

Boğaziçi Math Seminar

Reversal in the Stationary Prandtl Equations

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Abstract:

We investigate reversal and recirculation for the stationary Prandtl equations. Reversal describes the solution after the Goldstein singularity, and is characterized by regions in which $u > 0$ and $u < 0$. The classical point of view of regarding the Prandtl equations as an evolution equation in x completely breaks down since u changes sign.

Instead, we view the problem as a quasilinear, mixed-type, free-boundary problem. Joint work with Sameer Iyer.

Date : Wednesday, July 3, 2024

Time: 10:00

Place: TB 130, Boğaziçi University