



# jQuery



# Adding jQuery to Your Web Pages

- Download the jQuery library from [jquery.com](http://jquery.com)
- Include jQuery from a CDN, like Google



# 1. Download the jQuery library from jQuery.com

- There are two versions of jQuery available for downloading:
  1. Production version - this is for your live website because it has been minified and compressed
  2. Development version - this is for testing and development (uncompressed and readable code)
- Both versions can be downloaded from [jQuery.com](https://jquery.com).
- **<head>**  
**<script src="jquery-3.5.1.min.js"></script>**  
**</head>**



## 2. jQuery CDN

- If you don't want to download and host jQuery yourself, you can include it from a CDN (Content Delivery Network).
- Google is an example of someone who host jQuery:

**<head>**

**<script src="https://ajax.googleapis.com/ajax/libs/jquery/3.5.1/  
jquery.min.js"></script>**

**</head>**



# jQuery Syntax

- The jQuery syntax is tailor-made for **selecting** HTML elements and performing some **action** on the element(s).

Basic syntax is: **`$(selector).action()`**

1. A \$ sign to define/access jQuery
2. A (*selector*) to "query (or find)" HTML elements
3. A jQuery *action()* to be performed on the element(s)



## Examples:

1. `$(this).hide()` - hides the current element.
2. `$("p").hide()` - hides all `<p>` elements.
3. `$(".test").hide()` - hides all elements with `class="test"`.
4. `$("#test").hide()` - hides the element with `id="test"`.

# jQuery Philosophy

Write Less, Do More

Let's do some  
magic

## Our Mission

“Hide all <div>s”

(1) `var divs = document.getElementsByTagName( 'div' );`

(2) `for( var i=0; i < divs.length ; i++) {  
 divs[i].style.display="none";  
};`





Let's do some  
magic

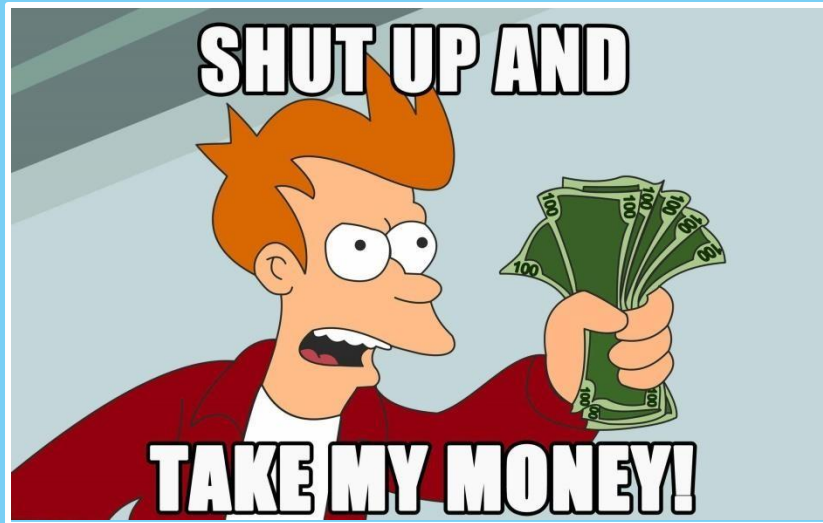
## Our Mission

"Hide all <div>s"

```
$ ("div") .hide () ;
```



jQuery



Don't worry, It's free



# So, What's that \$ ?

It just a function Name

# HjQW

How does jQuery work?

# The jQuery Object

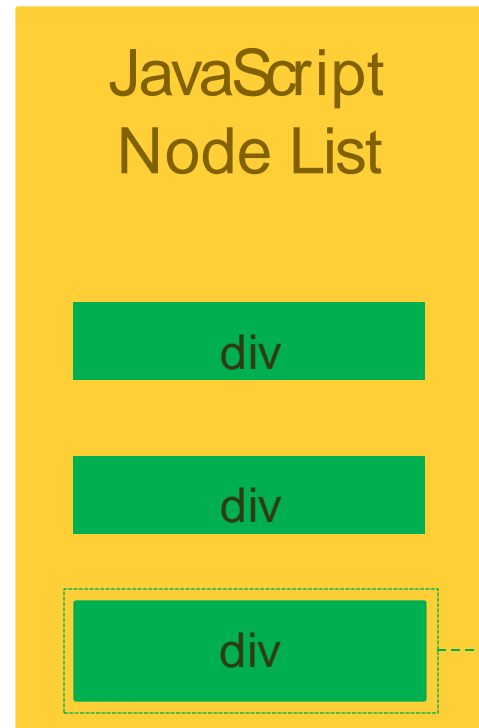
JavaScript  
Node List

div

div

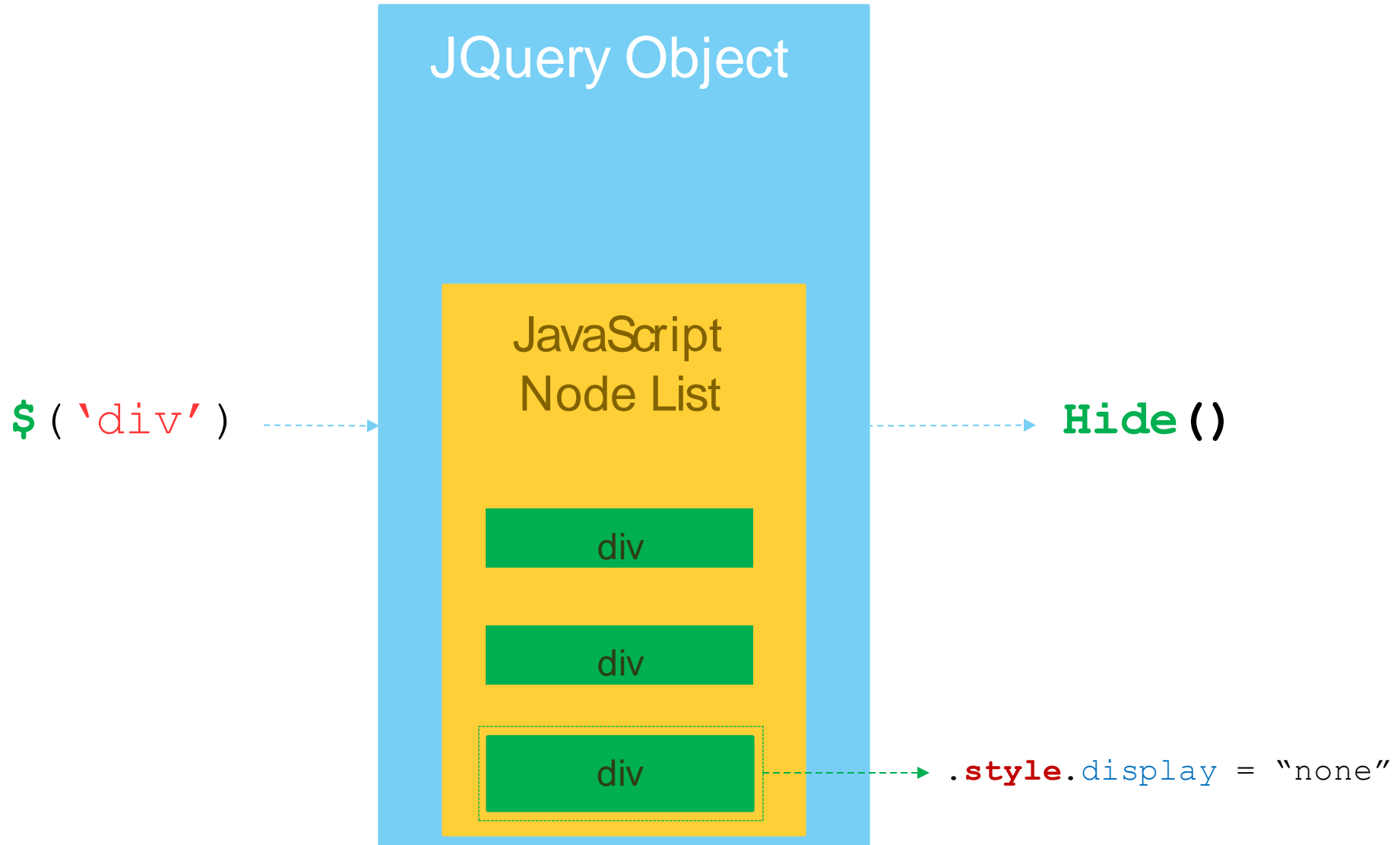
div

# The jQuery Object



→ `.style.display = "none"`

# The jQuery Object



# jQuery Rules

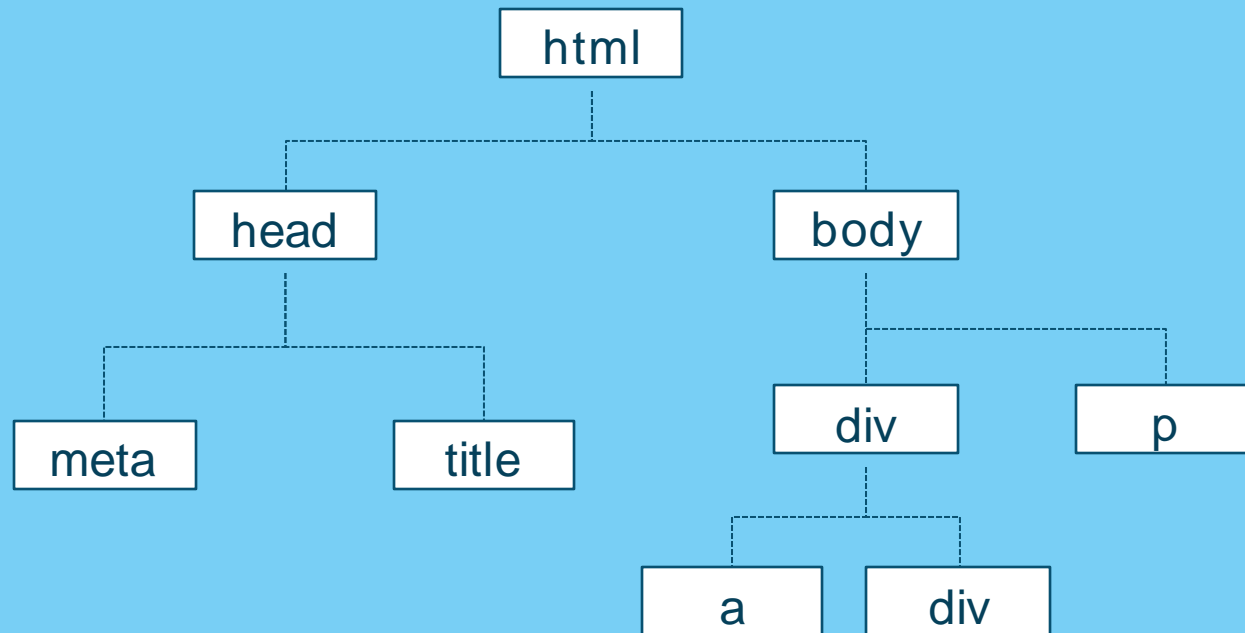
**1** Find DOM Elements

**2** Do Something

```
$ ("div") .hide ();
```



Do you remember DOM  
Tree?



