

## Discover Potential in a Search for Time-Reversal Invariance Violation in Nuclei

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Time reversal invariance violating (TRIV) effects in low energy physics could be very important for a search for new physics, being complementary to neutron and atomic electric dipole moment (EDM) measurements. In this relation, we discuss a sensitivity of some TRIV observables in neutron scattering and nuclear EDMs to different models of time-reversal (CP) violation and their dependencies on nuclear structure. As a measure of a sensitivity of TRIV effects to the value of TRIV nucleon coupling constant, we introduce a coefficient of a “discovery potential”, which shows a possible factor for improving the current limits of the EDM experiments by measuring nuclear TRIV effects.

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