{java : 1st test}

1. What’s the purpose of using JavaScript in websites?

JavaScript is used to make websites **interactive**: handle events, validate forms, and communicate with APIs and so on .

1. What is the difference between putting <script> before <body> and after?

If you put <script> before <body>, it runs before the page is fully loaded and may not find some elements. If it’s placed after <body>, it runs after the page loads, so all elements are available.

1. Why most of programmers didn’t use Do-While loop?

because there are simpler alternatives like while or for. Also, do-while executes at least once, which isn’t always desired.

1. In one symbol, how can we access an Array and Object?

**Array** → use square brackets [] (example: arr[0]).

**Object** → use dot . or also [] (example: obj.name or obj["name"]).

1. Which statement type shall we use while we need to get access to all data in Array faster?

To access all data in an array faster, use **for loop**

1. in one word, how can we get execute the function?

**Call**.

1. In one word, we can handle functions through HTML tag by using ….. ?

we handle functions using attributes like **onclick** in HTML

1. What is the difference between indexOf() and includes() ?

indexOf() → returns the **index** of the element or -1 if not found.

includes() → returns **true/false**.

1. What is the difference between slice() and splice() ?

slice() → copies part of an array without changing the original.

splice() → removes/adds elements and **modifies** the original array.

1. what is the variables data types?

**String, Number, Boolean, Object, Array, Null, Undefined, functions**

1. What is the difference between Null and Undefined?

undefined: a variable is declared but not assigned.

null: an intentional empty value.

1. What is the rules for writing variable names ?

Cannot start with a number.

No spaces.

Allowed symbols: \_ and $.

Case-sensitive.

1. var x = 5;

var x = `Hesham`;

++ x;

Var x = 25;

Console.log(x)

What is the output in Console?

**Final output is 25**

1. How can we print `hesham` as string value if we had var myName = `hes195ham`, just mention the methods names only .

slice()

1. If you have the bellow, what will be the output?

var x = “5”;

++x ;

console.log(x)?

the final output is 6

1. If you have the bellow, what will be the output?

var arr = [1,2, [1,2,3,"hesham"],3,4]

arr. forEach((e)= > {

console.log (e. length);

})

Output: undefined, undefined, 4, undefined, undefined.

1. If you have the bellow, what will be the output?

var obj = {

age: 25,

myName: "hesham"

}

obj.forEach( (e)=>{

console.log(e);

})

Output → **TypeError** because objects don’t have forEach.

1. var arr = [1,2,3]

for (var i =1; i < arr. length-1; i++) {

console.log(arr[i])

}

What is the output in Console?

Output is **2**

1. function changeColor() {

document.querySelector(`body`).style .backgroundColor = ‘black’ ;

}

What is the output?

background becomes **black**.

1. What will be the output for the bellow :

function displayResult(arr){

arr.forEach((e)=>{

console.log(e)

})

}

displayResult(`array`).

Output: a, r, r, a, y.

21.function runFunc() {

console.log("1" + 1); // "11"

console.log("A" - 1); // NaN

console.log(2 + "-2" + "2"); // "2-22"

console.log("Hello" - "World" + 78); // NaN

console.log("Hello" + "78"); // "Hello78"

}

runFunc();

What will be the output ?

23-What will be the output in console for , var arr = ["hesham", "ahmed", "mohamed"];

arr.forEach((x, y, z) => {

var result = z.push("ali");

console.log(result);

});

1. What will be the output for ,

var arr = ["hesham", "ahmed", "mohamed"];

var result = arr.slice(0);

var result = arr.pop(); // "mohamed"

var result = arr.push("hessen"); // returns new length → 3

console.log(result); // 3

23-what will be the output for ,

var str = "hesham will learn";

str.split(" ");

var result = str + " " + "java";

console.log(result); "hesham will learn java"

24-What is the output in for the bellow ,noted that 0 is a zero number ;

- 0 === 1 false

- 0 == false true

- 0 == null false

- 0 === `` false

- 0 == `` true

- false == null false

- 0 >= null true

- 5 === 5 true

Thanks …