Access leading journals in your subject

Cambridge Core

Explore today at cambridge.org/core
Physics
Books and Journals from Cambridge University Press

Cambridge University Press is a leading publisher of textbooks, handbooks and monographs that span all areas of physics, from condensed matter physics, to theoretical and mathematical physics.

We also publish a key cluster of journals including the Journal of Plasma Physics, Journal of Fluid Mechanics, and High Power Laser Science and Engineering.

For further details visit:
cambridge.org/core-physics
The effect of an unsteady flow incident on an array of circular cylinders

C. A. Klettner, I. Eames & J. C. R. Hunt

594 On the thermal equilibrium state of large-scale flows

A. Alexandri & M.-E. Brachet

626 Friction factor decomposition for rough-wall flows: theoretical background and application to open-channel flows

V. I. Nikora, T. Stoesser, S. M. Cameron, M. Stewart, A. Zampiron, I. Marusic & R. A. Falconer

665 Non-modal analysis of coaxial jets

D. Montagnani & F. Auer

697 Fractal sets of neutral curves for stably stratified plane Couette flow

J. J. Healey

729 Richtmeyer–Medikov instability on a quasi-single-mode interface

Y. Liang, Z. Zhai, J. Ding & X. Luo

752 Two-dimensional isotropic inertia–gravity wave turbulence

J.-H. Xie & O. Bühler

JFM Rapids (online only)

R1 Universal scaling law for drag-to-thrust wake transition in flapping foils

N. S. Lagopoulos, G. D. Weymouth & B. Ganapathisubramani

S indicates supplementary data or movies available online.
1 Taming turbulent fronts by bending pipes
D. Barkley

5 Dynamics in closed and open capillaries

39 Propagation of tides along a river with a sloping bed

74 Nonlinear behaviour of the Mack mode in a hypersonic boundary layer
S. A. Craig, R. A. Humble, J. W. Hofferth & W. S. Saric

100 Dewetting of liquid film via vapour-mediated Marangoni effect
S. Kim, J. Kim & H.-Y. Kim

115 Lock-in phenomenon of vortex shedding in oscillatory flows: an analytical investigation pertaining to combutors
A. B. Britto & S. Mariappan

147 Mathematical modelling of a viscid network
C. Mavroyiakoumou, I. M. Griffiths & P. D. Howell

177 Experiments on flows in channels with spatially distributed heating
A. Inasawa, K. Taneda & J. M. Floryan

198 On the detection of internal interfacial layers in turbulent flows
D. Fau, J. Xu, M. X. Yao & J.-P. Hickey

218 Modelling fluid deformable surfaces with an emphasis on biological interfaces
A. Torres-Sánchez, D. Millán & M. Arroyo

272 Effects of slowly varying meniscus curvature on internal flows in the Cassie state
S. E. Game, M. Hodes & D. T. Papageorgiou

308 Healing of thermocapillary film rupture by viscous heating
E. Kirklin & A. V. Andreev

Contents continued on inside back cover.

327 Mesoscale modelling of near-contact interactions for complex flowing interfaces
A. Montessori, M. Lauricella, N. Tirrelli & S. Succi

348 Three-dimensional effects on the transfer function of a rectangular-section body in turbulent flow
Y. Yang, M. Li & H. Liao

367 Velocity and spatial distribution of inertial particles in a turbulent channel flow
K. O. Fong, O. Améli & F. Coletti

407 Effects of surfactant on propagation and rupture of a liquid plug in a tube
M. Muraboglu, F. Romanò, H. Fujioka & J. B. Grotberg

438 Superconvergence of a fully conservative finite difference method on non-uniform staggered grids for simulating wormhole propagation with the Darcy–Brinkman–Forchheimer framework
X. Li & H. Rui

472 Recovery of wall-shear stress to equilibrium flow conditions after a rough-to-smooth step change in turbulent boundary layers
M. Li, C. M. de Silva, A. Rouhi, R. Baidya, D. Chung, I. Marusic & N. Hutchins

492 Lagrangian investigations of velocity gradients in compressible turbulence: lifetime of flow-field topologies
N. Parashar, S. S. Sinha & R. Srinivasan

515 Control of light gas releases in ventilated tunnels
L. Jiang, M. Creyssels, G. R. Hunt & P. Salizzoni

532 Motion of a non-axisymmetric particle in viscous shear flow
I. R. Thorp & J. R. Lister

Downloaded from https://www.cambridge.org/core. IP address: 52.11.211.149, on 14 Mar 2020 at 14:20:41, subject to the Cambridge Core terms of use, available at https://www.cambridge.org/core/terms.