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Wellposedness, control, and observability theories for partial differential equations

Stabilization of the Navier-Stokes Equations by Tangential Boundary and Interior Control with Arbitrarily Small Support

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Abstract: We establish local uniform stabilization of the Navier-Stokes equations, in 2 and 3 dimensions, in the neighborhood of an unstable equilibrium, by virtue of a purely tangential action of feedback boundary and interior controls, with an arbitrarily small support, with no additional assumptions.

This is a joint work with Irena Lasiecka, University of Memphis, USA.