C Programs

```c

#include <stdio.h>

int main(){
  int i;

  printf("\t Number \t\t Square of Number\n\n");

  for (i=0; i<10; i++)
     printf("\t %d \t\t\t %d \n", i, i*i);

  return 0;

} /* main */
```

Program Output

```
     Number       Square of Number

     0            0
     1            1
     2            4
     3            9
     4            16
     5            25
     6            36
     7            49
     8            64
     9            81
```

Defining Another Language

```
func factorial(n: int): int
   if (n == 0) || (n == 1) then
      return 1;
   else
      return n * factorial(n-1);
end factorial

write factorial(5);
```