

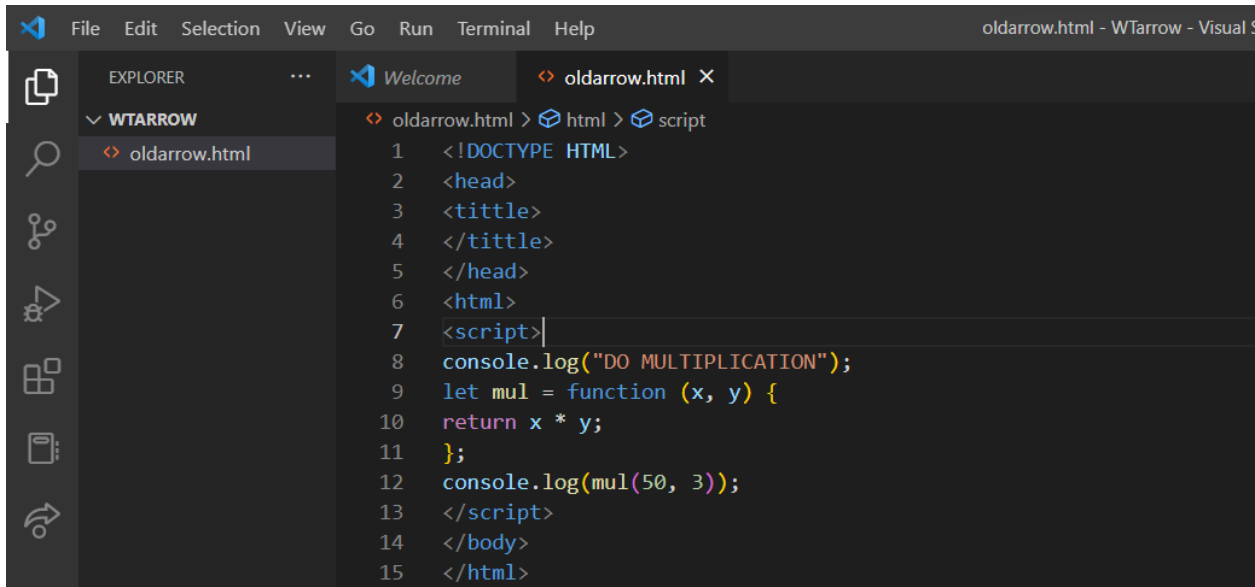
## Practical – 7

**AIM : Demonstrate ES6 New Syntax and Test Browser Compatibility.**

### 1) ARROW FUNCTION

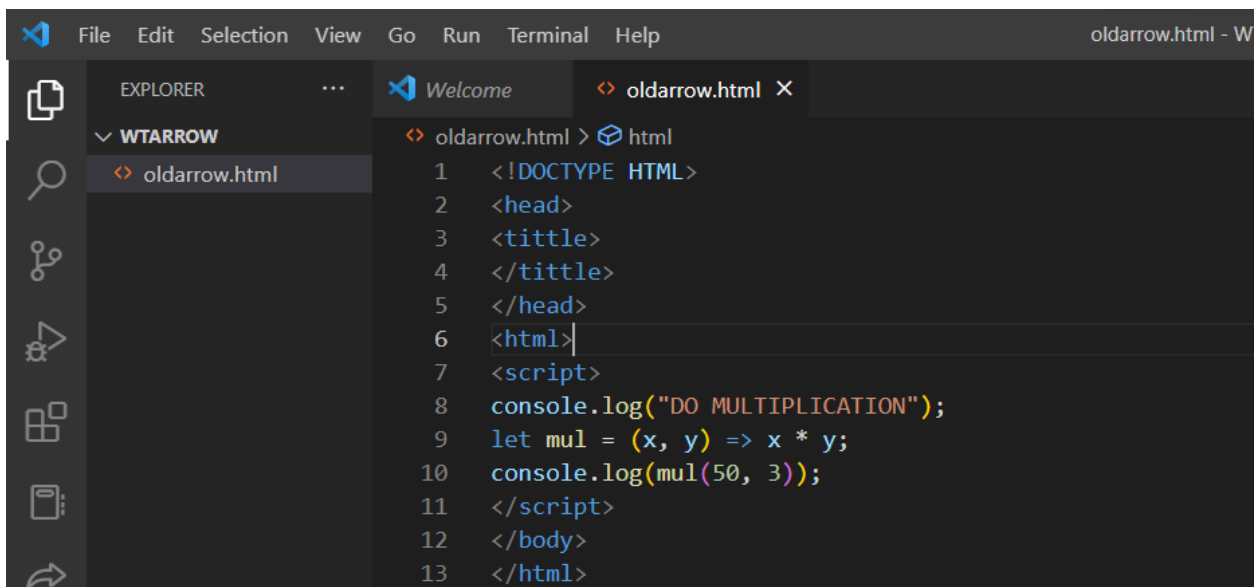
**Source Code:**

**OLD SYNTAX:**



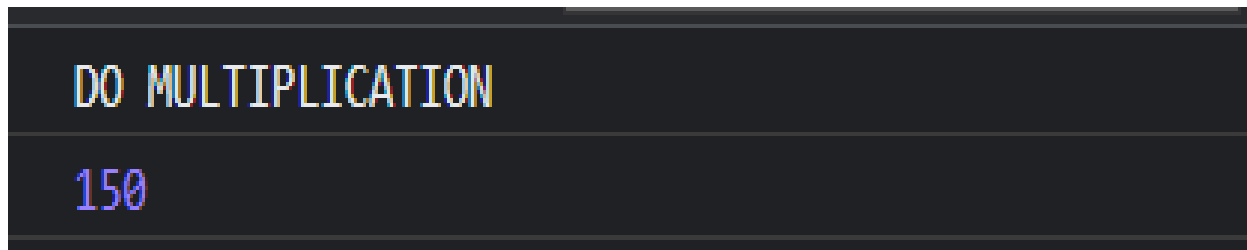
```
File Edit Selection View Go Run Terminal Help oldarrow.html - WTarrow - Visual S
EXPLORER
  WTARROW
    oldarrow.html
Welcome
oldarrow.html > html > script
1 <!DOCTYPE HTML>
2 <head>
3 <title>
4 </title>
5 </head>
6 <html>
7 <script>
8 console.log("DO MULTIPLICATION");
9 let mul = function (x, y) {
10 return x * y;
11 };
12 console.log(mul(50, 3));
13 </script>
14 </body>
15 </html>
```

**NEW SYNTAX:**



```
File Edit Selection View Go Run Terminal Help oldarrow.html - W
EXPLORER
  WTARROW
    oldarrow.html
Welcome
oldarrow.html > html
1 <!DOCTYPE HTML>
2 <head>
3 <title>
4 </title>
5 </head>
6 <html>
7 <script>
8 console.log("DO MULTIPLICATION");
9 let mul = (x, y) => x * y;
10 console.log(mul(50, 3));
11 </script>
12 </body>
13 </html>
```

Output:

