Objects in JavaScript!

PROPERTY VALUE

```
const object = {
   hello: 'world'
}
```

PROPERTY NAME (KEY)





Object in JavaScript

Object in JavaScript is a composite data type that allows you to store key-value pairs. It is a collection of properties where each property has a key (also known as a property name) and a value.





How to Create Objects

You can do this using object literals or constructors

```
// Object literal
const person = {
  firstName: "John",
  lastName: "Doe",
  age: 30,
};

// Constructor
function Person(firstName, lastName, age) {
  this.firstName = firstName;
  this.lastName = lastName;
  this.age = age;
}
const anotherPerson = new Person("Alice", "Smith", 25);
```





Adding and Updating Objects

You can add new properties and update existing ones within your objects

```
// Adding properties
person.email = "john@example.com";

// Updating properties
person.age = 31;
```





Deleting Objects

remove objects safely

```
delete person.age; // Deletes the 'age' property
```





Iterating Through Objects

Looping through objects to access their properties can be done like this

```
const person = {
  firstName: "John",
  lastName: "Doe",
  age: 30,
};

for (const key in person) {
    console.log(`${key}: ${person[key]}`);
}
```





Objects Methods

Object.keys()

This method returns an array of an object's own enumerable property names.

```
const keys = Object.keys(person);
console.log(keys); // Output: ["firstName", "lastName", "age"]
```

Object.values()

This method returns an array of an object's own enumerable property values.

```
const values = Object.values(person);
console.log(values); // Output: ["John", "Doe", 30]
```





Objects Methods

Object.entries()

This method returns an array of an object's own enumerable property [key, value] pairs.

```
const entries = Object.entries(person);
console.log(entries);
// Output: [["firstName", "John"], ["lastName", "Doe"], ["age", 30]]
```

Object.hasOwnProperty()

This method checks if an object has a specified property.

```
console.log(person.hasOwnProperty("age")); // Output: true
console.log(person.hasOwnProperty("email")); // Output: false
```





Pro Tips and Tricks

Unlock some hidden gems in JavaScript objects! For instance, object destructuring and methods:

```
// Object destructuring
const { firstName, lastName } = person;

// Adding a method to an object
person.fullName = function () {
  return `${this.firstName} ${this.lastName}`;
};
console.log(person.fullName()); // Outputs "John Doe"
```



