

## Problem 1: Basic Controlled Form with Validation

### Task:

Create a React form with the following fields:

- **Name** (text input, required)
- **Email** (email input, must be a valid email format)
- **Password** (password input, minimum 8 characters)

### Requirements:

1. Use **controlled components** (state management via `useState`).
2. Implement **real-time validation** (display error messages if validation fails).
3. On submission:
  - Prevent the default form behavior.
  - Display a success message if all validations pass.
  - Log the form data to the console.

### Example UI Structure:

```
<label>Name:</label>
<input type="text" value={name} onChange={(e) => setName(e.target.value)} />
{nameError && <p style={{ color: "red" }}>{nameError}</p>}

<button type="submit">Submit</button>
{isSubmitted && <p>Form submitted successfully!</p>}
```