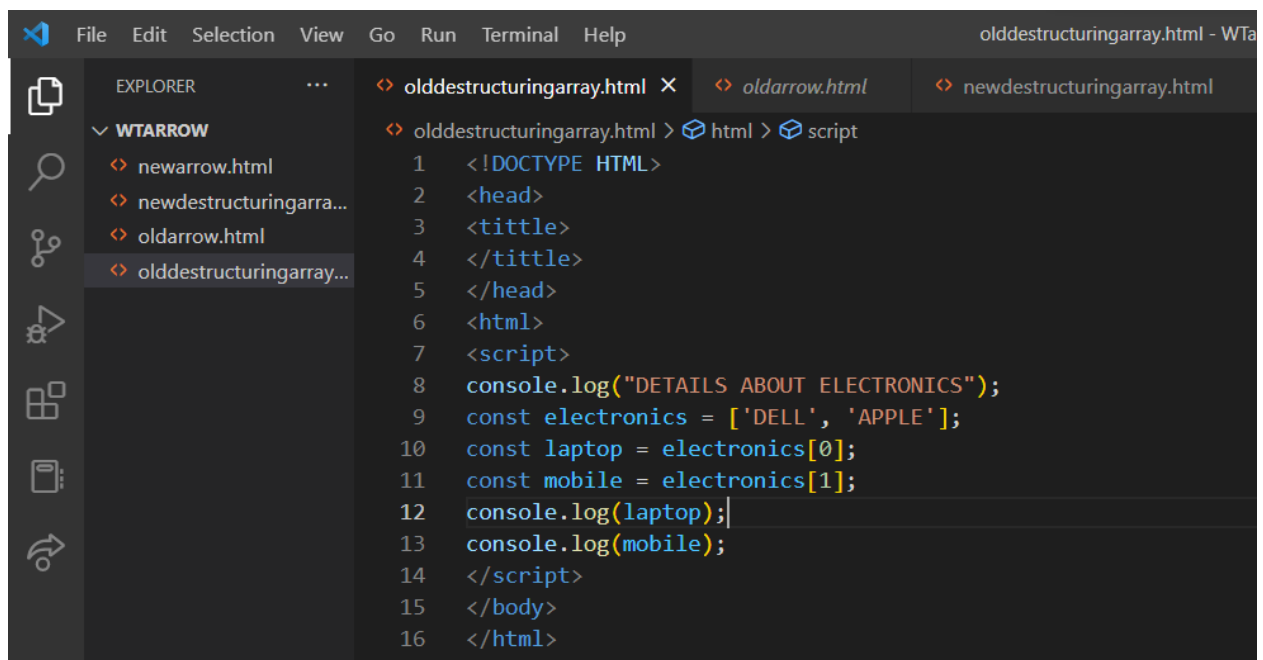


## 2)DESTRUCTURING

### 2.1) DESTRUCTURING ARRAYS

SOURCE CODE :

OLD SYNTAX :



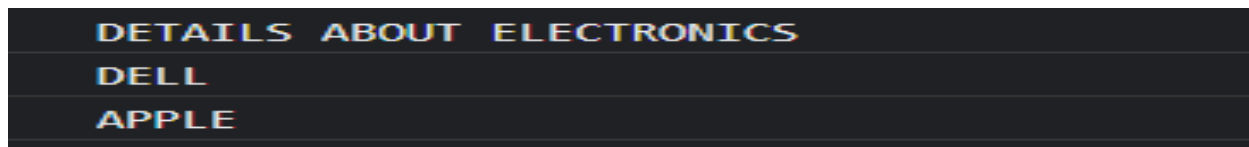
**NEW SYNTAX :**

The screenshot shows the Visual Studio Code editor with a file named `newdestructuringarray.html` open. The Explorer sidebar on the left shows a project named **WTARROW** with several files, including `newdestructuringarra...`. The main editor area displays the following HTML code:

```

1 <!DOCTYPE HTML>
2 <head>
3 <tittle>
4 </tittle>
5 </head>
6 <html>
7 <script>
8   console.log("DETAILS ABOUT ELECTRONICS");
9   const electronics = ['DELL', 'APPLE'];
10  const [laptop, mobile] = electronics;
11  console.log(laptop);
12  console.log(mobile);
13 </script>
14 </body>
15 </html>

