

COM1001 SPRING SEMESTER

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Forms: The Basics

The Timeline of a Form

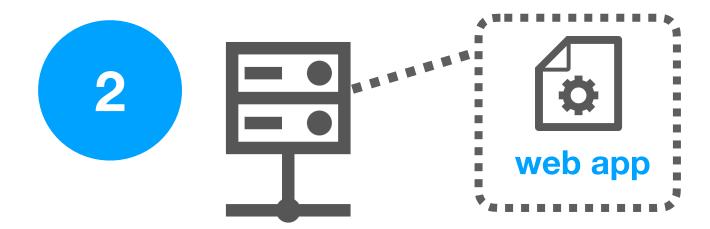


User goes to the URL of a web page with a form.

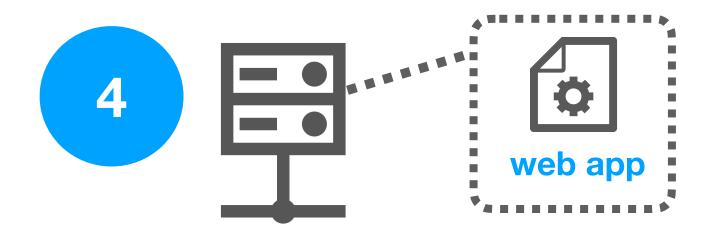


User enters data into form.

Submitting the form causes the browser to generates another web page request. The browser sends form data as part of the request.



Sinatra maps requested URL to a route for the web page that includes the form.



Sinatra maps the URL to a route. Sinatra enters the form data that the user submitted into the params hash.

A Simple Form – HTML

The method attribute for the <form> HTML tag
specifies what HTTP
method to use. Until now
we've only used get.

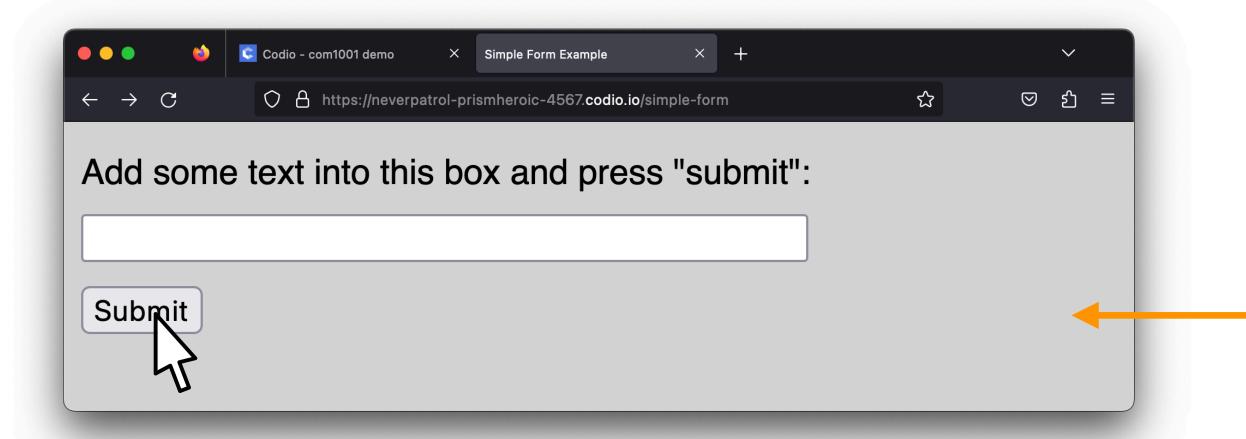
We can leave this attribute out and the browser will assume we mean get.

We need some form fields – HTML elements where the user can enter some data. Here, we have a text field. This is specified by the type="text" attribute. The name attribute is also important, as we'll see later.

```
<html>
 <head>
   <title>Simple Form Example</title>
    <link rel="stylesheet" href="style/style.css">
 </head>
 <body>
    <form method="get" action="/process-simple-form">
     >
       Add some text into this box and press "submit": <br />
       <input type="text" name="text_field" />
     <input type="submit" value="Submit">
    </form>
 </body>
</html>
```

The action attribute for the <form> HTML tag specifies the URL that the browser should request when the form is submitted, and where the form data should be sent.

