

1 Array Notes

Arrays are one of the most useful datatypes you have as a JavaScript developer. Arrays are the best way to group similar data together in a sequence.

Examples:

- a set of coordinates
- a list of customers
- a list of photos
- a list of dates

To use arrays effectively you need a way of looking through them to see the data they hold. This action of looking through arrays is called iteration. Javascript provides many methods for iterating over an array.

For example: You might want to transform and raise elements from strings to numbers. Or you might want to add an array of numbers and return the sum. Maybe you have an array of dates and you want to remove all dates before July 1st.

What does an array look like?

```
array = [item1, item2, item3, ...]
```

To add data to the end of an array use the `push()` method:

```
array.push(item4);  
[item1, item2, item3, item4]
```

To add data to the beginning of an array use the `unshift()` method:

```
array.unshift(item5);  
[item5, item1, item2, item3, item4]
```

To remove an item from the end of an array use the `pop()` method:

```
array.pop();  
[item5, item1, item2, item3]
```

To remove an item from the beginning of an array use the `shift()` method:

```
array.shift();  
[item1, item2, item3]
```

To selectively remove portions of an array use the `splice()` method:

```
// Starting at indexed position 1, remove one element  
array.splice(1, 1);  
[item1, item3]
```

To remove a specific element by value combine the `indexOf()` method with the `splice()` method:

```
array.splice( array.indexOf( 'item1' ), 1 );
```

```
[item3]
```