

Abstract Submitted
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Creating a Classical Model for Helium in a Strong Laser Field
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WARE, Brigham Young University — We present a computational model of the
electrons in helium as they interact with an intense laser field. This work provides
computational insight into an experiment measuring radiation from electrons with
large wave packets. While this system is inherently quantum mechanical, many of
its interesting features can be modeled using classical point charges. We present the
model and show that it provides single and double ionization intensities for helium
consistent with quantum mechanics.

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