

Querying for Elements With Different Criteria

React Testing Library provides many different query functions. Each begins with a name like `getBy`, `findBy`, etc. The names also have common endings. The different name endings indicate how the query for an element will be performed.

End of Function Name	Search Criteria
ByRole	Finds elements based on their implicit or explicit ARIA role
ByLabelText	Find form elements based upon the text their paired labels contain
ByPlaceholderText	Find form elements based upon their placeholder text
ByText	Find elements based upon the text they contain
ByDisplayValue	Find elements based upon their current value
ByAltText	Find elements based upon their <code>alt</code> attribute
ByTitle	Find elements based upon their <code>title</code> attribute
ByTestId	Find elements based upon their <code>data-testid</code> attribute

When to Use Each

Always prefer using query functions ending with `ByRole`. Only use others if `ByRole` is not an option.

```
1 import { screen, render } from '@testing-library/react';
2 import { useState } from 'react';
3
4 function DataForm() {
5   const [email, setEmail] = useState('asdf@asdf.com');
6
7   return (
8     <form>
9       <h3>Enter Data</h3>
10
11       <div data-testid="image wrapper">
12         
13       </div>
14
15       <label htmlFor="email">Email</label>
16       <input
17         id="email"
18         value={email}
19         onChange={e => setEmail(e.target.value)}
20       />
21
22       <label htmlFor="color">Color</label>
23       <input id="color" placeholder="Red" />
24     </form>
25   );
26 }
```

+ Code

+ Text



```
1 test('selecting different elements', () => {
2   render(<DataForm />);
3
4   const elements = [
5     screen.getByRole('button'),
6     screen.getByText(/enter/i),
7
8     screen.getByLabelText(/email/i),
9     screen.getByPlaceholderText('Red'),
10    screen.getByDisplayValue('asdf@asdf.com'),
11    screen.getByAltText('data'),
12    screen.getByTitle(/ready to submit/i),
13
14    screen.getByTestId('image wrapper')
15  ];
16
17  for (let element of elements) {
18    expect(element).toBeInTheDocument();
19  }
20 });
```

+ Code

+ Text