Let's see how **jQuery** controls it

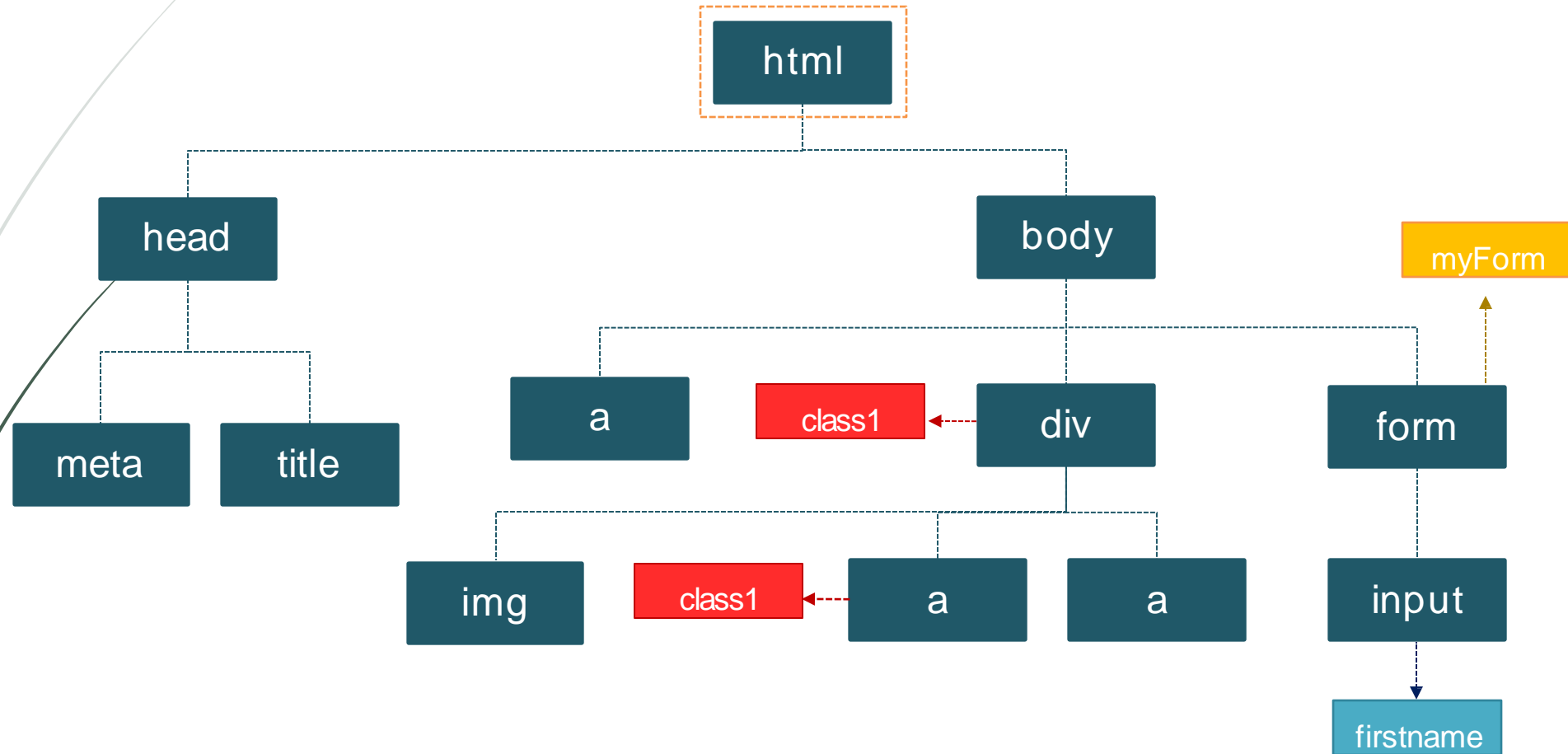
# Find

I will find you, easily

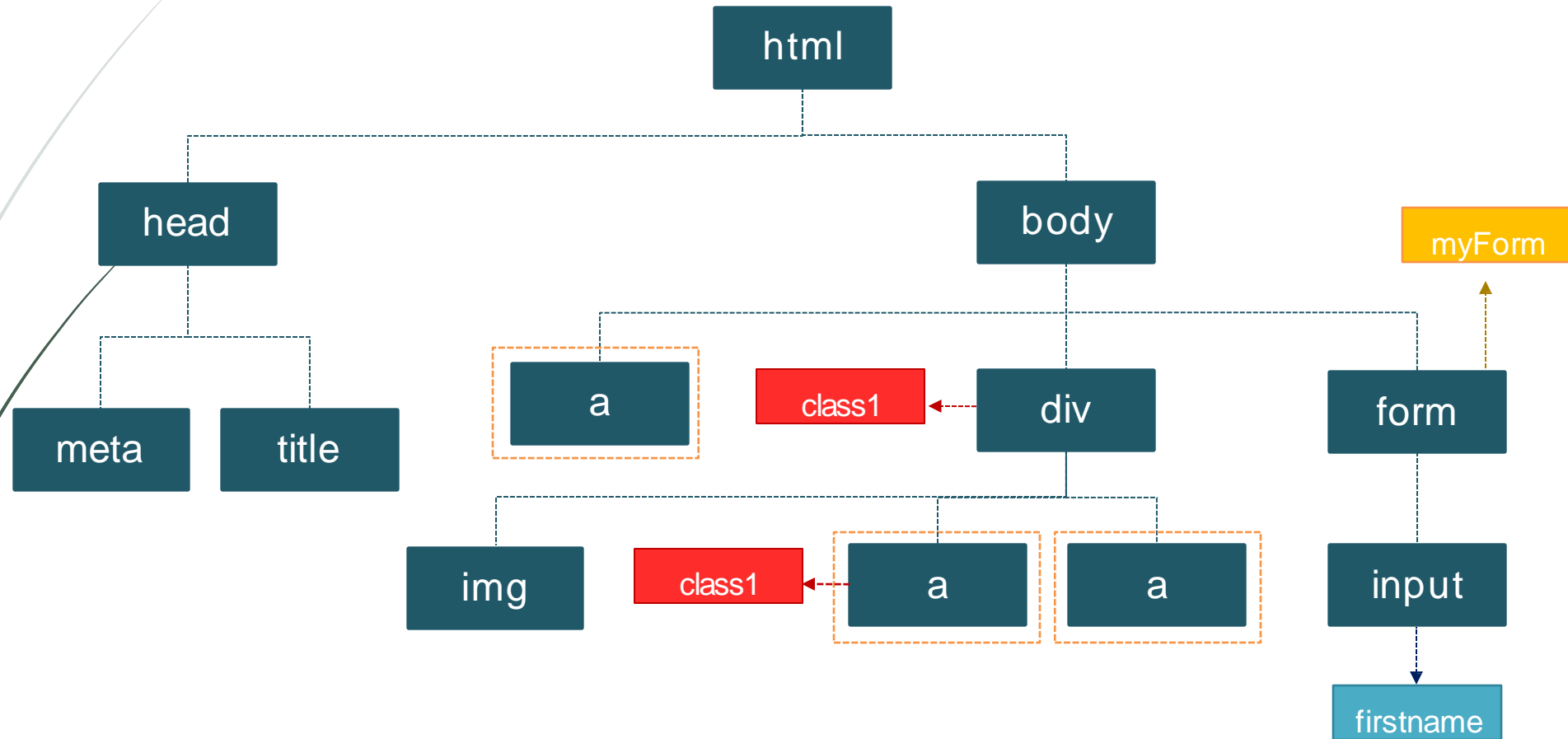
# Using CSS Selectors

Find

\$ ( "\*" )



