1.Print odd numbers in an array

Anonymous:

```
var odd = function (a) {
    var arr = [];
    for(var i = 0; i < a; i++)
    {
        if(i%2 != 0)
        {
        arr.push(i);

        }
    }
    console.log(arr);
}
odd(23);
```

IIFE:

```
(function (a) {
    var arr = [];
    for(var i = 0; i < a; i++)
    {
        if(i%2 != 0)
        {
        arr.push(i);
        }
    }
    console.log(arr);
})(20)
```

2.Convert all the strings to title caps in a string array

anonymous

```
var caps = function(str) {
    str = str.toLowerCase().split(" ");
    for(var i = 0; i < str.length; i++)
    {
        str[i] = str[i][0].toUpperCase() + str[i].slice(1);
    }
    console.log(str);
```

```
}
caps("hello world");
```

IIFE:

```
var caps = (function(str) {
   str = str.toLowerCase().split(" ");
   for(var i = 0; i < str.length; i++)
   {
      str[i] = str[i][0].toUpperCase() + str[i].slice(1);
   }
   console.log(str);
})
("helloo world");
```

3. Sum of numbers in an array

Anonymous:

```
var sum = 0;
var arr = [10,20,30,50,60,90];
var summ = function () {
   for(var i = 0; i < arr.length; i++)
   {
   sum = sum + arr[i];
   }
console.log(sum);
}
summ();
```

IIFE

```
var sum = 0;
var arr = [10,20,30,50,60,90];
var summ = (function () {
   for(var i = 0; i < arr.length; i++)
   {
   sum = sum + arr[i];
   }
console.log(sum);
}) ();
```

4.Return all the prime numbers in an array

Anonymous:

```
var prime = function(arr) {
    var num = [];
    for(var i in arr)
    {
        var count = 0;
        for(var j = 1; j<arr[i]; j++)
        {
            if(arr[i]%j === 0)
            {
             count++;

            }
        }
        if(count === 1)
        {
            num.push(arr[i]);
        }
    }
    console.log(num);
}
prime([1,2,3,4,5,6,7,8,9]);
```

IIFE:

```
(function(arr) {
    var num = [];
    for(var i in arr)
    {
        var count = 0;
        for(var j = 1; j<=arr[i]; j++)
        {
            if(arr[i]%j === 0)
            {
             count++;

            }
        }
        if(count === 2)
        {
            num.push(arr[i]);
        }
```

```
    }
    console.log(num);
})
([1,2,3,4,5,6,7,8,9]);
```

5. Palindrome

Anonymous:

```
var palindrome = function (arr) {
    var str = "";
    var rev = "";
    for(var i = 0; i < arr.length; i++)
    {
        rev = arr[i].split("").reverse().join("");
        if( rev === arr[i])
        {
            str = str + " " + arr[i];
            console.log(arr[i]);
        }
    }
    return str;
}
palindrome(["hello","121", "pop"]);
```

IIFE:

```
var palindrome = (function (arr) {
    var str = "";
    var rev = "";
    for(var i = 0; i < arr.length; i++)
    {
        rev = arr[i].split("").reverse().join("");
        if( rev === arr[i])
        {
            str = str + " " + arr[i];
            console.log(arr[i]);
        }
    }
    return str;
})
(["hello","121", "pop"]);
```

6. Duplicate

Anonymous:

```
var arr = [1,2,3,40,5,5,60,7,8];
var duplicate = function (ele){
   let uniq = [];
   for(var i of ele)
   {
      if(uniq.indexOf(i) === -1) {
         uniq.push(i);
      }
   }
   console.log(uniq);
}
duplicate(arr);
```

IIFE:

```
var arr = [1,2,3,40,5,5,60,7,8];
var duplicate = (function (ele){
   let uniq = [];
   for(var i of ele)
   {
      if(uniq.indexOf(i) === -1) {
         uniq.push(i);
      }
   }
   console.log(uniq);
}) (arr);
```

7. Median of 2 sorted arrays

Anonymous:

```
var arr1 = [1,2,3,4,5,5,6];
var arr2 = [20,40,50,49,2,1,4];
var median = function() {

   if(arr1.length == arr2.length)
   {
      let arr = arr1.concat(arr2);
      for(var i = 0 ; i < arr.length; i++)
      {
         for(var j = 1; j < arr.length; j++)
```

```
        {
            if(arr[j]>arr[j+1])
            {
                var temp = arr[j];
                arr[j] = arr[j+1];
                arr[j+1] = temp;
            }
        }
    }
    console.log(arr);
    if(arr.length%2 !=0)
    {
        median = arr[(arr.length-1)/2];
        console.log(median);
    }
    else
    {
        num1 = arr[(arr.length)/2];
        num2 = arr[((arr.length)/2) -1];
        median = ((num1 + num2)/2);
        console.log(median);
    }
  }
}
median();
```

IIFE:

```
var arr1 = [1,2,3,4,5,5,6];
var arr2 = [20,40,50,49,2,1,4];
var median = (function() {

  if(arr1.length == arr2.length)
  {
    let arr = arr1.concat(arr2);
    for(var i = 0 ; i < arr.length; i++)
    {
        for(var j = 1; j < arr.length; j++)
        {
            if(arr[j]>arr[j+1])
            {
                var temp = arr[j];
                arr[j] = arr[j+1];
                arr[j+1] = temp;
```

```
            }
          }
       }
       console.log(arr);
       if(arr.length%2 !=0)
       {
          median = arr[(arr.length-1)/2];
          console.log(median);
       }
       else
       {
          num1 = arr[(arr.length)/2];
          num2 = arr[((arr.length)/2) -1];
          median = ((num1 + num2)/2);
          console.log(median);
       }
   }
})
();
```

8. Rotate k times.

Anonymous:

```
var rotate = function(num,k) {
   let i = 0;
   while(i<k)
   {
      num.unshift(num.pop())
      i++;
   }
   return num;
}
console.log(rotate([1,2,3,4,5],2));
```

IIFE:

```
var rotate = (function(num,k) {
   let i = 0;
   while(i<k)
   {
      num.unshift(num.pop())
      i++;
   }
```

```
    console.log(num);
}) ([1,2,3,4,5],2);
```