

VOLUME 592

10 December 2007



Journal of Fluid Mechanics

CAMBRIDGE
UNIVERSITY PRESS

J. Carberry & J. Sheridan	Wake states of a tethered cylinder	1
B. Selvam, S. Merk, R. Govindarajan & E. Meiburg	Stability of miscible core-annular flows with viscosity stratification	23
T. Y. Hsu, H. Eloranta, P. Saarenrinne & T. Wei	Turbulent flow through a rectangular duct with a partially blocked exit	51
N. K.-R. Kevlahan	Three-dimensional Floquet stability analysis of the wake in cylinder arrays	79
A. Miliou, A. de Vecchi, S. J. Sherwin & J. M. R. Graham	Wake dynamics of external flow past a curved circular cylinder with the free stream aligned with the plane of curvature	89
R. R. Bambrey, J. N. Reinaud & D. G. Dritschel	Strong interactions between two corotating quasi-geostrophic vortices	117
M. E. Negretti, D. Z. Zhu & G. H. Jirka	Barotropically induced interfacial waves in two-layer exchange flows over a sill	135
S. Chakraborty & D. Chatterjee	An enthalpy-based hybrid lattice-Boltzmann method for modelling solid-liquid phase transition in the presence of convective transport	155
C. Nouar, A. Bottaro & J. P. Brancher	Delaying transition to turbulence in channel flow: revisiting the stability of shear-thinning fluids	177
A. T. I. Adamou, R. V. Craster & S. G. Llewellyn Smith	Trapped edge waves in stratified rotating fluids: numerical and asymptotic results	195
R. Lakkaraju & M. Alam	Effects of Prandtl number and a new instability mode in a plane thermal plume	221
G. J. Sheard & K. Ryan	Pressure-driven flow past spheres moving in a circular tube	233
R. J. Volino, M. P. Schultz & K. A. Flack	Turbulence structure in rough- and smooth-wall boundary layers	263
P. M. J. Trevelyan, B. Scheid, C. Ruyer-Quil & S. Kalliadasis	Heated falling films	295
T. Ishihara, Y. Kaneda, M. Yokokawa, K. Itakura & A. Uno	Small-scale statistics in high-resolution direct numerical simulation of turbulence: Reynolds number dependence of one-point velocity gradient statistics	335
M. S. Howe & R. S. McGowan	Sound generated by aerodynamic sources near a deformable body, with application to voiced speech	367
S. Nair & E. Kanso	Hydrodynamically coupled rigid bodies	393
L. K. Brandt & K. K. Nomura	The physics of vortex merger and the effects of ambient stable stratification	413
M. Zurita-Gotor, J. Bławdziewicz & E. Wajnryb	Swapping trajectories: a new wall-induced cross-streamline particle migration mechanism in a dilute suspension of spheres	447
P. Gualtieri, C. M. Casciola, R. Benzi & R. Piva	Preservation of statistical properties in large-eddy simulation of shear turbulence	471
C. J. Heaton	Optimal growth of the Batchelor vortex viscous modes	495
BOOK REVIEW		
	<i>Hydrodynamics and Sound</i> , by M. S. Howe	506
INDEX TO VOLUME 592		508

The Journal of Fluid Mechanics now accepts submissions via Manuscript Central
Go to <http://www.jfm.damtp.cam.ac.uk/> as an author

Cambridge Journals Online

For further information about this journal please
go to the journal website at:

<http://www.journals.cambridge.org/flm>

CAMBRIDGE
UNIVERSITY PRESS