

Problem Set 5
Due Friday, November 2.

Algebra

Math 110A, Fall Quarter 2012

1. Do problems 4.1.5, 4.1.6, 4.1.11, 4.1.19 in the textbook.
2. Do problems 4.2.5 (a)–(d), 4.2.14 in the textbook.
3. Let R be a commutative ring with identity. Show that an element of $R[x]$ is nilpotent if and only if all its coefficients are nilpotent.