

JAVASCRIPT CODING

for Beginners



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HELLO WORLD

```
<!-- *.html -->  
<script src="scripts/main.js"></script>  
  
// *.js  
var myHeading = document.querySelector("h1");  
myHeading.textContent = "Hello world!";
```

COMMENTS

```
// diese Zeile wird nicht als  
// ausführbarer Code interpretiert
```

```
/*  
    diese Zeilen werden nicht als  
    ausführbarer Code ninterpretiert  
*/
```

VARIABLEN TYPEN

- Number
- String
- Boolean

Number

```
var a = 1;
```

String

```
var b = "Hallo World";
```

Boolean

```
var c = true;
```

Number

```
var pi = 3.14;
```

Ganzzahlen, Fließkommawert

String

```
var b = "Hallo World";
```

Zeichen, Wörter, Texte

Boolean

```
var c = true;
```

true oder false

VARIABLEN TYPEN

- *Number*
- *String*
- *Boolean*
- **Array**
- **Object**

ARRAY

```
var a = [];
```

Leer

```
var a = [ 1, 2, 3 ];
```

Numbers

```
var a = [ "Apfel", "Birne" ];
```

Strings

```
var a = [ "Apfel", 4, "Birne" ];
```

Mixed

OBJECT

```
var a = {};
```

Leer

```
var a = { name : "Christian" };
```

Key : Value

```
var a = {  
    vorname : "Christian",  
    nachname : "Marienfeld"  
};
```

SYNTAX ARRAY

Keyword

Scope

```
var arr = [ "Apfel", 4, "Birne" ];
```

Name

Value

Value

Value

SYNTAX OBJECT

Keyword

Scope

```
var obj = { name : "Christian" };
```

Name

Key

Value

BEISPIEL

```
var a = {  
    version: 1,  
    users: [  
        {  
            name: "Christian",  
            alter: 23  
        },  
        {  
            name: "Eva",  
            alter: 19  
        }  
    ]  
};
```

OBJECT/ARRAY NOTATION

```
var a = {  
  version: 1,  
  users: [  
    {  
      name: "Christian",  
      alter: 23  
    },  
    {  
      name: "Eva",  
      alter: 19  
    }  
  ]  
};
```

```
console.log( a );  
    // ganze Object  
  
console.log( a.version );  
    // 1  
  
console.log( a.users );  
    // Array  
  
console.log( a.users[1].name );  
    // ???
```

OPERATORS

```
var foo = 1;
```

```
var bar = "2";
```

```
console.log(foo + bar); // ???
```

OPERATORS

```
var foo = "hello";
```

```
var bar = "world";
```

```
console.log(foo + " " + bar);
```

OPERATORS

```
var num = 2 + 3;
```

```
var num = 3 - 2;
```

```
var num = 2 * 3;
```

```
var num = 2 / 3;
```


SCHLEIFE ARRAY

```
var arr = [ "Chris", "Eva", "Steff" ];  
  
for ( key in arr ) {  
    console.log( arr[ key ] );  
}
```

SYNTAX FUNCTION

```
function myFunc ( str ) {      };
```

SYNTAX FUNCTION

Keyword

|

Scope

⎵

```
function myFunc ( str ) {      };
```

|

Name

|

Parameter

SYNTAX FUNCTION

```
function myFunc ( str ) {  
    console.log( str );  
};
```

```
myFunc("Hello World");
```

SYNTAX FUNCTION

Keyword *Functionsname* *Function*



```
var myFunc = function ( str ) {  
    console.log( str );  
};
```

```
myFunc("Hello World");
```

BEISPIEL

```
var _app = {  
  version: 1,  
  users: ["Christian", "Eva"],  
  getUsers: function () {  
    return a.users;  
  },  
  setUsers: function (arr) {  
    if (arr) {  
      a.users = arr;  
      a.version++;  
      return true;  
    }  
    return false;  
  }  
};
```

BEISPIEL

```
var _app = {  
  version: 1,  
  users: ["Christian", "Eva"],  
  
  getUsers: function () {  
    return a.users;  
  },  
  setUsers: function (arr) {  
    if (arr) {  
      a.users = arr;  
      a.version++;  
      return true;  
    }  
    return false;  
  }  
};
```

```
var users = _app.getUsers();  
console.log( users );  
  
// Christian, Eva  
  
var arr = ["Max", "Sebbo", "Marla"];  
_app.setUsers( arr );  
  
console.log( _app.getUsers() );  
  
// Max, Sebbo, Marla
```

ZUSAMMENFASSUNG

```
var num = 1; // Number Variable

var str = "Hallo Welt"; // String Variable

var obj = { userlist: [ "Chris", "Max", "Anne" ] }; // Object


var myFunc = function ( param ) { // Functiondeclaration
    console.log( param );
    return true;
};

if ( str ) { // Wenn-Dann
    myFunc( str );
}
```