962-16-1046   **Jessica K Sklar*** (`sklar@noether.uoregon.edu`), Department of Mathematics, University of Oregon, Fenton Hall, Eugene, OR 97403-1222. *Binomial Algebras and Rings.* Preliminary report.

Let K be a field. A binomial algebra is a K-path algebra of a finite quiver Γ, modulo relations of the form $p = \lambda q$, where $\lambda \in K$ and p and q are paths in Γ. We characterize binomial algebras as twisted semigroup algebras of algebra semigroups, and classify them up to isomorphism. We further define the class of binomial rings (which includes all monomial rings and binomial algebras), and note that each binomial ring has an associated binomial K-algebra, with which it shares several properties. (Received October 01, 2000)