

OBJECT DESTRUCTURING (AYŞENUR)

Object destructuring in JavaScript allows you to extract properties from an object and assign them to variables in a more concise way. It provides a convenient syntax for unpacking values from objects and accessing them directly.

Here's a simple explanation with examples:

1. Basic Object Destructuring:

```
const person = {  
  name: 'John',  
  age: 25,  
  city: 'New York'  
};  
  
// Extracting properties using object destructuring  
const { name, age, city } = person;  
  
console.log(name); // Output: John  
console.log(age); // Output: 25  
console.log(city); // Output: New York
```

2. Renaming Variables:

```
const car = {  
  brand: 'Toyota',  
  model: 'Camry'  
};  
  
// Renaming variables using object destructuring  
const { brand: carBrand, model: carModel } = car;  
  
console.log(carBrand); // Output: Toyota  
console.log(carModel); // Output: Camry
```

3. Default Values:

```
const person = {
```

```
name: 'John',  
age: 25  
};
```

// Providing default values using object destructuring

```
const { name, age, city = 'New York' } = person;
```

```
console.log(name); // Output: John
```

```
console.log(age); // Output: 25
```

```
console.log(city); // Output: New York
```

4. Nested Object Destructuring:

```
const student = {  
  name: 'Alice',  
  age: 20,  
  address: {  
    city: 'London',  
    country: 'UK'  
  }  
};
```

// Extracting nested properties using object destructuring

```
const { name, address: { city, country } } = student;
```

```
console.log(name); // Output: Alice
```

```
console.log(city); // Output: London
```

```
console.log(country); // Output: UK
```

Object destructuring simplifies the process of extracting values from objects and assigning them to variables. It provides a concise and readable way to access object properties without repetitive dot notation.