On the Euler-Boussinesq asymptotics of the Navier-Stokes-Fourier system

We consider the full Navier-Stokes-Fourier system in the singular limit for the small Mach and Froude, and large Reynolds and Péclet numbers, with ill prepared initial data on \mathbb{R}^3 . The Euler-Boussinesq approximation is identified as the limit system. This is a joint work with Eduard Feireisl.

References

[1] E. Feireisl, A. Novotný: Singular Limits in Thermodynamics of Viscous Fluids. Birkhäuser, Basel, 2009.