



filter()

IN JAVASCRIPT

Introduction

The `filter()` method returns a new array with all the elements that satisfies the condition that is passed inside the callback of `filter()` method.

The array elements that does not satisfy the condition inside callback of `filter()` are skipped and not included inside the new array.

filter() has three main arguments

- element/item – current array element the callback is iterating over
- index – index of the current element/item
- array – the array on which the filter method is being performed.
- These arguments are passed inside the callback function of filter().

item,index,array

```
let array = [23, 4, 5, 60, 80];

let filterArray = array.filter((item, index, array) =>
{
  // first iteration output
  console.log(item); // 23
  console.log(index); // 0
  console.log(array); // [23, 4, 5, 60, 80]
});
```

Example 1

```
let array = [23, 4, 5, 60, 80];  
  
// returns an array with values more than 30  
let moreThanThirty = array.filter((item)=> {  
  return item > 30;  
})  
  
console.log(moreThanThirty) // [ 60, 80 ]
```

Example 2

```
let array = [23, 4, 5, 60, 80];

// finding all odd numbers
let isOddArray = array.filter((item) => {
  return item % 2 !== 0;
})

console.log(isOddArray) // [ 23, 5 ]
```

Example 3

```
let array = [
  { club: "Barcelona", country: "Spain" },
  { club: "Manchester United", country: "England" },
  { club: "Real Madrid", country: "Spain" },
  { club: "Liverpool", country: "England" },
];

// finding clubs from England
let clubsfromEngland = array.filter((item) => {
  return item.country === "England"
});

console.log(clubsfromEngland);
/*
[
  { club: 'Manchester United', country: 'England' },
  { club: 'Liverpool', country: 'England' }
]
*/
```