Problem-69 Given an array A of n numbers. Find all pairs of X and Y in the array such that $K = X * Y$. Give an efficient algorithm without sorting.

Solution: Create a hash table from the numbers that divide K. Divide K by a number and check for quotient in the table.

Problem-70 Given a number n, give an algorithm for finding the number of trailing zeros in $n!$.

Solution:

```
int NumberOfTrailingZerosInNumber(int n)
{
        int i, count = 0;
        if (n < 0)
                return -1;
        for (i = 5; n / i > 0; i *= 5)
                count += n / i;
        return count;
}
```

Time Complexity: $O(logn)$,