EXP: 2 JAVASCRIPT

2) Write JavaScript to validate the following fields of the Registration page.

a) First Name (Name should contains alphabets and the length

Should not be less than 6 characters).

b) Password (Password should not be less than 6 characters length).

c) E-mail id (should not contain any invalid and must follow the

standard pattern name@domain.com)

d) Mobile Number (Phone number should contain 10 digits only).

e) Last Name and Address (should not be Empty).

AIM:

Write JavaScript to validate the following fields of the Registration page.

ALGORITHM:

Step 1: Create the HTML Form

- Add input fields for First Name, Last Name, Email, Password, Mobile Number, and Address.
- Add a Submit Button to trigger validation.

Step 2: Apply Elegant CSS Styling

- Add responsive styling with hover effects.
- Improve form layout, input fields, and button styles.

Step 3: Add JavaScript for Validation

- Validate each field and show error messages if invalid.
- Display "Registration Successful!" if all inputs are valid.

Step 4: Full Working Code in One HTML File

- Copy and paste the code below into an `.html` file and open it in a browser.

PROGRAM:

```html
<!DOCTYPE html>
<html lang="en">
<head>
  <meta charset="UTF-8">
  <meta name="viewport" content="width=device-width, initial-scale=1.0">
  <title>Registration Form</title>
  <style>
    body {
      font-family: Arial, sans-serif;
      background: linear-gradient(135deg, #89b5df, #8fd4f0);
      display: flex;
      justify-content: center;
      align-items: center;
      height: 100vh;
      margin: 0;
    }
    .container {
      background: white;
      padding: 20px;
      border-radius: 10px;
      box-shadow: 0 4px 8px rgba(0, 0, 0, 0.2);
      width: 350px;
      text-align: center;
    }
    h2 {
      color: #333;
    }
    input {
      width: 100%;
      padding: 10px;
      margin: 8px 0;
      border: 1px solid #ccc;
      border-radius: 5px;
      font-size: 16px;
    }
    input:focus {
      border-color: #ff6f61;
      outline: none;
      box-shadow: 0 0 5px rgba(255, 111, 97, 0.5);
    }
    .error {
      color: red;
      font-size: 14px;
      text-align: left;
      margin-bottom: 5px;
    }
    .invalid {
      border: 1px solid red !important;
    }
    button {
      width: 100%;
      padding: 10px;
```
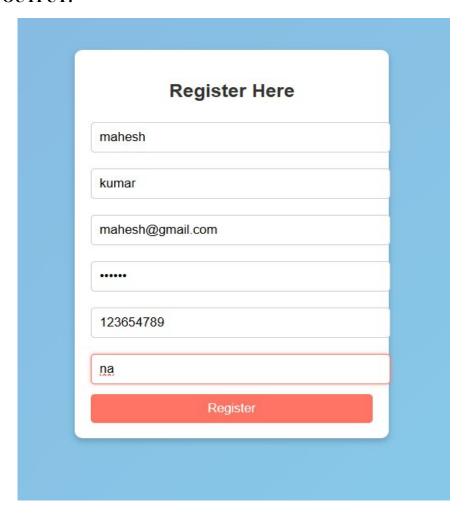
```css
        background: #ff6f61;
        color: white;
        border: none;
        border-radius: 5px;
        font-size: 16px;
        cursor: pointer;
      }
      button:hover {
        background: #e55b50;
      }
    </style>
  </head>
```
```html
  <body>
    <div class="container">
      <h2>Register Here</h2>
      <form id="registrationForm" onsubmit="return validateForm(event)">
        <input type="text" id="firstName" placeholder="First Name">
        <div class="error" id="firstNameError"></div>

        <input type="text" id="lastName" placeholder="Last Name">
        <div class="error" id="lastNameError"></div>

        <input type="email" id="email" placeholder="Email">
        <div class="error" id="emailError"></div>

        <input type="password" id="password" placeholder="Password">
        <div class="error" id="passwordError"></div>

        <input type="text" id="mobile" placeholder="Mobile Number">
        <div class="error" id="mobileError"></div>

        <input type="text" id="address" placeholder="Address">
        <div class="error" id="addressError"></div>

        <button type="submit">Register</button>
      </form>
    </div>

    <script>
      function validateForm(event) {
        event.preventDefault(); // Prevents form submission on Enter key

        let isValid = true;

        // Get input values
        let firstName = document.getElementById("firstName").value.trim();
        let lastName = document.getElementById("lastName").value.trim();
        let email = document.getElementById("email").value.trim();
        let password = document.getElementById("password").value.trim();
        let mobile = document.getElementById("mobile").value.trim();
        let address = document.getElementById("address").value.trim();

        // Clear previous errors
```

```javascript
        document.querySelectorAll(".error").forEach(e => e.innerText = "");
        document.querySelectorAll("input").forEach(input => input.classList.remove("invalid"));

        // First Name Validation (Minimum 3 letters, only alphabets)
        if (!/^[A-Za-z]{3,}$/.test(firstName)) {
            document.getElementById("firstNameError").innerText = "First name must be at least 3 letters.";
            document.getElementById("firstName").classList.add("invalid");
            isValid = false;
        }

        // Last Name Validation (Only letters, can't be empty)
        if (!/^[A-Za-z]+$/.test(lastName)) {
            document.getElementById("lastNameError").innerText = "Enter a valid last name.";
            document.getElementById("lastName").classList.add("invalid");
            isValid = false;
        }

        // Email Validation (Standard email format)
        if (!/^[a-zA-Z0-9._%+-]+@[a-zA-Z0-9.-]+\.[a-zA-Z]{2,}$/.test(email)) {
            document.getElementById("emailError").innerText = "Enter a valid email (e.g.,
name@domain.com).";
            document.getElementById("email").classList.add("invalid");
            isValid = false;
        }

        // Password Validation (At least 6 characters, one uppercase, one number, one special character)
        if (!/^(?=.*[A-Z])(?=.*\d)(?=.*[@$!%*?&])[A-Za-z\d@$!%*?&]{6,}$/.test(password)) {
            document.getElementById("passwordError").innerText = "Password must be at least 6 characters,
include one uppercase, one number, and one special character.";
            document.getElementById("password").classList.add("invalid");
            isValid = false;
        }

        // Mobile Number Validation (10-digit numeric only)
        if (!/^\d{10}$/.test(mobile)) {
            document.getElementById("mobileError").innerText = "Enter a valid 10-digit mobile number.";
            document.getElementById("mobile").classList.add("invalid");
            isValid = false;
        }

        // Address Validation (Can't be empty)
        if (address === "") {
            document.getElementById("addressError").innerText = "Address cannot be empty.";
            document.getElementById("address").classList.add("invalid");
            isValid = false;
        }

        if (isValid) {
            alert("Registration Successful!");
        }
    }
  </script>
</body>
```

```
</html>
```

OUTPUT:

RESULT: The Registration Form was successfully created using HTML, CSS, and JavaScript.