

Assignment 8

1. Find minimum and maximum number in array.

//Max number in array

```
int main()
{
    int arr[3];
    int i;
    for(i=0; i<3; i++){
        printf("Enter the value:");
        scanf("%d", &arr[i]);

    }
    max(arr);
    min(arr);
}

void min(int *ptr){
    int min = ptr[0];
    int i;
    for(i = 1; i<3; i++){
        if(ptr[i]<min){
            min = ptr[i];
        }
    }
}

printf("Min :%d\n",min);
}
```

```
void max(int *ptr){
    int max = ptr[0];
    int i;
    for(i = 1; i<3; i++){
        if(ptr[i]>max){
            max = ptr[i];
        }
    }
}

printf("Max :%d",max);
}
```

2. Search the given number in array.

// Search the given number in array.

```
int main()
{
    int arr[5]={23, 56, 78, 96, 57};
    int num;
    printf("Enter a number :");
    scanf("%d", &num);
}
```

```

        search(arr, num);
    }
void search(int *arr, int num){
    int i, flag = 0;
    for(i=0; i<5; i++){
        if(arr[i]==num){
            flag = 1;
            break;
        }
    }
    if(flag == 0)
        printf("Number not found");
    else
        printf("Number found at %d index", i);
}

```

3. Find sum of all numbers.

// Find sum of all numbers.

```

int main()
{
    int arr[5] = {1, 4, 6, 7, 3};

    sum(arr);

}
void sum(int *arr){

```

```

    int i, sum=0;
    for(i=0; i<5; i++){
        sum = sum + arr[i];
    }printf("%d", sum);
}

```

4. Find odd and even among the numbers.

//Even odd using array

```

int main()
{
    int arr[5];
    printf("Enter 1st value: ");
    scanf("%d", &arr[0]);
    printf("Enter 2nd value: ");
    scanf("%d", &arr[1]);
    printf("Enter 3rd value: ");
    scanf("%d", &arr[2]);
    printf("Enter 4th value: ");

```

```

scanf("%d", &arr[3]);
printf("Enter 5th value: ");
scanf("%d", &arr[4]);

even(arr);
odd(arr);
}

void even(int *arr){
    printf("even: ");
    int i;
    for(i=0; i<5;i++ ){
        if(arr[i]%2==0){
            printf(" %d", arr[i]);
        }
    }
}

void odd(int *arr){
    printf("\nnodd:");
    int j;
    for(j=0; j<5; j++){
        if(arr[j]%2!=0){
            printf(" %d", arr[j]);
        }
    }
}

```

5. Print alternate elements in array.

//Print alternate elements in array.

```

int main()
{
    int arr[5] = {3, 5, 7, 4, 8};

    alternate(arr);
}

```

```

void alternate(int*arr){
    int i;
    for(i=0; i<5; i = i+2){
        printf(" %d", arr[i]);
    }
}

```

6. Accept array and print only prime numbers of array.

//Accept array and print only prime numbers of array.

```

int main()

```

```

{
    int arr[6] = {1, 3, 5, 7, 8, 9};
    prime(arr);
}
void prime(int*arr){
    int i, flag = 0;

    for(i=0; i<6; i++){

        if(arr[i]==1 || arr[i]==0)
        {
            flag = 1;

        }

        int j;
        for(j=2; j<arr[i]; j++){
            flag =0;

            if(arr[i]%j==0){

                flag = 1;

                break;

            }
        }
        if(flag == 0){
            printf(" %d", arr[i]);
        }

    }
}

```

7. Take two array and add sum in third array

//Take two array and add sum in third array

```

int main()
{
    int arr[5]= {1,2, 3, 4,5};
    int brr[5]={10,20,30, 40, 50};

    sum(arr, brr);
}
void sum(int*arr, int*brr){
    int crr[5];
    printf("crr[5]= {");

```

```

int i;
for(i=0; i<5; i++){
    int j;
    for(j=0; j<5; j++){
        if(i==j){
            crr[5] = arr[i] + brr[j];
            printf(" %d,", crr[5]);
        }
    }
}
printf("\b");
}

```

8. Merge two arrays

// Merge two arrays

```

int main()
{
    int arr[5] = {3, 4, 7, 8, 1};
    int brr[5] = {5, 6, 9, 2, 3};
    merge(arr, brr);
}

void merge(int*arr, int*brr){

```

```

    int i,crr[10];
    printf("crr[10] = {");
    for(i=0; i<5; i++){
        crr[i] = arr[i];
    }
    int j;
    for(j=0; j<5; j++){
        crr[j+5] = brr[j];
    }
    int k;
    for(k=0; k<10; k++){
        printf("%d,", crr[k]);
    }
    printf("\b");
}

```

9. Reverse the given array.

//Reverse the given array.

```

int main()
{

```

```

int arr[5] = {2, 5, 7, 8, 4};

reverse(arr);
}
void reverse(int*arr)
{

```

```

    printf("rev[5] = {");
    int i;
    for(i=4;i>-1;i--){
        printf("%d,",arr[i]);
    }printf("\b");
}

```

10.Sort the array.

//Sort the array.

```

int main()
{
    int arr[5] = {3, 6, 8, 2, 5};
    sort(arr);
}
void sort(int*arr){
    int i, temp;
    for(i=0; i<4; i++){
        int j;
        for(j=0; j<4; j++){
            if(arr[j]>arr[j+1]){
                temp = arr[j];
                arr[j] = arr[j+1];
                arr[j+1] = temp;
            }
        }
    }
    for(i=0; i<5; i++){
        printf(" %d", arr[i]);
    }
}

```