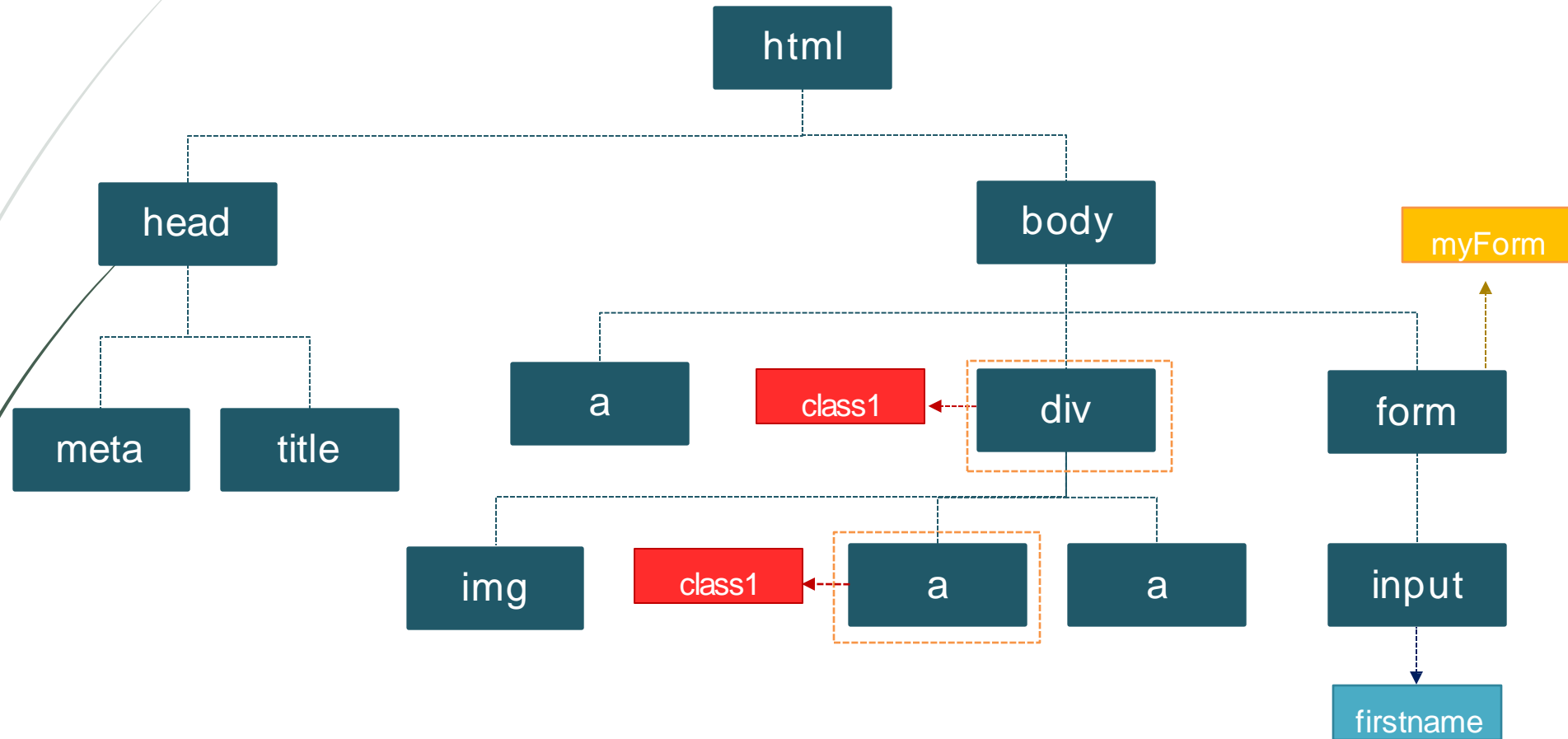
`$ ("a")`



# Using CSS Selectors

Find

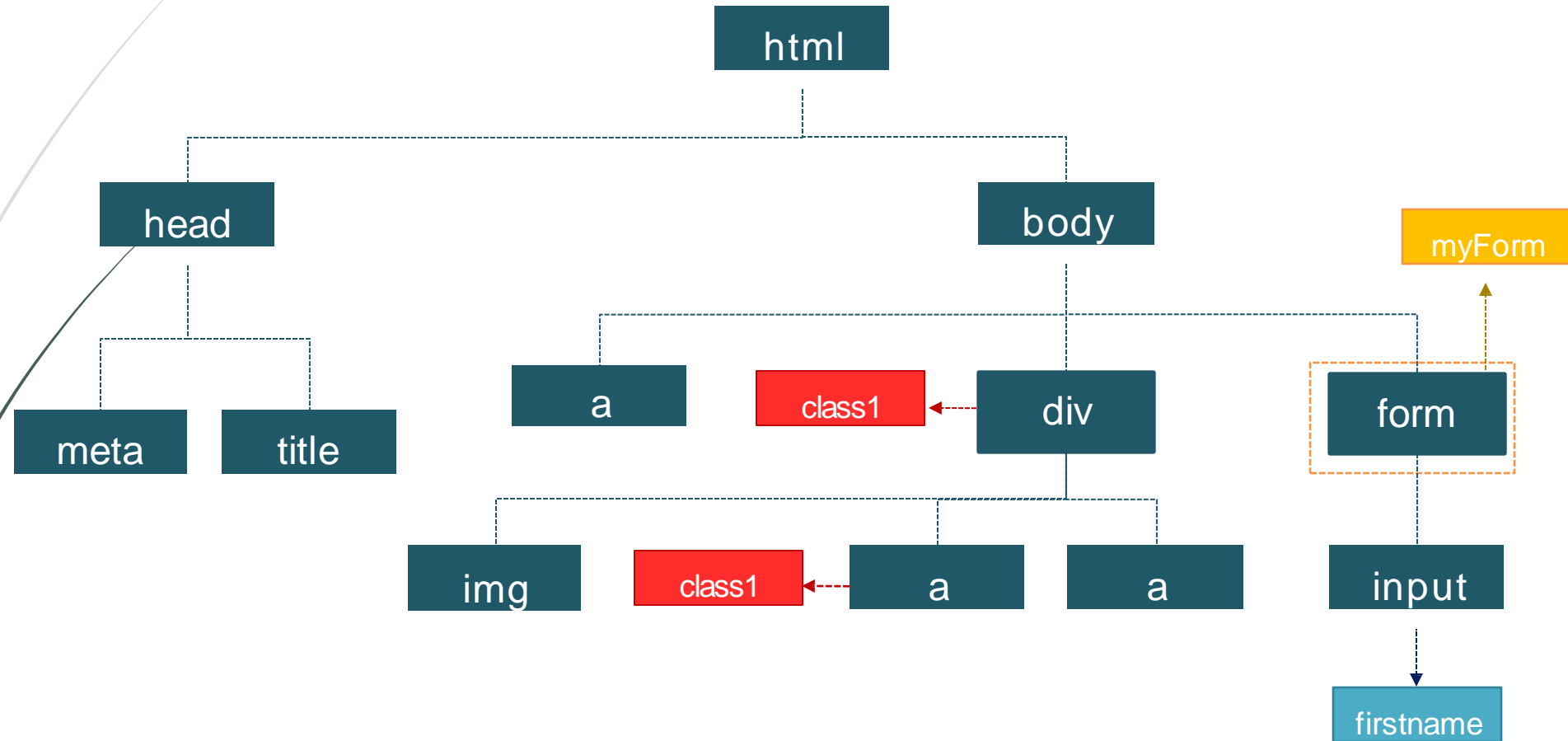
```
$ (".class1")
```



# Using CSS Selectors

Find

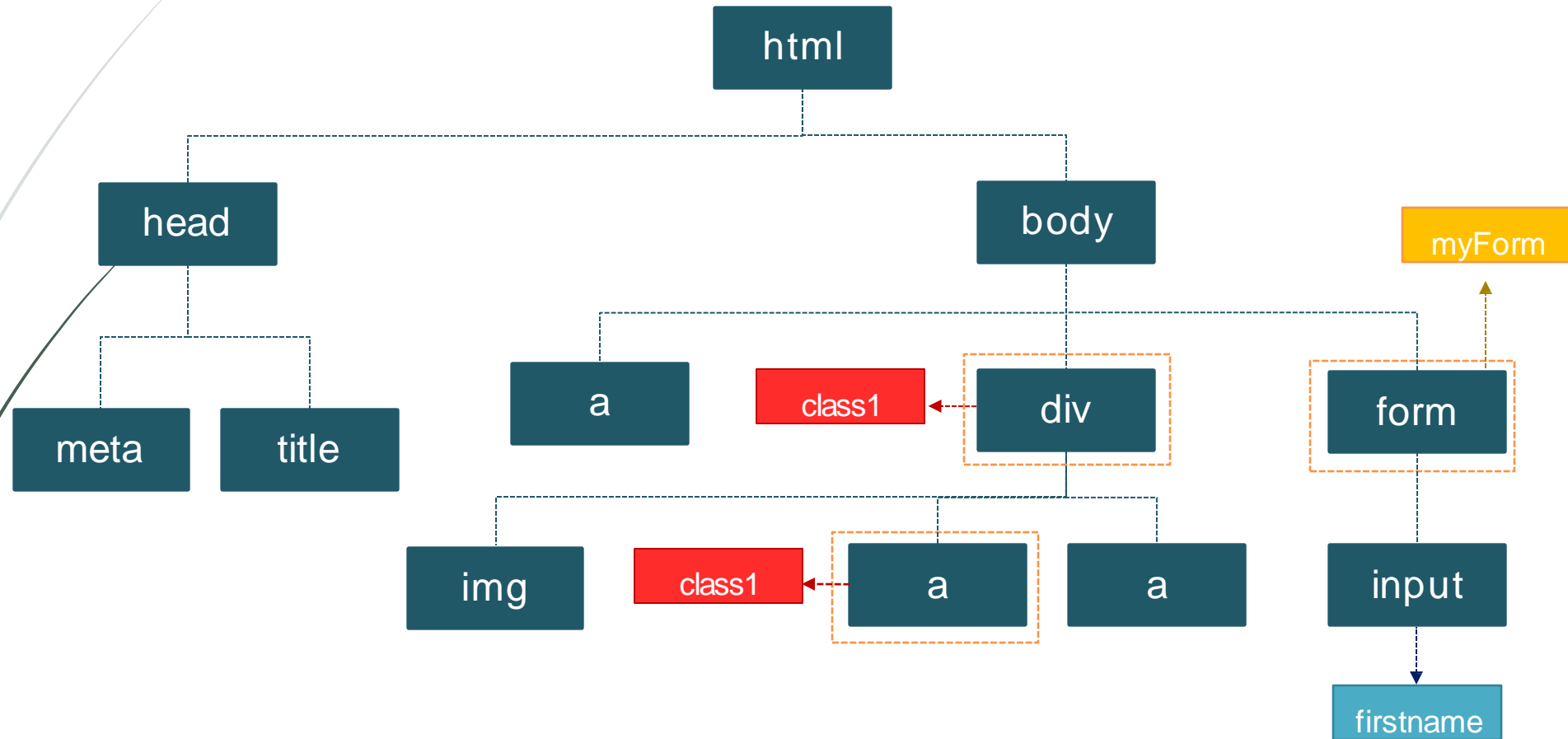
`$ ("#myForm")`



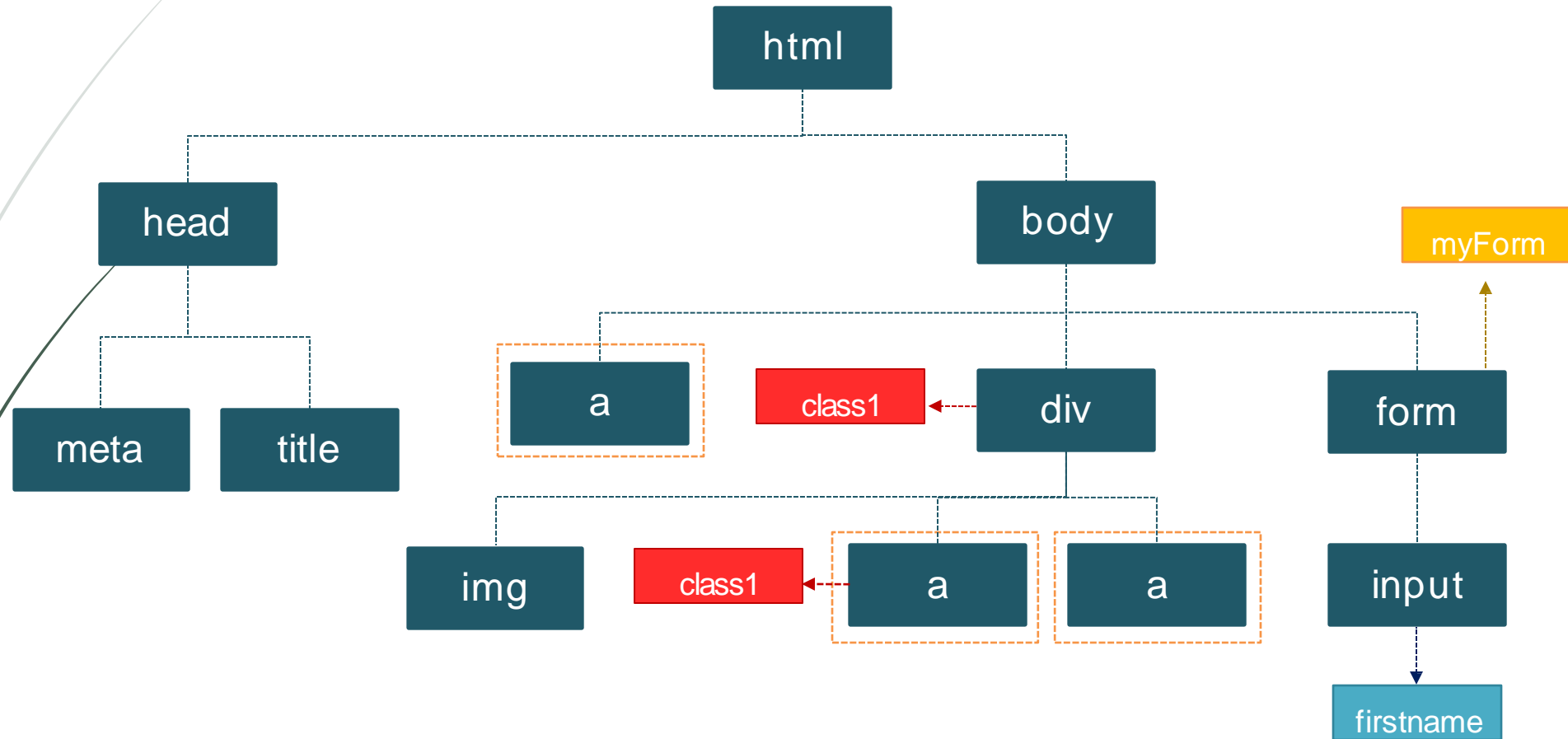
