<u>LearnersBucket</u> <u>Practice</u> <u>Blog</u> <u>Youtube</u> <u>Butler-Al</u> <u>Book</u>

Ace your JavaScript Interview. <u>Get my ebook</u>. 100 solved Javascript, 20 solved React, & 2 frontend system design questions (1160+ copies sold). Get a <u>Free preview</u>.

×

Advertisements

. . .

## How to loop through array in javascript

Posted on October 1, 2019 | by Prashant Yadav

Posted in Arrays, ES6, Javascript

Learn different ways through which we can loop an array in javascript.

Arrays are one of the most common data structure that we use often in day to day programming and the basic operation performed on it is iterating.

There are many different options available to us after <u>ES6</u> to iterate through an array in javascript.

First we will see how we can use different for loops to iterate arrays.

### Using for loop

The basic of all the for loops available in javascript.

Advertisements

. . .

Practically prepare for your JavaScript interview

JavaScript
Revision

JavaScriptConcept Based
Problems

Data Structures

Algorithms

Machine
Coding

Web
Fundamentals

Advertisements

```
let arr = ['a', 'b', 'c', 'd'];

for(let i = 0; i < arr.length; i++){
   console.log(arr[i]);
}

//"a"
//"b"
//"c"
//"d"</pre>
```

### Using forEach loop

Alternatively Array.forEach() method can be used to iterate through each array elements.

This method calls a callback function for each item of the array.

```
let arr = ['a', 'b', 'c', 'd'];

arr.forEach((e, i) => {
   console.log(e);
});

//"a"
//"b"
//"c"
//"d"
```

### Using for...of loop

for...of iterates over the value of distinct properties of iterable objects.

```
let arr = ['a', 'b', 'c', 'd'];

for(let element of arr){
   console.log(element);
}

//"a"
//"b"
//"c"
//"d"
```

### Using for...in loop

for in statement iterates over the enumerable properties of an object. It iterates over the keys. As indexes are the numeric keys assigned to the arrays we can use them to get the value.

```
let arr = ['a', 'b', 'c', 'd'];

for(let index in arr){
   console.log(arr[index]);
}

//"a"
//"b"
//"c"
//"d"
```

The order of iteration is implementation-dependent in for in loop which means properties of objects will not be in particular order, so it is better avoid this using on array.

After the introduction of ES6, now there are different methods available which can be used to loop through an object in javascript.

- 1. Object.keys().
- 2. Object.entries().
- 3. Object.values().

As arrays are objects in javascript we can use these methods on array as well to iterate it.

# Using Object.keys() to loop through an array in javascript

This method returns an array of keys of own properties names, we can then loop through these keys and access the values of the object.

```
let arr = ['a', 'b', 'c', 'd'];

let keys = Object.keys(arr);

console.log(keys);
//["0", "1", "2", "3"]

keys.forEach(e => {
    console.log(arr[e]);
});

//"a"
//"b"
//"c"
//"d"
```

### Using Object.values()

This method will return an array of values of own enumerable properties of the object. The values are returned in the same order as by the for...in method.

```
let arr = ['a', 'b', 'c', 'd'];

let values = Object.values(arr);

console.log(values);
//["a", "b", "c", "d"]

values.forEach(e => {
    console.log(e);
});

//"a"
//"b"
//"c"
//"d"
```

### Using Object.entries()

This method returns an array of key value pair of own enumerable properties of the given object in the same order as it is returned by for...in loop.

```
let arr = ['a', 'b', 'c', 'd']

let entries = Object.entries(arr);

console.log(entries);

//[["0", "a"], ["1", "b"], ["2", "c"], ["3", "d"]]

for(let [key, value] of entries){
    console.log(`key: ${key}, value: ${value}`);
}

//"key: 0, value: a"

//"key: 1, value: b"

//"key: 2, value: c"

//"key: 3, value: d"
```

### Loop through multi dimensional array in javascript

The best way to iterate through two dimensional array in javascript with single loop is using for...of loop.

```
let arr = [[1, 2, 3], [4, 5, 6], [7, 8, 9]];

for(let [value1, value2, value3] of arr){
   console.log(`value1: ${value2: ${value2}, value3: ${value3}`);
}

//"value1: 1, value2: 2, value3: 3"
//"value1: 4, value2: 5, value3: 6"
//"value1: 7, value2: 8, value3: 9"
```

. . .

Alternatively you can use your classic nested for loops as well. We can use all the above methods to iterate through array of objects too.

Prepare for your JavaScript Interview
practically on each Interview rounds and grab
that job.

BEGIN LEARNING

#### Recommended Posts:

Polyfill for Array.filter

Best way to compare strings in javascript

Sort a map in JavaScript

<u>Different ways to reload/refresh page in javascript</u>

Replace all string occurrences in javascript

Convert HEX color to RGB in JavaScript

<u>Currying – part 4</u>

Find non duplicate number in an array

useOnClickOutside() hook in React

30 Frontend projects to excel.

<u>Prev</u> <u>Next</u>

Advertisements

. . .

About Us Contact Us Privacy Policy Advertise











Handcrafted with ♥somewhere in Mumbai

© 2023 <u>LearnersBucket</u> | <u>Prashant Yadav</u>

