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KONG et al.(10) **Pub. No.: US 2023/0231141 A1**(43) **Pub. Date: Jul. 20, 2023**(54) **ELECTRODES INCLUDING POLYMER
BINDER NETWORKS WITH BAMBOO-TYPE
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(57) **ABSTRACT**

The present disclosure provides an electrode for an electrochemical cell. The electrode includes a polymer binder network and a plurality of electroactive material particles. The polymer binder network includes a plurality of fibers defining the polymer binder network. Each of the plurality of fibers includes a plurality of beads and a plurality of filaments. The plurality of filaments extends from at least a portion of the plurality of beads, respectively. The plurality of electroactive material particles is in voids of the polymer binder network. In certain aspects, the present disclosure provides a single- or double-sided electrode component including a current collector and the electrode.

