals in codimension one, and general ambient dimension.

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