```

**Output:****2.2) DESTRUCTURING OBJECTS****OLD SYNTAX :**

The screenshot shows the Visual Studio Code editor with a file named `olddestructuringobject.html` open. The Explorer sidebar on the left shows a project named **WTARROW** with several files, including `olddestructuringobject...`. The main editor area displays the following HTML code:

```

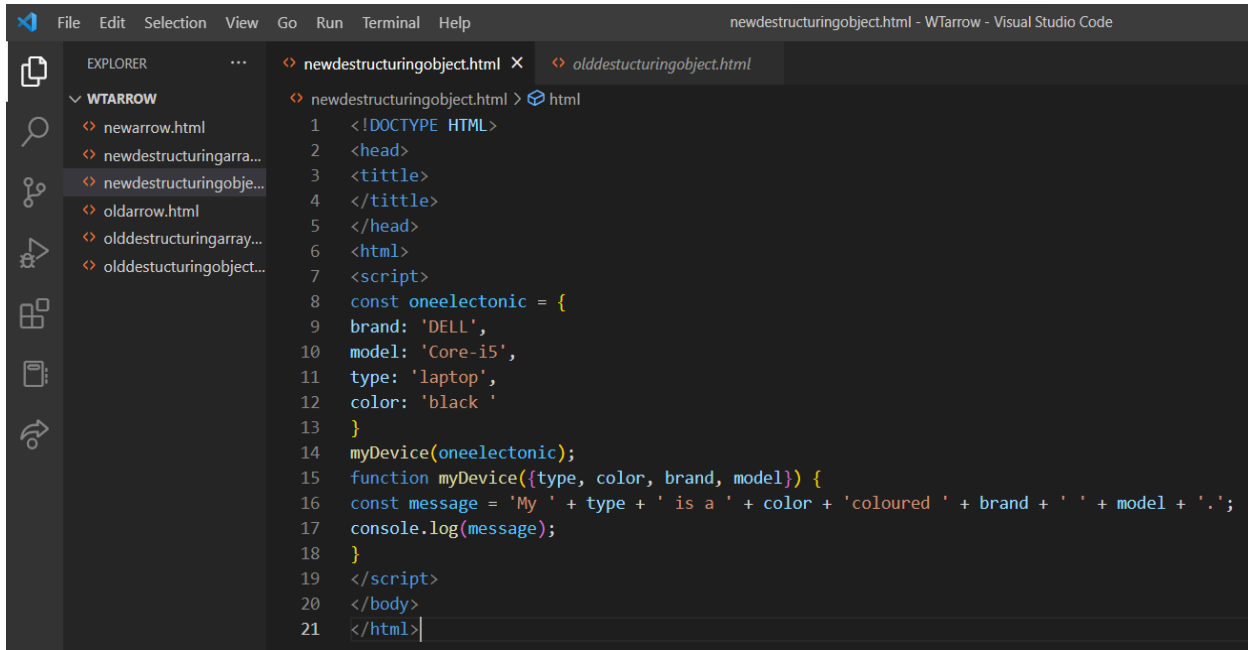
1 <!DOCTYPE HTML>
2 <head>
3 <tittle>
4 </tittle>
5 </head>
6 <html>
7 <script>
8   const oneelectronic = {
9     brand: 'DELL',
10    model: 'Core-i5',
11    type: 'laptop',
12    year: 2022,
13    color: 'black ',
14  }
15  myDevice(oneelectronic);
16  function myDevice(electronics) {
17    const message = 'My ' + electronics.type + ' is a ' + electronics.color + ' ' +
18    electronics.brand + ' ' + electronics.model + '.';
19    console.log(message);
20  }
21 </script>
22 </body>
23 </html>

```

Output:

```
My laptop is a black  DELL Core-i5.  
Live reload enabled.
```

NEW SYNTAX :



