**ASSIGNMENT 6**

1) #include<stdio.h>

int main(){

int n, sum=0;

printf("Enter number: ");

scanf("%d", &n);

for(int i=1; i<=n;i++){

sum+=i;

} printf("Sum: %d", sum);

}

2) #include<stdio.h>

int main(){

int n, sum=0, i=2;

printf("Enter number: ");

scanf("%d", &n);

while(i<=n\*2){

sum=sum+i;

i=i+2;

}

printf("Sum of first %d even natural numbers= %d", n, sum);

}

3) #include<stdio.h>

int main(){

int n, sum=0, i;

printf("Enter number: ");

scanf("%d", &n);

for(i=1; i<=n; i++){

sum+=2\*i-1;

}

printf("Sum of first %d odd natural numbers= %d", n, sum);

}

4) #include<stdio.h>

int main(){

int n, sum=0, i;

printf("Enter number: ");

scanf("%d", &n);

for(i=1; i<=n; i++){

sum+=i\*i;

}

printf("Sum of squares of first %d natural numbers= %d", n, sum);

}

5) #include<stdio.h>

int main(){

int n, sum=0, i;

printf("Enter number: ");

scanf("%d", &n);

for(i=1; i<=n; i++){

sum+=i\*i\*i;

}

printf("Sum of cubes of first %d natural numbers= %d", n, sum);

}

6) #include<stdio.h>

int main(){

int n, s=1;

printf("Enter number: ");

scanf("%d", &n);

for(int i=1; i<=n; i++){

s\*=i;

}

printf("Factorial of %d is %d", n, s);

}

7) #include<stdio.h>

int main(){

int n, org, sum=0;

printf("Enter number: ");

scanf("%d", &n);

org=n;

while(n>0){

n=n/10;

sum++;

}

printf("Number of digits in %d is %d", org,sum);

}

8) #include<stdio.h>

int main(){

int n,s=1;

printf("Enter number: ");

scanf("%d", &n);

for(int i=2; i<n-1; i++){

if(n%i==0){

printf("%d is not prime", n);

s++;

break;

} else continue;

}

if(s==1) printf("%d is prime", n);

}

9) #include<stdio.h>

int main(){

int a,b, i;

printf("Enter numbers: ");

scanf("%d %d", &a, &b);

for(i=2; i<=a\*b; i++){

if(i%a==0 && i%b==0){

break;

}

}

printf("Lcm of %d and %d is %d", a, b,i);

}

10) #include<stdio.h>

int main(){

int a, sum=0;

printf("Enter number: ");

scanf("%d", &a);

while(a>0){

int last =a%10;

sum=sum\*10+last;

a/=10;

}

printf("Reverse of %d is %d", a, sum);

}