

Linear Algebra and its Applications, Spring 2013

Homework 2

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Note 1. This homework is due *8:30 am, September 24, 2013*. Please submit a hard copy into the homework box outside the TAs' lab.

Note 2. "Review exercises" and "problem sets" should be found in the textbook (the fourth edition).

1. (10 points) Review exercise 1.7.
2. (10 points) Review exercise 1.12.
3. (10 points) Review exercise 1.14.
4. (10 points) Review exercise 1.20. Please note that a permutation matrix may exchange more than two rows.
5. (10 points) Review exercise 1.22.
6. (10 points) Review exercise 1.23.
7. (10 points) Review exercise 1.24.
8. (10 points) Problem 1 of Problem set 2.1. Please note that vector subtraction is nothing but a combination of vector addition and scalar multiplication: $u - v = u + (-1)v$.
9. (10 points) Problem 2 of Problem set 2.1.
10. (10 points) Problem 4 of Problem set 2.1.