

Danchin, R.

Incompressible fluids with variable density. (Fluides incompressibles à densité variable.)

(French) [Zbl 1063.35132](#)

Sémin. Équ. Dériv. Partielles, Éc. Polytech., Cent. Math., Palaiseau 2002-2003, Exp. No. XI, 16 p. (2003).

The paper is devoted to several aspects of the behavior of an incompressible fluid with variable density. One proves successively: existence and uniqueness of global solutions, existence and uniqueness in two dimensions, uniqueness of regular solutions, energy inequality.

Reviewer: [Valeriu Al. Sava \(Iași\)](#)

MSC:

[35Q35](#) PDEs in connection with fluid mechanics

[76D03](#) Existence, uniqueness, and regularity theory for incompressible viscous fluids

Keywords:

[viscous fluids](#); [variable density](#); [existence](#); [uniqueness](#)

Full Text: [Numdam](#) [EuDML](#)