CSCI 1323 (Discrete Structures), Spring 2002

Homework 4

Assigned: February 28, 2002.

Due: March 7, 2002, at the start of class.

Credit: 30 points.

1   Problems

Do the following problems. You do not need to turn in answers for the ones marked "Not to turn in". Most such problems will be those for which the textbook provides an answer in the back of the book, so you can check your work.

1. (5 points)   Do problem 1 on p. 117 of the textbook.

2. (Not to turn in.) Do problem 2 on p. 117.

3. (Not to turn in.) Do problem 4 on p. 118 of the textbook.

4. (Not to turn in.) Do problem 10 on p. 119.

5. (5 points)   Do problem 11 on p. 119 of the textbook.

6. (Not to turn in.) Do problem 12 on p. 119 of the textbook.

7. (Not to turn in.) Do problem 1 on p. 137 of the textbook.

8. (Not to turn in.) Do problem 7 on p. 137 of the textbook.

9. (Not to turn in.) Do problem 30 on p. 140 of the textbook.

10. (5 points)   Do problem 31 on p. 140 of the textbook.

11. (5 points)   Do problem 35 on p. 140 of the textbook.

12. (5 points)   Do problem 37 on p. 141 of the textbook. For every string of symbols that belongs to W, show how it can be generated by using the recursive definition of W. (See Example 33 on pp. 123–124 for an example of how to show that a string fits a recursive definition.)

13. (Not to turn in.) Do problem 42 on p. 141 of the textbook.

14. (Not to turn in.) Do problem 46 on p. 141 of the textbook.

15. (5 points)   Do problem 48 on p. 141 of the textbook.

16. (Not to turn in.) Do problem 60 on p. 143 of the textbook.