This form field, with type="submit", is the submit button. When the user clicks this button, the browser is directed to the URL of the action parameter of the form, with the form data (i.e., the value in the text field in this example).



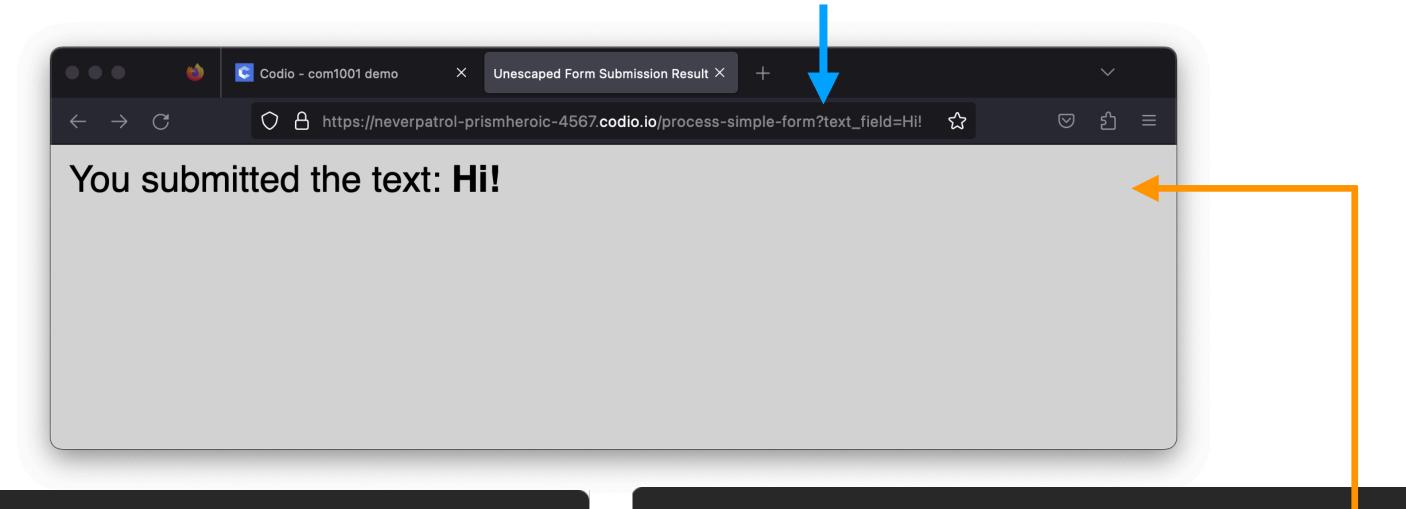
```
get "/simple-form" do
    erb :simple_form
end

get "/process-simple-form" do
    @submitted_text_field_value = params["text_field"]
    erb :process_simple_form
end
```

The form is submitted to /process-simple-form. The Sinatra puts the submitted form data in the params hash. The keys of the hash of the names of the form fields from the original form, and the values consist of the data that the user entered into the form.

```
<html>
 <head>
   <title>Simple Form Example</title>
   <link rel="stylesheet" href="style/style.css">
 </head>
  <body>
   <form method="get" action="/process-simple-form">
     >
       Add some text into this box and press "submit": <br />
       <input type="text" name="text_field" />
     <input type="submit" value="Submit">
   </form>
 </body>
</html>
```

https:// [...] /process-simple-form?text_field=Hi!



</body>

</html>

```
<html>
get "/simple-form" do
 erb :simple_form
                                                           <head>
                                                             <title>Unescaped Form Submission Result
end
                                                             <link rel="stylesheet" href="style/style.css">
get "/process-simple-form" do
                                                           </head>
 @submitted_text_field_value = params["text_field"]
                                                           <body>
 erb :process_simple_form •
                                                             <% unless @submitted_text_field_value.nil? %>
end
                                                               You submitted the text:<strong>
                                                               <%= @submitted_text_field_value %>
                                                               </strong>
                                                             <% end %>
```