

Anonymous function and IIFE

Print odd numbers in an array

Anonymous function

```
var array = [2,3,4,5,6,7,8,9];
var odd = function(arr){
  for(let i=0; i<arr.length; i++)
  {
    if(arr[i]%2 !== 0)
    {
      console.log(arr[i]);
    }
  }
}
odd(array);
```

IIFE

```
array = [2,3,4,5,6,7,8];
(function(arr){
  for(let i=0; i<arr.length; i++)
  {
    if(arr[i]%2 !== 0)
    {
      console.log(arr[i]);
    }
  }
})(array)
```

Convert all the strings to title caps in a string array

Anonymous function

```
var str = "My name is bean bro";
var str1 = function(str) {
  var sentence = str.toLowerCase().split(" ");
  for(var i=0; i<sentence.length; i++)
  { sentence[i] = sentence[i][0].toUpperCase() + sentence[i].slice(1); }
  sentence.join(" ");
  console.log(sentence);
}
str1(str);
```

IIFE

```
var str = "My name is bean bro";
(function(str) {
  var sentence = str.toLowerCase().split(" ");
  for(var i=0; i<sentence.length; i++)
  { sentence[i] = sentence[i][0].toUpperCase() + sentence[i].slice(1); }
  sentence.join(" ");
})
```

```
    console.log(sentence);
})(str)
```

Sum of all numbers in an array

Anonymous function

```
var arr = [1,2,3,4,5,6,7,8,9];
var sum=0;
var sum1 = function(arr)
{ for(let i=0; i<arr.length; i++)
  { sum += arr[i]; }
  console.log(sum);
}
sum1(arr);
```

IIFE

```
var arr = [1,2,3,4,5,6,7,8,9];
var sum=0;
(function(arr)
{
  for(let i=0; i<arr.length; i++)
  {
    sum += arr[i];
  }
  console.log(sum);
})(arr);
```

Return all the prime numbers in an array

Anonymous function

```
var arr = [3,4,5,6,7,8,9,15,17];
var prime = function(arr){
  let s=[], count=0;
  for(i=0; i<arr.length; i++)
  {
    for(j=1; j<arr[i]; j++)
    {
      if(arr[i]%j===0)
        count++;
    }
    if(count ==1)
      s.push(arr[i]);
    count = 0;
  }
  console.log(s);
```

```

}
prime(arr);

IIFE
var arr = [3,4,5,6,7,8,9,15,17];
(function(arr){
  let s=[], count=0;
  for(i=0; i<arr.length; i++)
  {
    for(j=1; j<arr[i]; j++)
    {
      if(arr[i]%j===0)
        count++;
    }
    if(count ==1)
      s.push(arr[i]);
    count = 0;
  }
  console.log(s);
})(arr);

```

Return all the palindromes in an array

Anonymous function

```

var arr = ["bean","bro","mam"];
var palindrome = function(arr){
  var str = "";
  var rev = "";
  for(var i in arr)
  {
    rev = arr[i].split("").reverse().join("");
    if(rev===arr[i])
    {
      str = str + " " +arr[i];
    }
  }
  console.log(str);
}
palindrome(arr);

```

IIFE

```

var arr = ["bean","bro","mam"];
(function(arr){
  var str = "";
  var rev = "";

```

```

for(var i in arr)
{
    rev = arr[i].split("").reverse().join("");
    if(rev===arr[i])
    {
        str = str + " " +arr[i];
    }
}
console.log(str);
})(arr);

```

Return median of two sorted arrays of same size

Anonymous function

```

var arr1 = [1,2,3,4];
var arr2 = [8,5,6,7];
var concatarr = arr1.concat(arr2);
var median = function(concatarr){
    var mid = Math.floor(concatarr.length/2);
    if(concatarr.length %2 === 0)
    {
        return (concatarr[mid] + concatarr[mid-1])/2;
    }
    else
    {
        return concatarr[mid];
    }
}
console.log(median(concatarr));

```

IIFE

```

var arr1 = [1,2,3,4];
var arr2 = [8,5,6,7];
var concatarr = arr1.concat(arr2);

```

```

(function(concatarr){
    var mid = Math.floor(concatarr.length/2);
    if(concatarr.length %2 === 0)
    {
        console.log((concatarr[mid] + concatarr[mid-1])/2);
    }
    else
    {
        console.log(concatarr[mid]);
    }
}

```

```
})(concatarr);
```

Remove duplicates from an array

Anonymous function

```
var arr = [2,3,4,5,6,2,3,4,1];  
var uniqueid = function(arr){  
  var uniquechar = [new Set(arr)];  
  console.log(uniquechar);  
}  
uniqueid(arr);
```

IIFE

```
var arr = [2,3,4,5,6,2,3,4,1];  
(function(arr){  
  var uniquechar = [new Set(arr)];  
  console.log(uniquechar);  
})(arr);
```

Rotate an array by k times and return the rotated array

Anonymous function

```
var arr = [2,3,4,5,6,2,3,4,1];  
var rotate = function(arr){  
  arr.unshift(arr.pop());  
  console.log(arr);  
}  
rotate(arr);
```

IIFE

```
var arr = [2,3,4,5,6,2,3,4,1];  
(function(arr){  
  arr.unshift(arr.pop());  
  console.log(arr);  
})(arr);
```