# Using CSS Selectors

Find

```
$("#myForm, .class1, div")
```



`$ ("body a")`

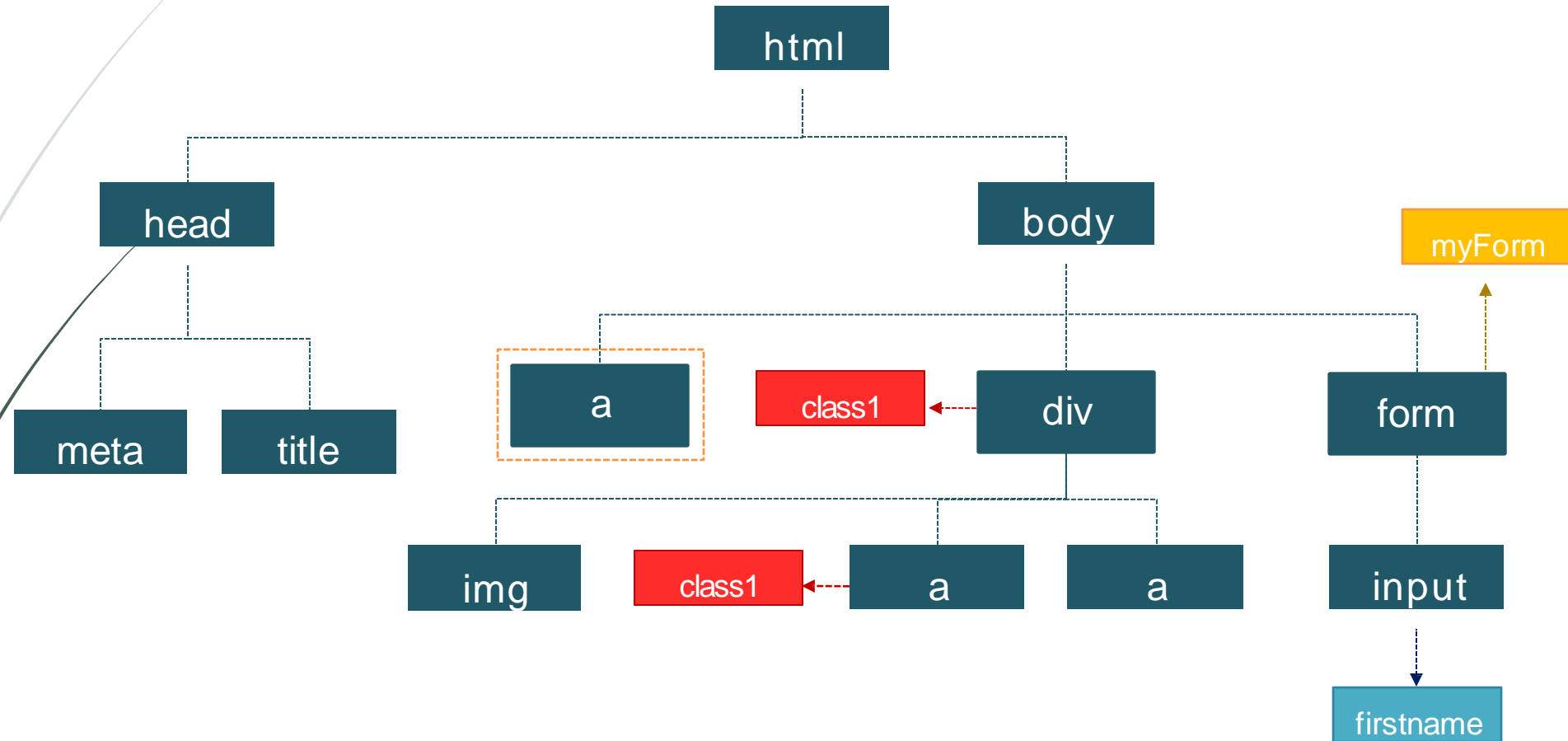




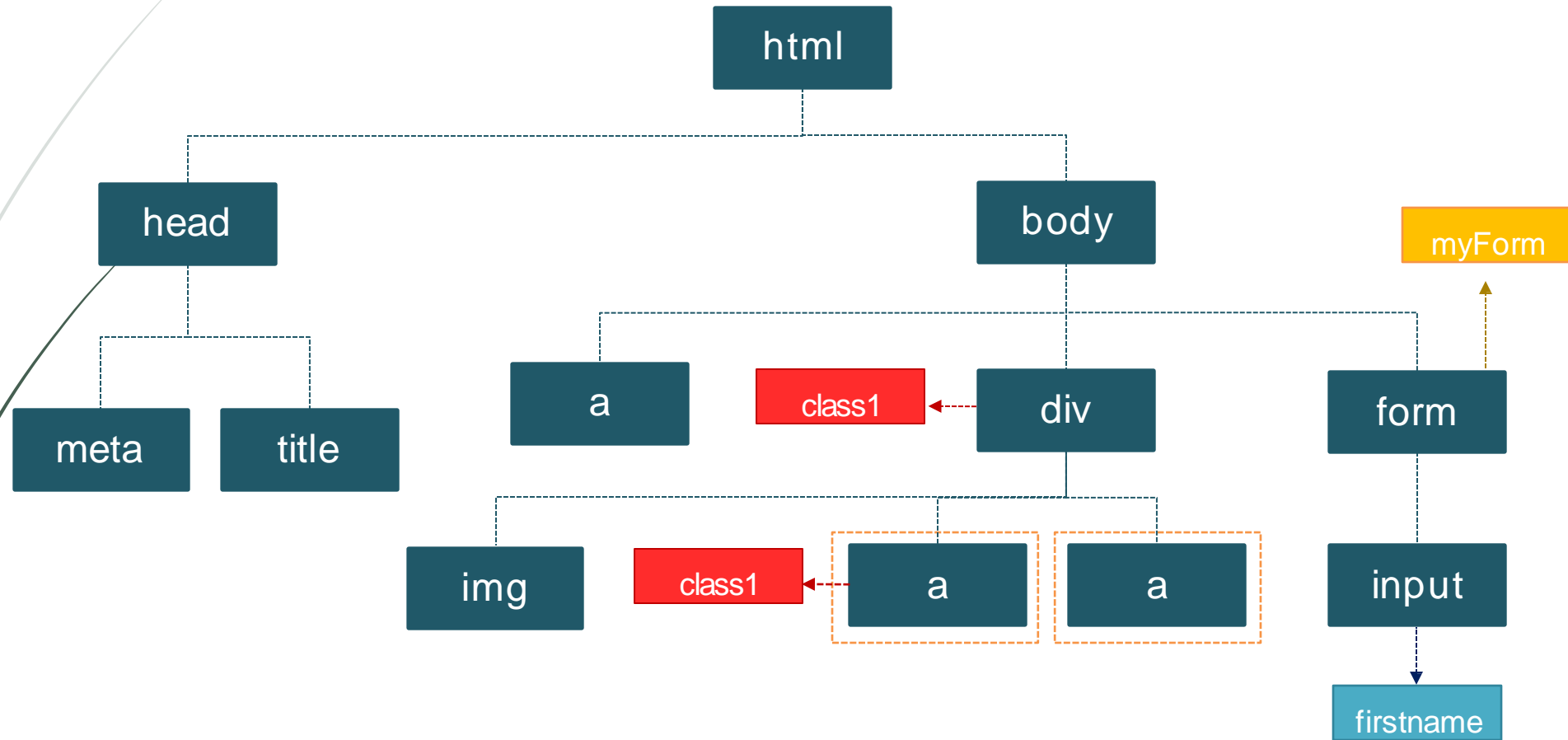
# Using CSS Selectors

Find

`$ ("body>a")`



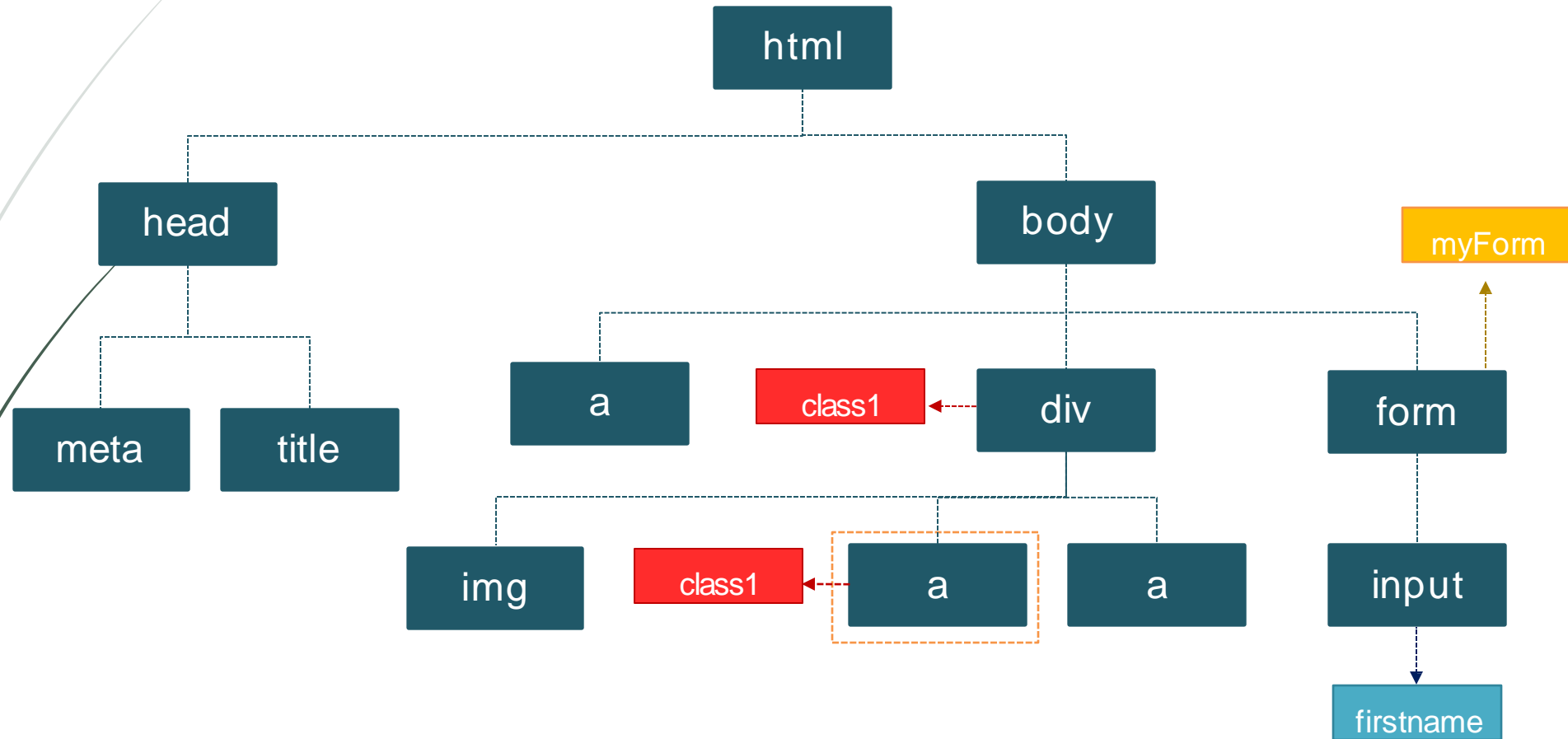
`$ ("img~a")`



