

1116-11-1231 **Alan Koch*** (akoch@agnesscott.edu), 141 E. College Ave., Decatur, GA 30030. *Primitively generated Hopf orders in characteristic p .*

Let R be a complete discrete valuation ring with field of fractions K , $\text{char } K = p > 0$. Let H be a commutative, cocommutative K -Hopf algebra of p -power rank which is generated as a K -algebra by primitive elements. We construct all of the R -Hopf orders of H in K . Each Hopf order corresponds to a solution to a single matrix equation. We give some explicit examples of Hopf orders in the p^2 case. (Received September 18, 2015)