

**MATH 3370 – Number Theory**  
**Fall 2012**

**Assignment #4**

**Instructions**

- Answer each question completely; justify your answers.
  - This assignment is due at 17:00 on Wednesday October 17th in Assignment Box #43.
1. Exercise 2.28.
  2. Exercise 2.31.
  3. Exercise 3.1.
  4. Exercise 3.4, part (d).
  5. Exercise 3.6.
  6. Prove that a number is divisible by 3 if and only if the sum of its digits is divisible by 3.
  7. Exercise 4.4.
  8. Exercise 4.6.