# Using CSS Selectors

Find

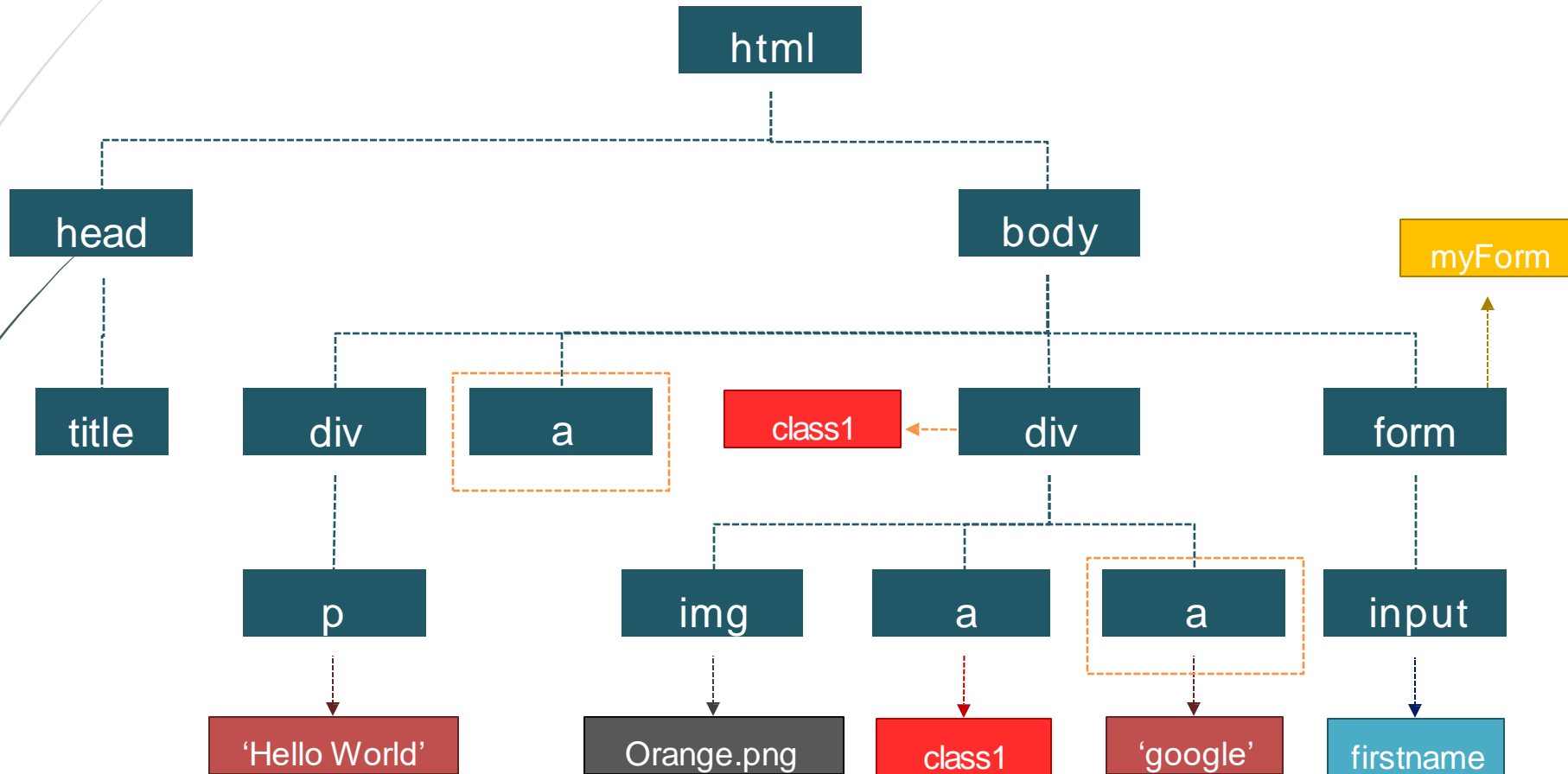
`$ ("img+a")`



# Using Pseudo Classes

Find

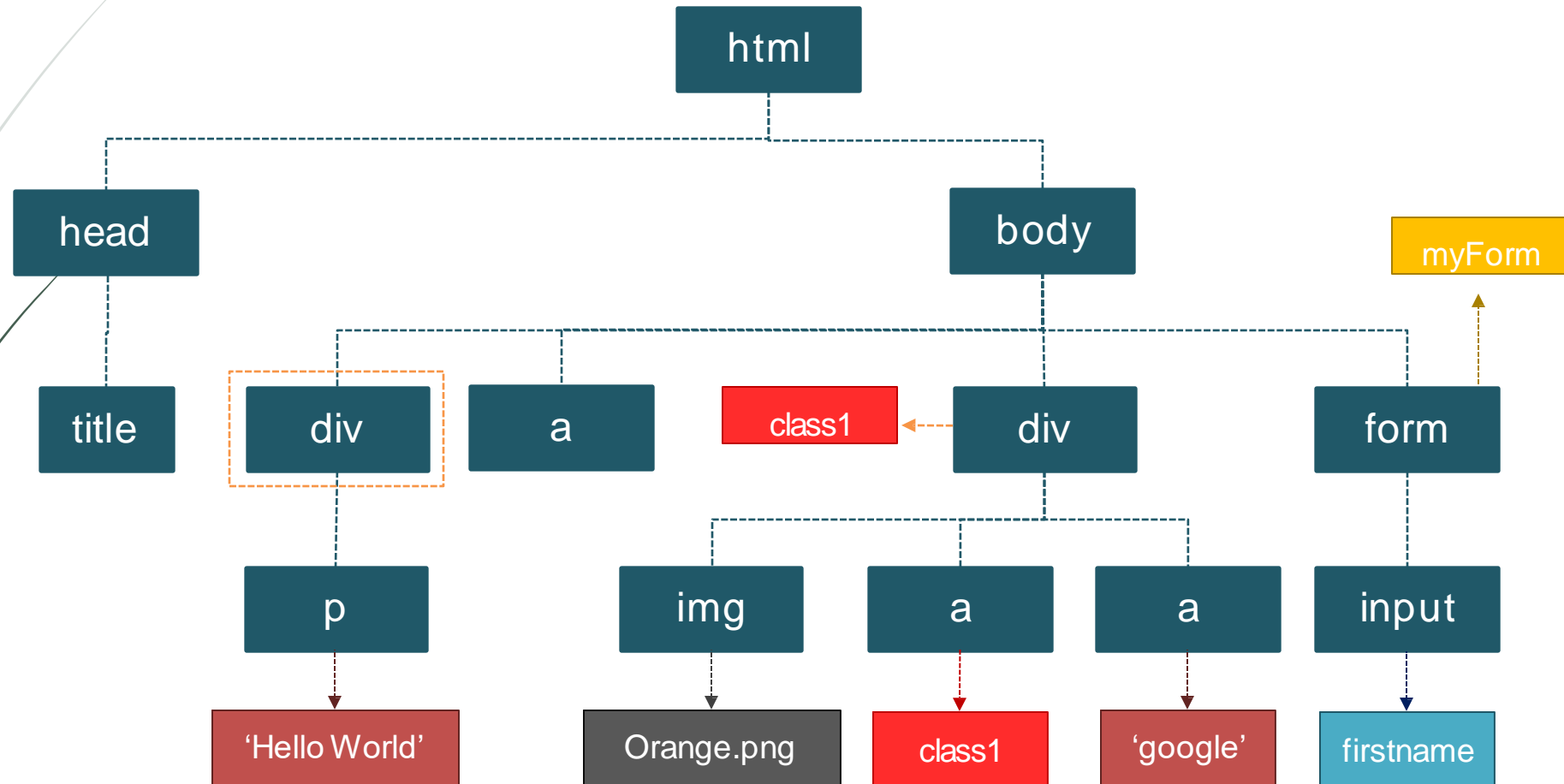
```
$ ("a:not (`.class1`)" )
```



# Using Pseudo Classes

Find

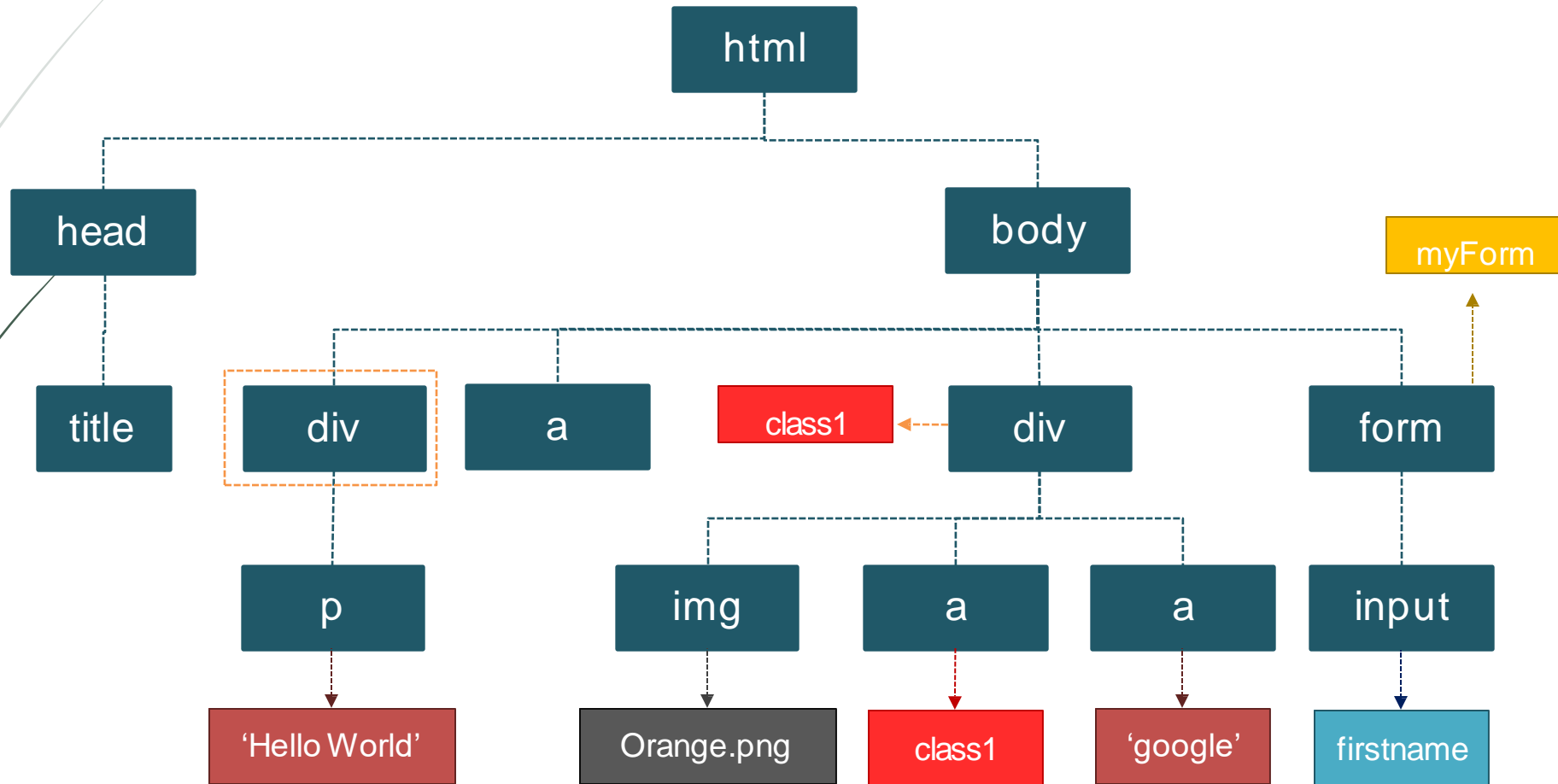
```
