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On the generalized Hamiltonian structure of 3D dynamical systems. (English) Zbl 1020.35533
Phys. Lett., A 199, No. 3-4, 173-179 (1995).

Summary: The Poisson structures for 3D systems possessing one constant of motion can always be constructed from the solution of a linear PDE. When two constants of the motion are available the problem reduces to a quadrature and the structure functions include an arbitrary function of them.

MSC:

- [37J35](#) Completely integrable finite-dimensional Hamiltonian systems, integration methods, integrability tests
- [35Q99](#) Partial differential equations of mathematical physics and other areas of application
- [70H05](#) Hamilton's equations

Cited in **12** Documents

Full Text: [DOI](#) [arXiv](#)

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