

A Nonlinear Stability Framework for Interfacial Wave Dynamics

Figures for Periodic Project Report

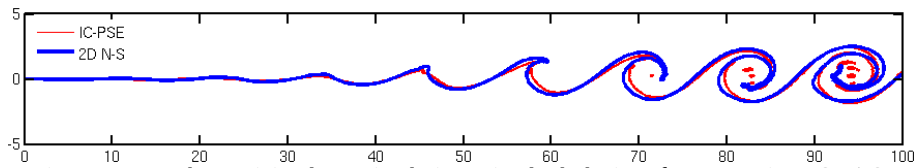


Figure 1: Two-phase mixing layer simulation using both the interface capturing PSE (IC-PSE) and direct calculations (2D N-S). The mixing layer has density ratio 2, viscosity ratio 5, velocity ratio 0.5, and Reynolds number 100.

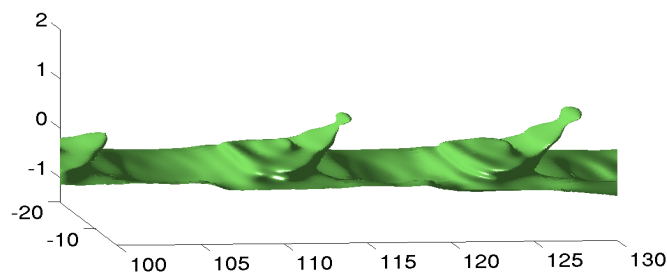


Figure 2: A three-dimensional mixing layer simulation, with density ratio 2, viscosity ratio 5, velocity ratio 0.5, and Reynolds number $Re=100$.

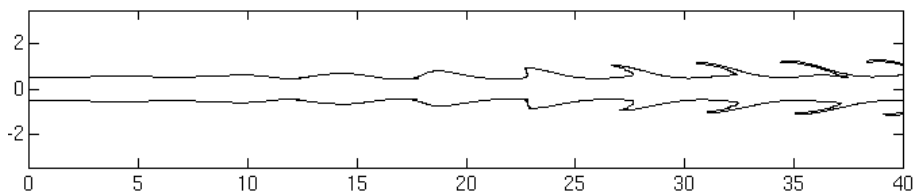


Figure 3: Nonlinear PSE calculation of a two-phase jet. The jet has a density ratio of 1, viscosity ratio 2, and Reynolds number 250.