$ ("div:has ('p') ")
```



# Using Pseudo Classes

Find

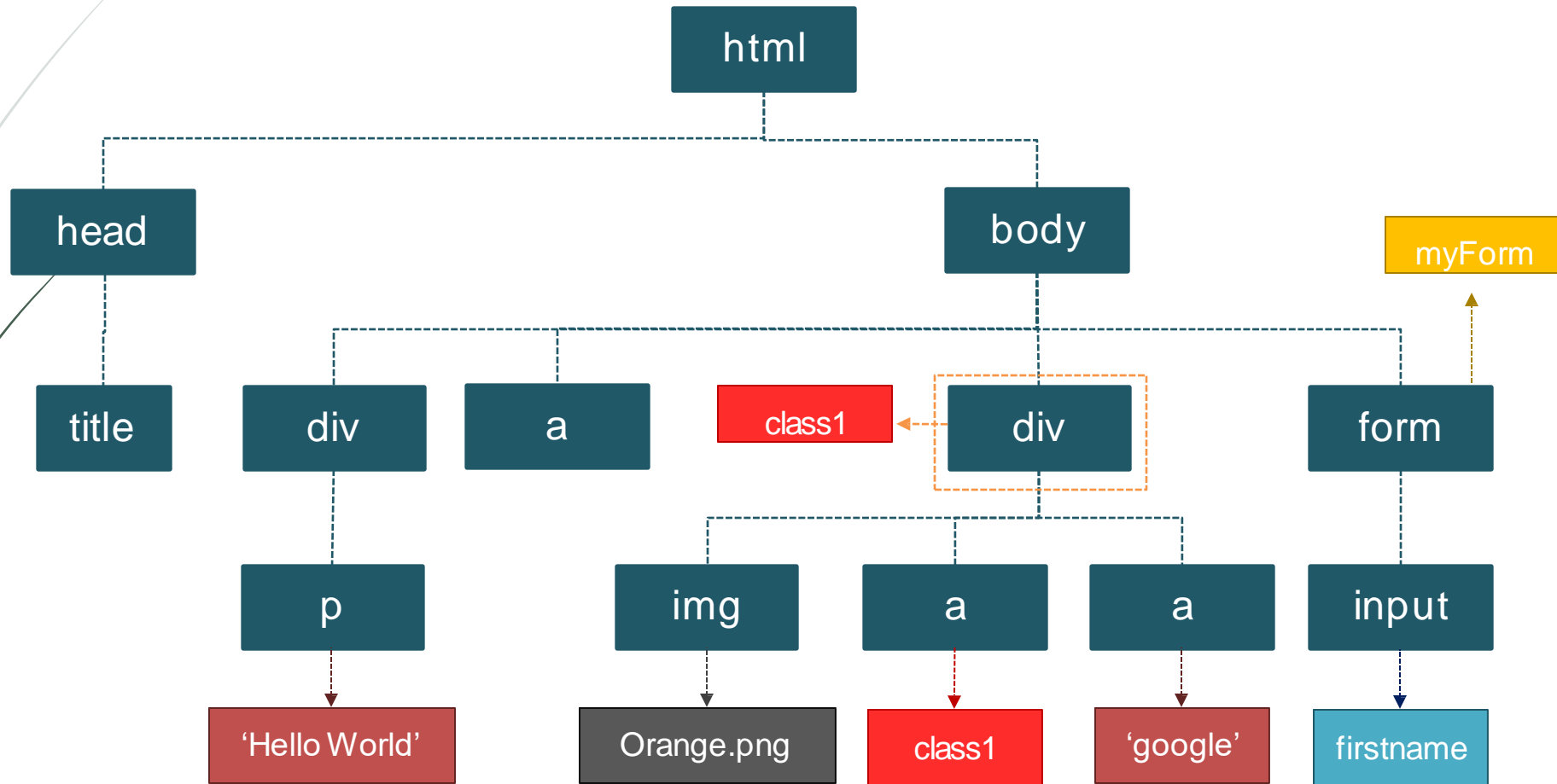
```
$ ("div:first")
```



# Using Pseudo Classes

Find

```
$ ("div:last")
```



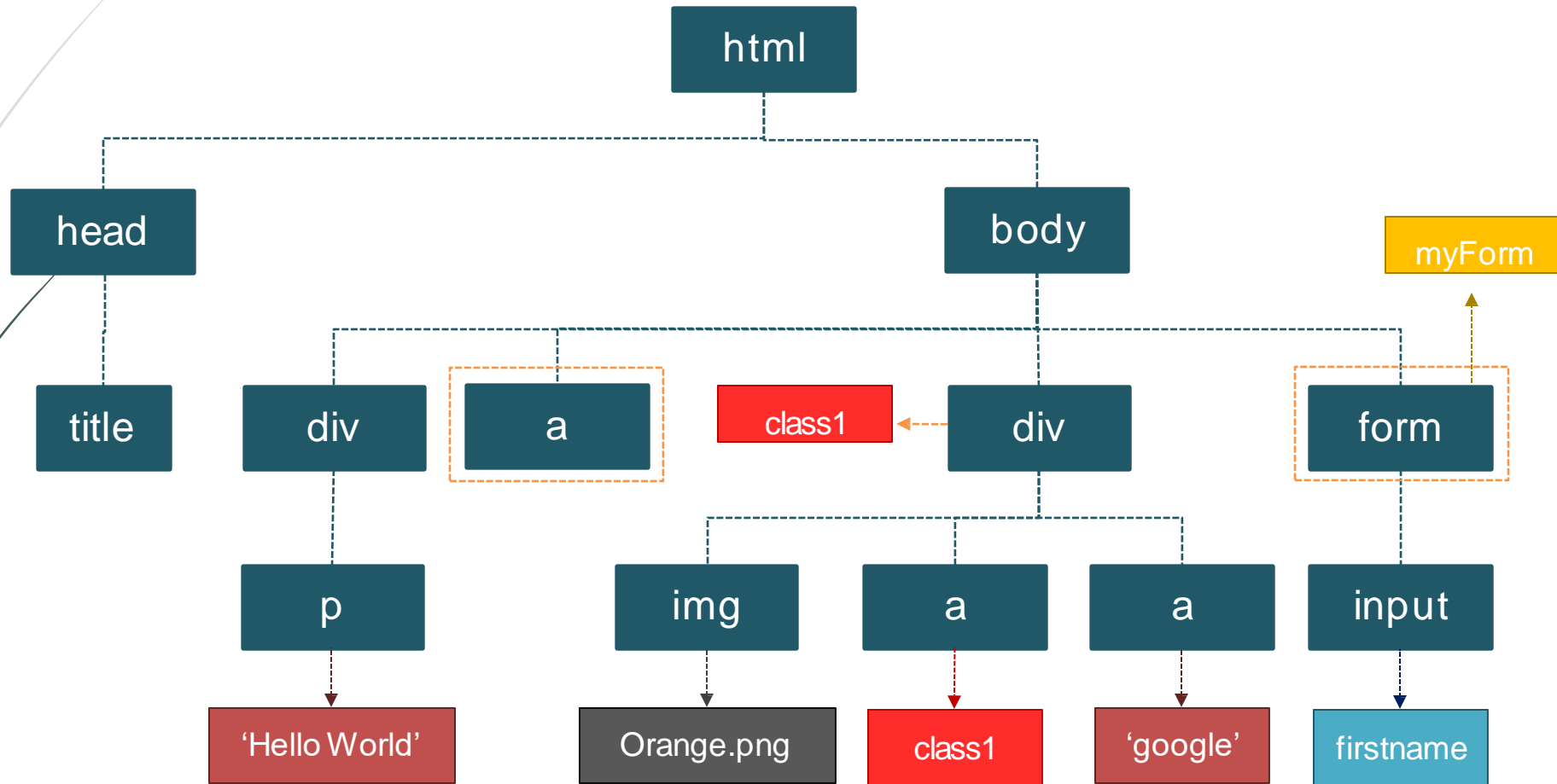




# Using Pseudo Classes

Find

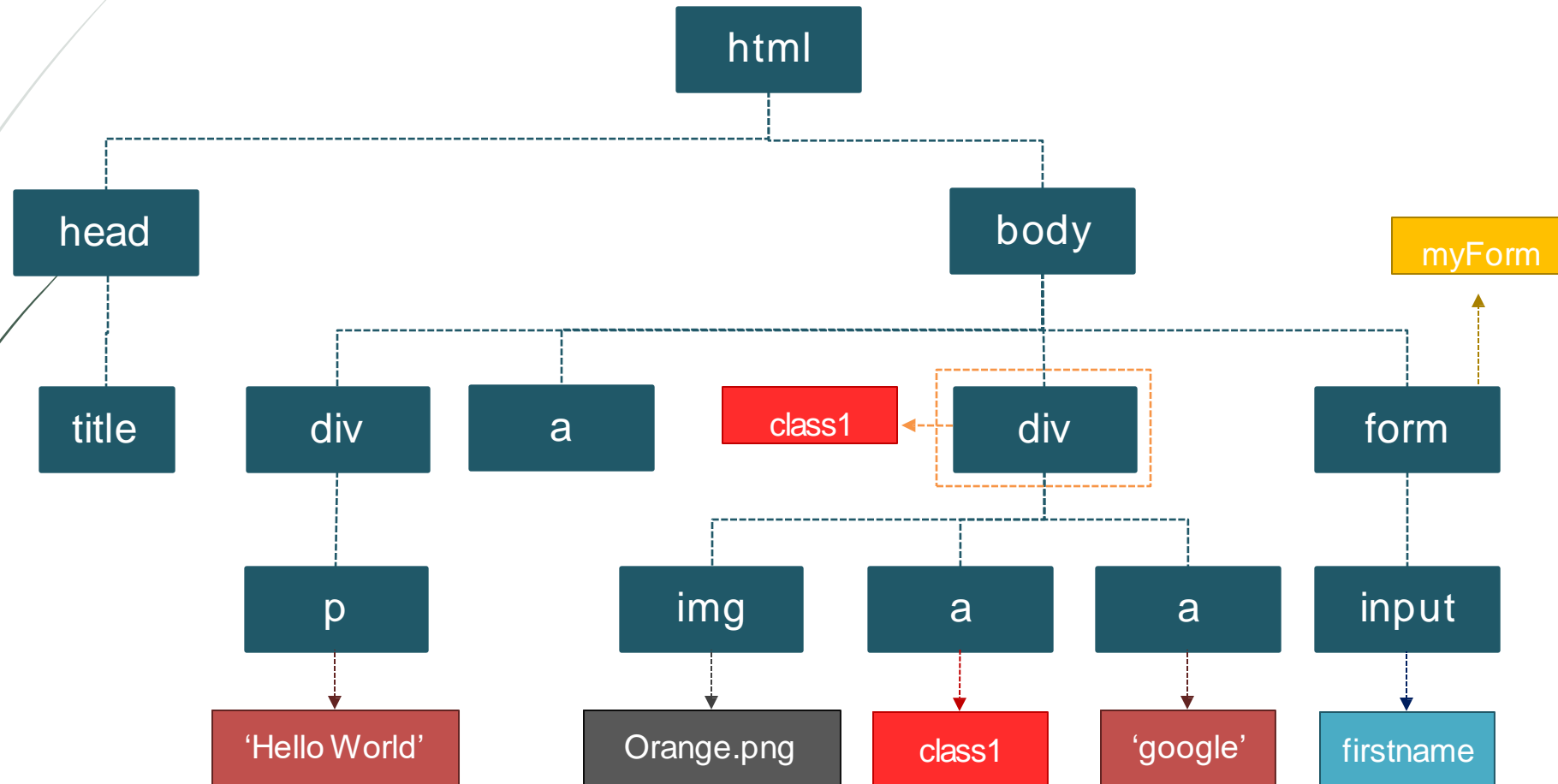
