1. Peterson & Davie, Chapter 3, questions 17, 36, 55, 72

2. You will use slide 4 of the IP lookup paper to answer this question.
   1) Give a 12-bit address that will end the search at a pink node;
   2) Give a 12-bit address that will end the search at a green node that is a leaf; and
   3) Give a 12-bit address that will end the search at a green node that is not a leaf.
   What is the best matching prefix for each of them?

3. Use slide 8 of IP lookup paper.
   1) Give bmp for each marker on slide 8;
   2) Give a 12-bit address that will use the bmp of a marker (i.e., its bmp also equals to the bmp of the marker); and
   3) Give a 12-bit address that will match a marker but has a different bmp.