

Abstract Submitted
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The $\text{Sp}(3,R)$ model and rotational phenomena in light nuclei¹ A.E. MCCOY, M.A. CAPRIO, Univ of Notre Dame — The symplectic model, based on $\text{Sp}(3,R)$ —the smallest algebra containing both the shell model Hamiltonian and the rotor algebra—has a close physical connection both to the microscopic shell model and the collective deformation and rotational degrees of freedom. Symplectic model calculations of light p -shell nuclei will be presented and discussed in the context of emerging rotational phenomena in no-core shell model (NCSM) calculations.

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Anna McCoy
Univ of Notre Dame

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