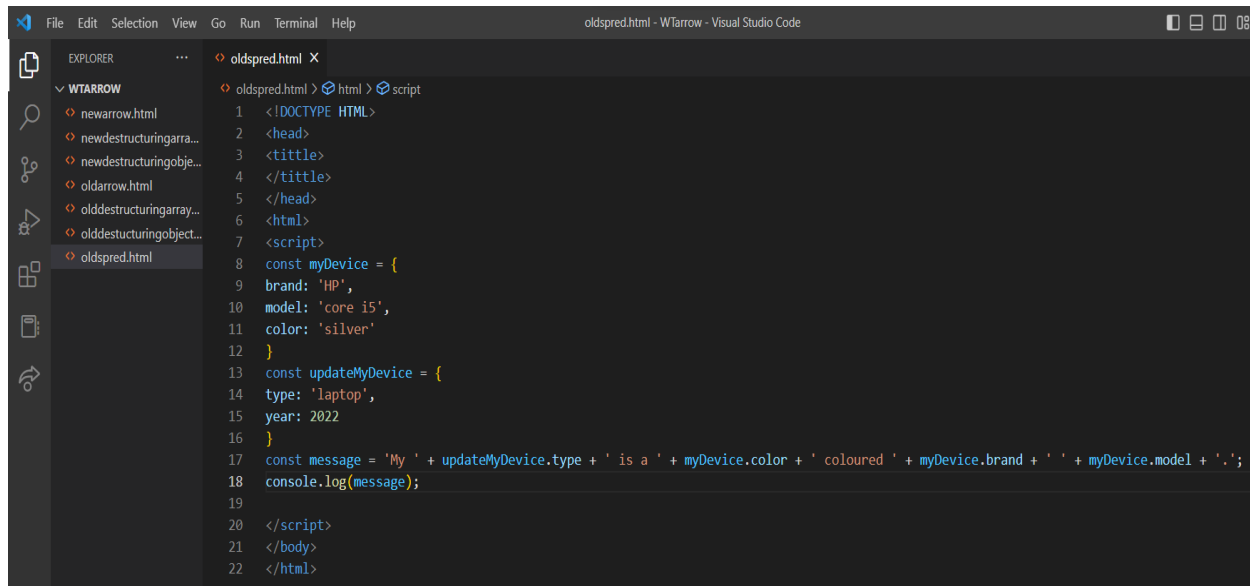
```
File Edit Selection View Go Run Terminal Help  
newdestructuringobject.html - WTarrow - Visual Studio Code  
EXPLORER  
WTARROW  
newarrow.html  
newdestructuringarra...  
newdestructuringobje...  
oldarrow.html  
olddestructuringarray...  
olddestructuringobject...  
newdestructuringobject.html X  
olddestructuringobject.html  
newdestructuringobject.html > html  
1 <!DOCTYPE HTML>  
2 <head>  
3 <title>  
4 </title>  
5 </head>  
6 <html>  
7 <script>  
8 const oneelectronic = {  
9   brand: 'DELL',  
10  model: 'Core-i5',  
11  type: 'laptop',  
12  color: 'black '  
13 }  
14 myDevice(oneelectronic);  
15 function myDevice({type, color, brand, model}) {  
16   const message = 'My ' + type + ' is a ' + color + ' coloured ' + brand + ' ' + model + '.';  
17   console.log(message);  
18 }  
19 </script>  
20 </body>  
21 </html>
```

