Homework

1. Modify Quicksort to find the Kth smallest value in an unsorted array of n numbers.
2. Assume you are hashing key K to a hash table of n slots (0 to n-1). For each of the following functions h(K), is the function acceptable as a hash function? If so, is it a good hash function?
   1. h(k)=k/n
   2. h(k)=1
   3. h(k)=(k+random(n)) mod n
   4. h(k)=k mod n (where n is a prime number)
3. Show the hash table of size 7 after inserting 3, 12, 9, 2 using the hash function h(k)=k mod 7.