

Abstract Submitted
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Numerical simulations of H_2^+ and H_3^{2+} in intense ultrashort laser pulses¹ DANIEL WEFLEN, NORIO TAKEMOTO, ANDREAS BECKER, JILA and Department of Physics, University of Colorado, 440 UCB, Boulder, CO 80309-0440 — We developed numerical simulation techniques to analyze H_2^+ and H_3^{2+} interacting with intense ultrashort laser fields based on the Crank-Nicholson method and the Born-Oppenheimer approximation. We present results for the ionization probabilities and photoelectron spectrum for both molecular ions, and for circularly polarized light as well as linearly polarized light both on and off the molecular axis.

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Andreas Becker
JILA and Department of Physics, University of Colorado,
440 UCB, Boulder, CO 80309-0440

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