**Assignment 12 – Searching Ordered Data and Search Trees**

*Write pseudo-code not Java for problems requiring code. You are responsible for the appropriate level of detail.*

**For questions 1 – 2, compare the efficiency of using sequential search on an ordered table of size n and an unordered table of the same size for the key *target*:**

1. **a) If no record with the key *target* is present.**

**b) If one record with the key *target* is present and only one is sought.**

1. **a) If more than one record with the key *target* is present and it is desired to find only the first one.**

**b) If more than one record with the key *target* is present and it is desired to find them all.**

**3. Write a method delete(key1, key2) to delete all records with keys between key1 and key2 (inclusive) from a binary search tree whose nodes look like this:**

left key*i*  right

**4. Write a method to delete a record from a B-tree of order n.**

p0  r1 p1 r2 p2 r3 ……. pn-1 rn  pn rn