1024-13-206   **Greg G Oman*** (`oman@math.ohio-state.edu`), 5011 Godown Rd. Apt. D, Columbus, OH 43220. *Jonsson Modules over Commutative Rings.*

Let M be an infinite module over a commutative ring R with identity. M is said to be a Jónsson module provided every proper submodule of M has smaller cardinality than M. Building on results from Gilmer and Heinzer, we state several new results on these modules. In particular, time-permitting, we give a complete description of these modules over a one-dimensional Noetherian ring, a complete description over an arbitrary Noetherian ring assuming the generalized continuum hypothesis, and we give several necessary and sufficient conditions in order for a Jónsson module to be countable. We provide a few applications of these results and state some open problems. (Received January 09, 2007)