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Electron Impact Excitation of Adenine in the VUV. J WILLIAM MCCONKEY, JOSHUAH TROCCHI, JEFFERY DECH, WLADEK KEDZIER-SKI, University of Windsor — Dissociative excitation of adenine $(C_6H_5NH_2)$ into excited atomic fragments has been studied in the electron impact energy range from threshold to 300 eV. A crossed beam system coupled to a vacuum ultraviolet (VUV) monochromator is used to study emissions in the wavelength range from 110 to 200 nm. The beam of adenine vapor from a stainless steel oven is crossed at right angles by the electron beam and the resultant VUV radiation is detected in a mutually orthogonal direction. Excitation of H Lyman- α , the strongest feature in the spectrum, is considered in detail.

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