Output:

```
My laptop is a black coloured DELL Core-i5.
```

### 3) SPREAD OPERATOR

#### OLD SYNTAX :

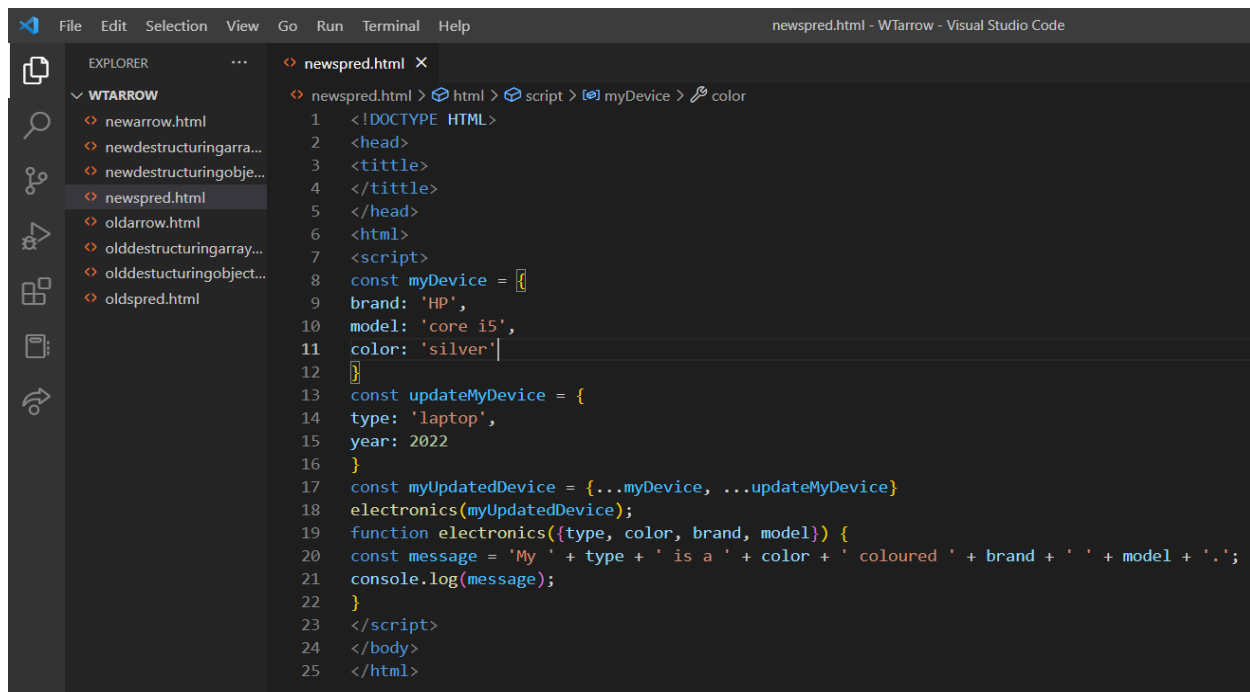


```

1 <!DOCTYPE HTML>
2 <head>
3 <title>
4 </title>
5 </head>
6 <html>
7 <script>
8 const myDevice = {
9   brand: 'HP',
10  model: 'core i5',
11  color: 'silver'
12 }
13 const updateMyDevice = {
14   type: 'laptop',
15   year: 2022
16 }
17 const message = 'My ' + updateMyDevice.type + ' is a ' + myDevice.color + ' coloured ' + myDevice.brand + ' ' + myDevice.model + '.';
18 console.log(message);
19
20 </script>
21 </body>
22 </html>

```

#### NEW SYNTAX :



```

1 <!DOCTYPE HTML>
2 <head>
3 <title>
4 </title>
5 </head>
6 <html>
7 <script>
8 const myDevice = {
9   brand: 'HP',
10  model: 'core i5',
11  color: 'silver'
12 }
13 const updateMyDevice = {
14   type: 'laptop',
15   year: 2022
16 }
17 const myUpdatedDevice = {...myDevice, ...updateMyDevice}
18 electronics(myUpdatedDevice);
19 function electronics({type, color, brand, model}) {
20   const message = 'My ' + type + ' is a ' + color + ' coloured ' + brand + ' ' + model + '.';
21   console.log(message);
22 }
23 </script>
24 </body>
25 </html>

```

Output:

My laptop is a silver coloured HP core i5.

**REST OPERATOR :****SOURCE CODE :**

```
File Edit Selection View Go Run Terminal Help resetoperator.html X oldarrow.html
EXPLORER
WTTARROW
newarrow.html
newdestructuringarra...
newdestructuringobje...
newspred.html
oldarrow.html
olddestructuringarray...
olddestructuringobject...
oldspred.html
resetoperator.html
resetoperator.html > html > body > script
1 <!DOCTYPE html>
2 <html>
3 <body>
4 <script>
5 function mul(...args) {
6   let mul = 1;
7   for (let arg of args) mul += arg;
8   return mul;
9 }
10 let n = mul(2, 6, 10, 12, 30, 52);
11 console.log(n);
12 </script>
13 </body>
14 </html>
```

**Output:**

```
113
```

**Conclusion :**

From this practical I came to know the new features of the ES6 and their advantages over the traditional methods followed in java script