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Ashley K Wheeler*, James Madison University, Department of Mathematics & Statistics, Roop Hall 305, MSC 1911, Harrisonburg, VA 22807. *Positroidal components of principal minor schemes.*

A *positroid variety* is a special class of matroid variety whose defining matroid's independent sets consist of consecutive elements from the ground set. For an algebraically closed field K , let $\mathfrak{B}_{n,r,t} \subset \mathbb{A}_K^{n^2}$ denote the locally closed set of $n \times n$ rank r matrices whose size t principal minors vanish. We show the irreducible components of $\mathfrak{B}_{n,n-2,n-2}$ are positroidal. It follows, from a theorem of Knutson, Lam, and Speyer, that $\mathfrak{B}_{n,n-2,n-2}$ is normal, Cohen-Macaulay, has rational singularities, and its components' defining ideals are given by Plücker coordinates. (Received July 30, 2017)