```
$ ("body>:odd")
```



# Using Pseudo Classes

Find

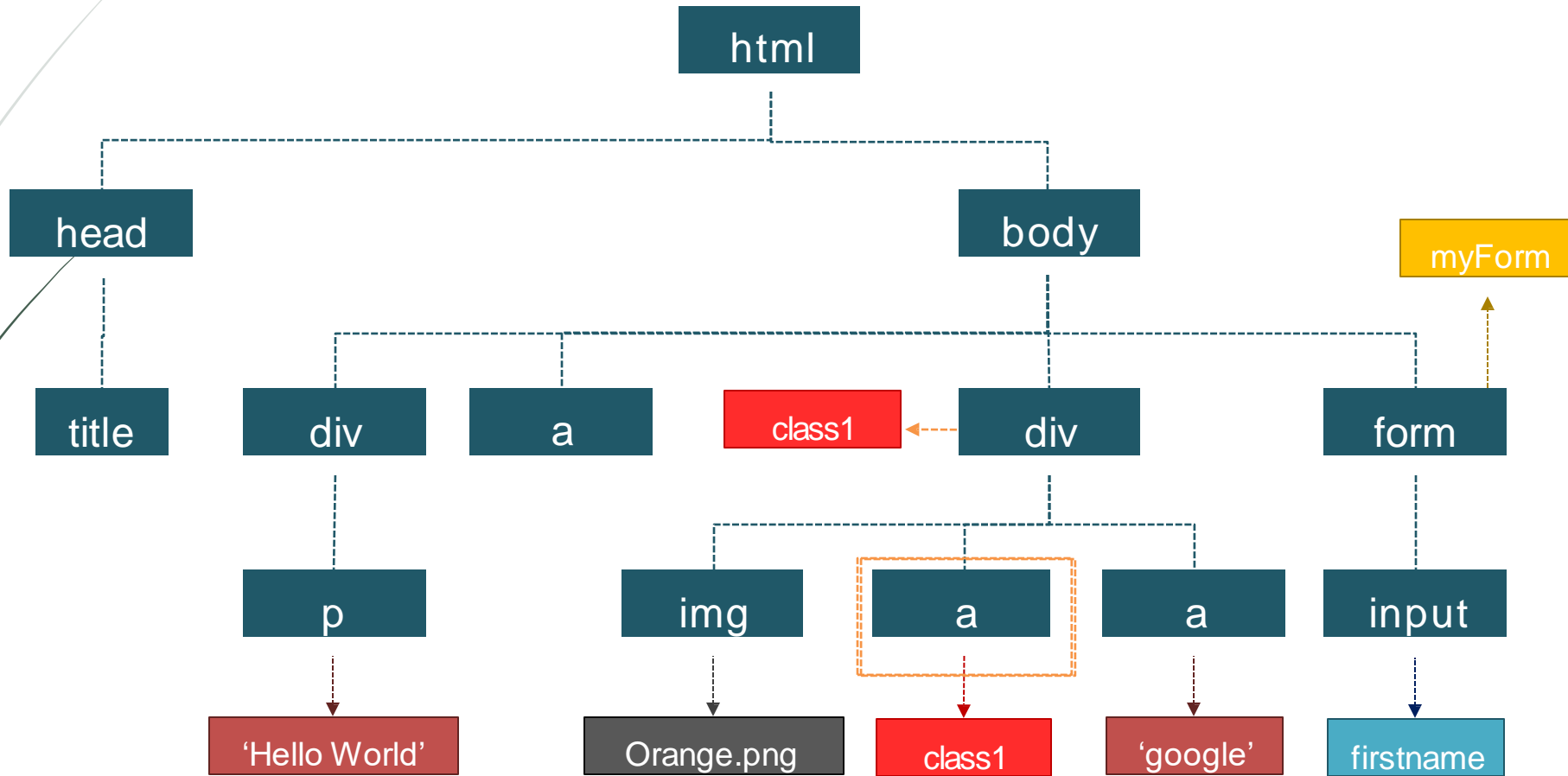
```
$ ("div:contains ('goo' ) ")
```



# Using Pseudo Classes

Find

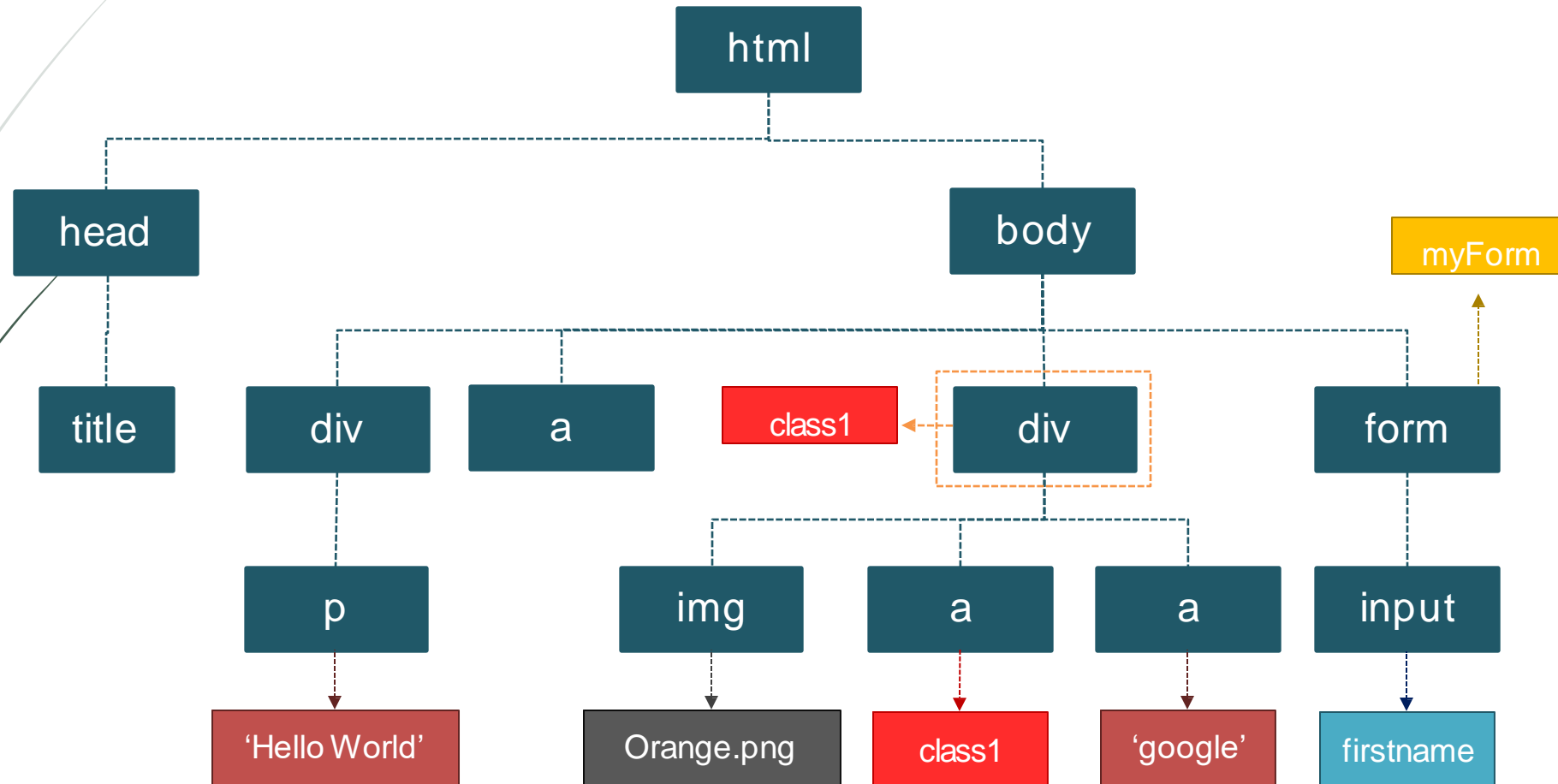
```
$ ("a:empty")
```



# Using Pseudo Classes

Find

