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Nota di contenuto	1 Variational principle for three-dimensional steady-state flows of an ideal fluid -- 2 On the Riemann curvature of diffeomorphism groups -- 3 Sur la topologie des écoulements stationnaires des fluides parfaits (in French) -- 4 Conditions for non-linear stability of stationary plane curvilinear flows of an ideal fluid -- 5 On the topology of three-dimensional steady flows of an ideal fluid -- 6 On an a priori estimate in the theory of hydrodynamical stability -- 7 On the differential geometry of infinite-dimensional Lie groups and its application to the hydrodynamics of perfect fluids -- 8 On a variational principle for the steady flows of perfect fluids and its application to problems of non-linear stability -- 9 Characteristic class entering in quantization conditions -- 10 A note on Weierstrass auxiliary theorem -- 11 A letter to the editors (in Russian) -- 12 The stability problem and ergodic properties for classical dynamical systems -- 13 Remark on the branching of hyperelliptic integrals asfunctions of the parameters -- 14 Singularities of smooth mappings -- 15 Braids of algebraic functions and the cohomology of swallowtails -- 16 Hamiltonian nature of the

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Sommario/riassunto

Vladimir Arnold was one of the great mathematical scientists of our time. He is famous for both the breadth and the depth of his work. At the same time he is one of the most prolific and outstanding mathematical authors. This second volume of his Collected Works focuses on hydrodynamics, bifurcation theory, and algebraic geometry.