//7/ Passing/Exchanging values between functions (-63)

```
#include <stdio.h>

int sum ( x, y, z ) //receiving the values //Formal Arguments
int x, y, z ; //optional for the Arguement/parameter datatype
{       //the parameters'/variables' names can be same as in main() also

        int d ;
        d = x + y + z ;
        return ( d ) ; //fruitful function
        //return(23);
        //return ;
}

int subtract(int p, int q, int r) //check with line no 189 //receiving values
{
        int s;
        s = p + q; //Ignored
        s = p + q - r;//Chosen as it exactly matches with number of parameters
        return (s); //fruitful function
}

void display( )
{
printf ( "\nHeads I win..." ) ;
printf ( "\nTails you lose" ) ;

}


int main( )
{
        int x, y, z, final, final1 ; //Actual Variables: Variables inside main()
        //printf ( "\nEnter any three numbers " ) ;
        //scanf ( "%d %d %d", &a, &b, &c ) ;
        final = sum ( 2, 3, 4 ) ; //Actual Value passing for addition
        printf ( "\nSum = %d", final ) ;

        final1 = subtract(2,3,4); //Value passing for subtraction
        printf("\nDifference = %d", final1);
```

```
	display();
}
```

//8/ No restriction on the number of "return stmt"

```
#include <stdio.h>

int fun( )
{
	int c ='&';
	// printf ( "\nEnter any alphabet " ) ;
	// scanf ( "%c", &ch ) ;
	printf("%d\n", c);

	if ( c >= 65 && c <= 90 )
		return (c);
	else
		return (c+32);
}

int main()
{	int result;
	result=fun(); //Very Imp to declare a new variable for passing a value else NO output will
be printed
	printf("%d \n", result);
	return 0;
}
```

//Scope Rule of Functions | Explicitly Pass bw functions | Formal Arguements|Actual Arguments

```
#include <stdio.h>
int display();

int main( )
{
	int i = 20 ;
	display ( i );
}

int display ( int j )
{
	int k = 35 ;
	printf ( "\n%d", j ) ;
```

```
        printf ( "\n%d", k ) ;
}
```

//10 Standard Calling Convention |R-L

```
#include <stdio.h>

int main( )
{
        int a = 1 ;
        printf ( "%d %d %d", a, ++a, a++ ) ;

}
```

//11 Using Library Functions|Format Specifiers| Garbage value|

```
#include <stdio.h>

int main()
{
        int i = 10, j = 20 ;
        printf ( "%d %d %d \n", i, j ) ;
        printf ( "%d", i, j ) ;
}
```

// Predefined/Library Functions

```
#include <stdio.h>
#include<math.h>

int main()
{
        float a=1.0;
        float w,x,y,z;

        w = sin (a);
        x = cos (a);
        y = tan (a);
        z = pow (a, 2);
        printf ( "%f %f %f %f \n", w,x,y,z ) ;
}
```