**Module 9 : Introduction to Advanced JavaScript Basic & DOM**

**1). Write a program to Show an alert.**

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Alert</title>

  </head>

  <body>

    <h2>The alert() Method</h2>

    <p>Click the button to see line-breaks in an alert box.</p>

    <button onclick="myFunction()">Try it</button>

    <script>

      function myFunction() {

        alert("Hello\n My name is jaymin");

      }

    </script>

  </body>

</html>

**2). What will be the result for these expressions?**

1). 5 > 4 :-

<!DOCTYPE html>

<html lang="en">

<head>

    <meta charset="UTF-8">

    <meta http-equiv="X-UA-Compatible" content="IE=edge">

    <meta name="viewport" content="width=device-width, initial-scale=1.0">

    <title>Document</title>

</head>

<body>

    <script>

      var x = 5;

      var y = 4;

      if ( x > y )

      {

        document.write("True");

      }

      else

      {

        document.write("False");

      }

    </script>

</body>

</html>

Ans. True

2). “apple” > “pineapple” :-

<!DOCTYPE html>

<html lang="en">

<head>

    <meta charset="UTF-8">

    <meta http-equiv="X-UA-Compatible" content="IE=edge">

    <meta name="viewport" content="width=device-width, initial-scale=1.0">

    <title>Document</title>

</head>

<body>

    <script>

      var x = "apple";

      var y = "pineapple";

      if ( x > y )

      {

        document.write("True");

      }

      else

      {

        document.write("False");

      }

    </script>

</body>

</html>

Ans. False

3). “2” > “12” :-

<!DOCTYPE html>

<html lang="en">

<head>

    <meta charset="UTF-8">

    <meta http-equiv="X-UA-Compatible" content="IE=edge">

    <meta name="viewport" content="width=device-width, initial-scale=1.0">

    <title>Document</title>

</head>

<body>

    <script>

      var x = "2";

      var y = "12";

      if ( x > y )

      {

        document.write("True");

      }

      else

      {

        document.write("False");

      }

    </script>

</body>

</html>

Ans. True

4). Undefined == null :-

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      var x;

      var y = null;

      if (x == y) {

        document.write("True");

      } else {

        document.write("False");

      }

    </script>

  </body>

</html>

Ans. True

5). Undefined === null :-

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      var x;

      var y = null;

      if (x === y) {

        document.write("True");

      } else {

        document.write("False");

      }

    </script>

  </body>

</html>

Ans. False

6). Null == “\n0\n”

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      var x=null;

      var y = "\n0\n";

      if (x == y) {

        document.write("True");

      } else {

        document.write("False");

      }

    </script>

  </body>

</html>

Ans. False

7). Null === + “\n0\n”

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      var x=null;

      var y = "\n0\n";

      if (x === + y) {

        document.write("True");

      } else {

        document.write("False");

      }

    </script>

  </body>

</html>

Ans. False

**3). Will alert be shown?**

if ("0") { alert( 'Hello'); }

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      if ("0") { alert( 'Hello'); }

    </script>

  </body>

</html>

Ans.

Shape, rectangle

Description automatically generated  
**4). What is the code below going output ?**

Ans.

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      alert( null || 2 || undefined );

    </script>

  </body>

</html>

Output :-

Shape, rectangle

Description automatically generated

**5). The following function returns true if the parameter age is greater than 18. Otherwise it asks for a confirmation and returns its result.**

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      const checkAge = 12;

      if (checkAge>18)

      {

        document.write("true");

      }

      else

      {

        confirm("did parents allow you?");

      }

    </script>

  </body>

</html>

**6). Replace function expression with arrow functions in the code below.**

Ans.

<!DOCTYPE html>

<html lang="en">

  <head>

    <meta charset="UTF-8" />

    <meta http-equiv="X-UA-Compatible" content="IE=edge" />

    <meta name="viewport" content="width=device-width, initial-scale=1.0" />

    <title>Document</title>

  </head>

  <body>

    <script>

      var ask = (question, yes, no) => {

        if (comfirm(question)) {

          yes();

        } else no();

      };

      // var ask = ("Do You Agree?", ()=>{alert("You Agreed.")})=>{

      //   alert("alert");

      // };

    </script>

  </body>

</html>