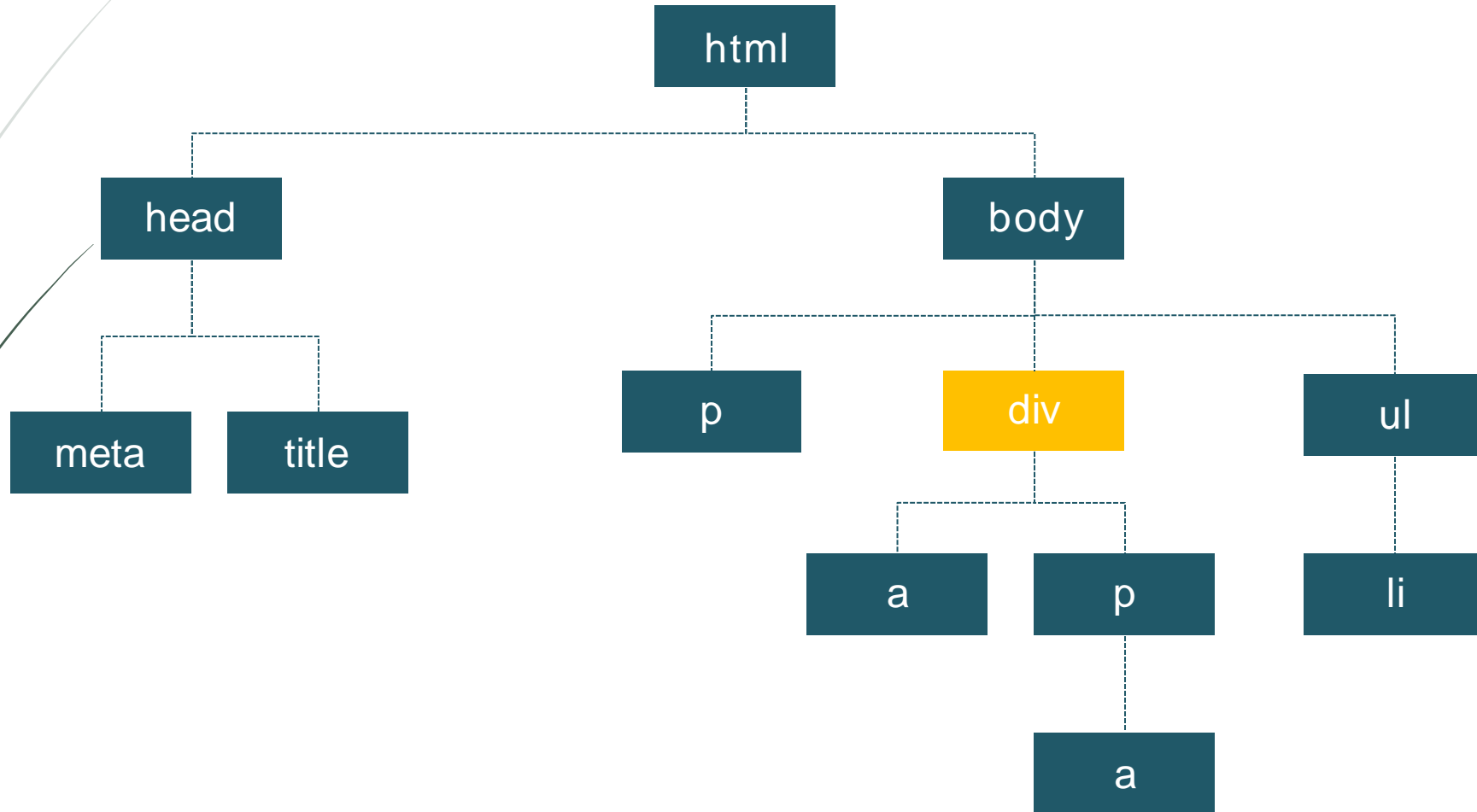
```
$("div.class1:nth-child(3)")
```



# DOM Traversing

Find

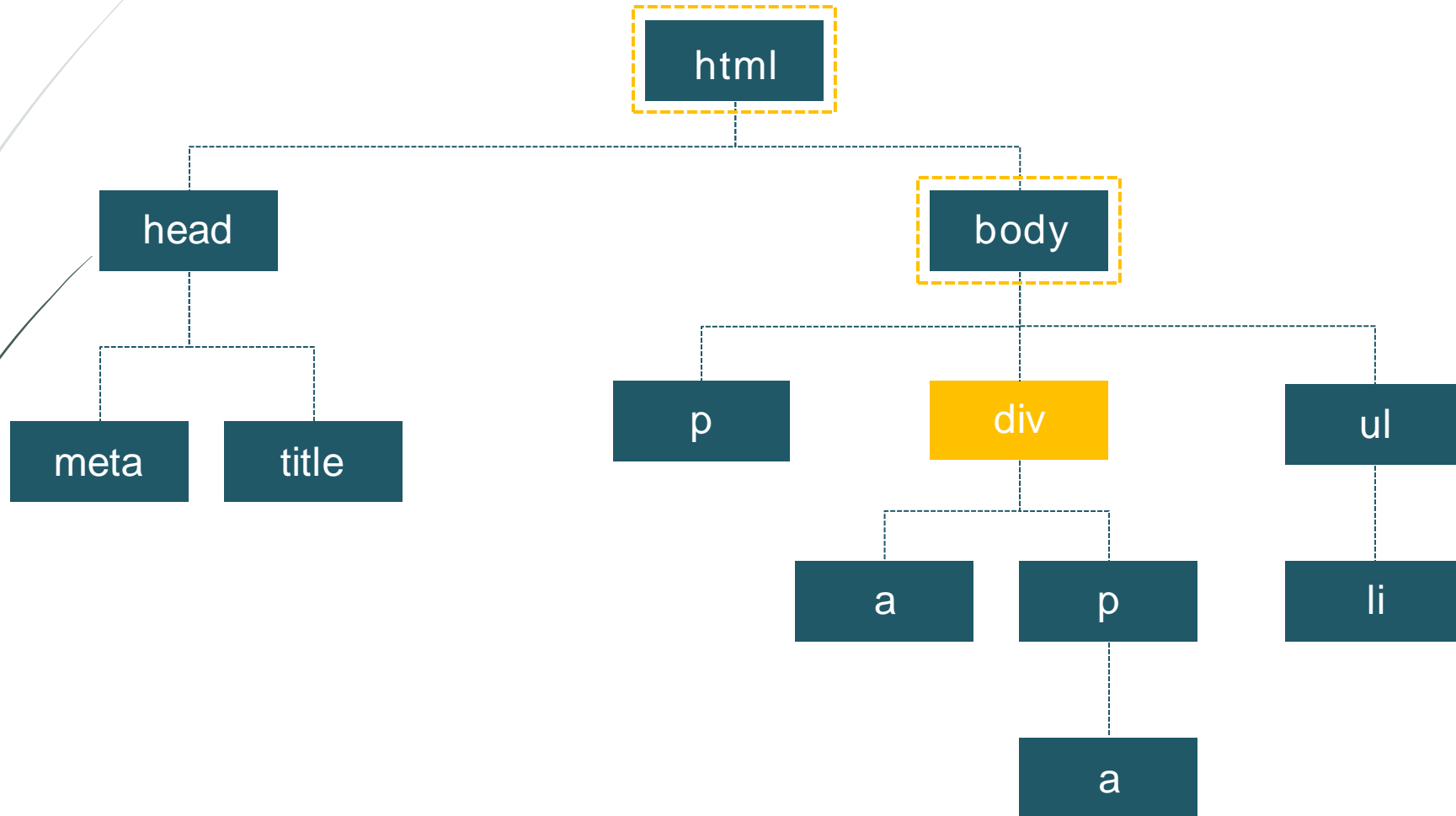
`$("div")`



# DOM Traversing

Find

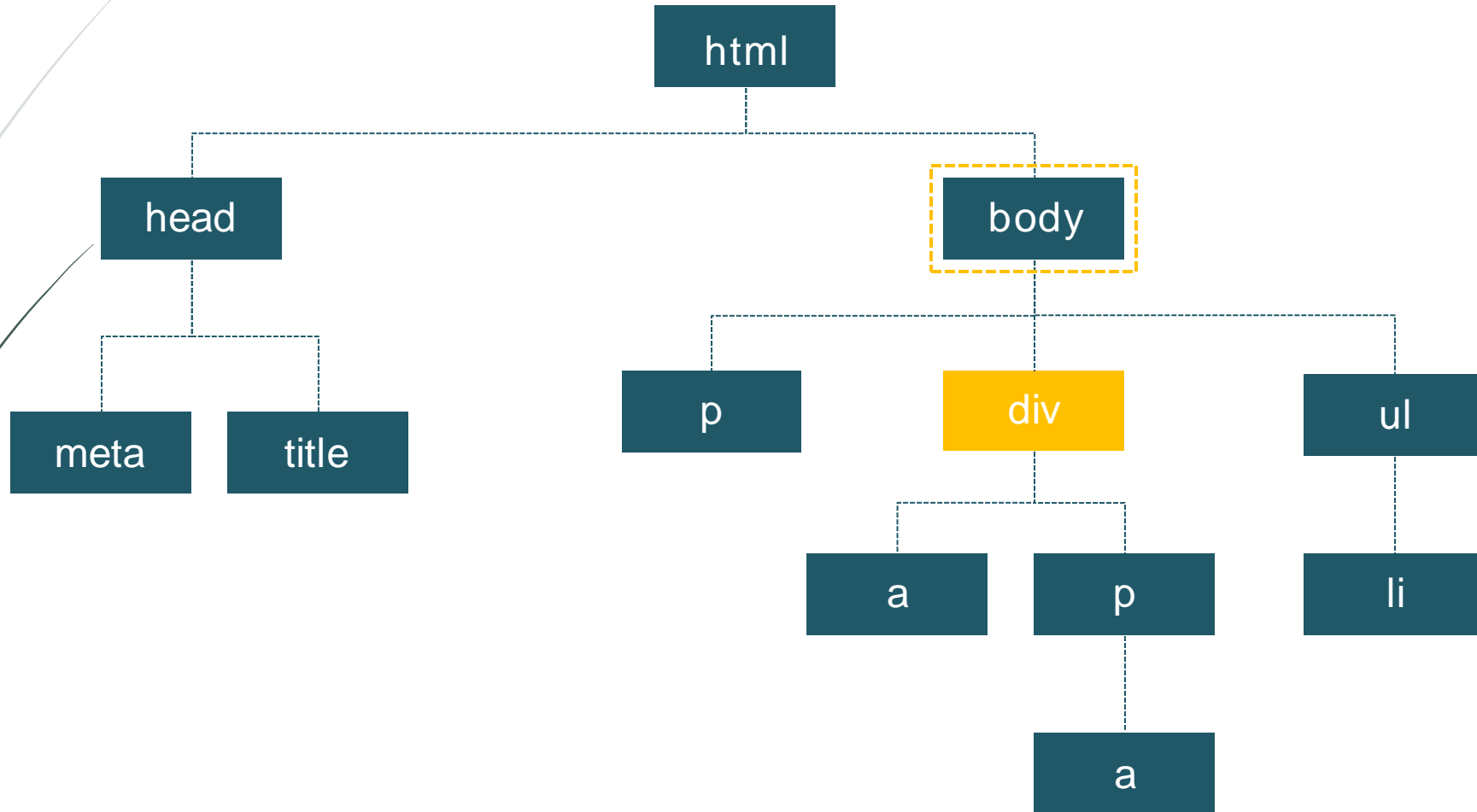
```
$("div").parents();
```



# DOM Traversing

Find

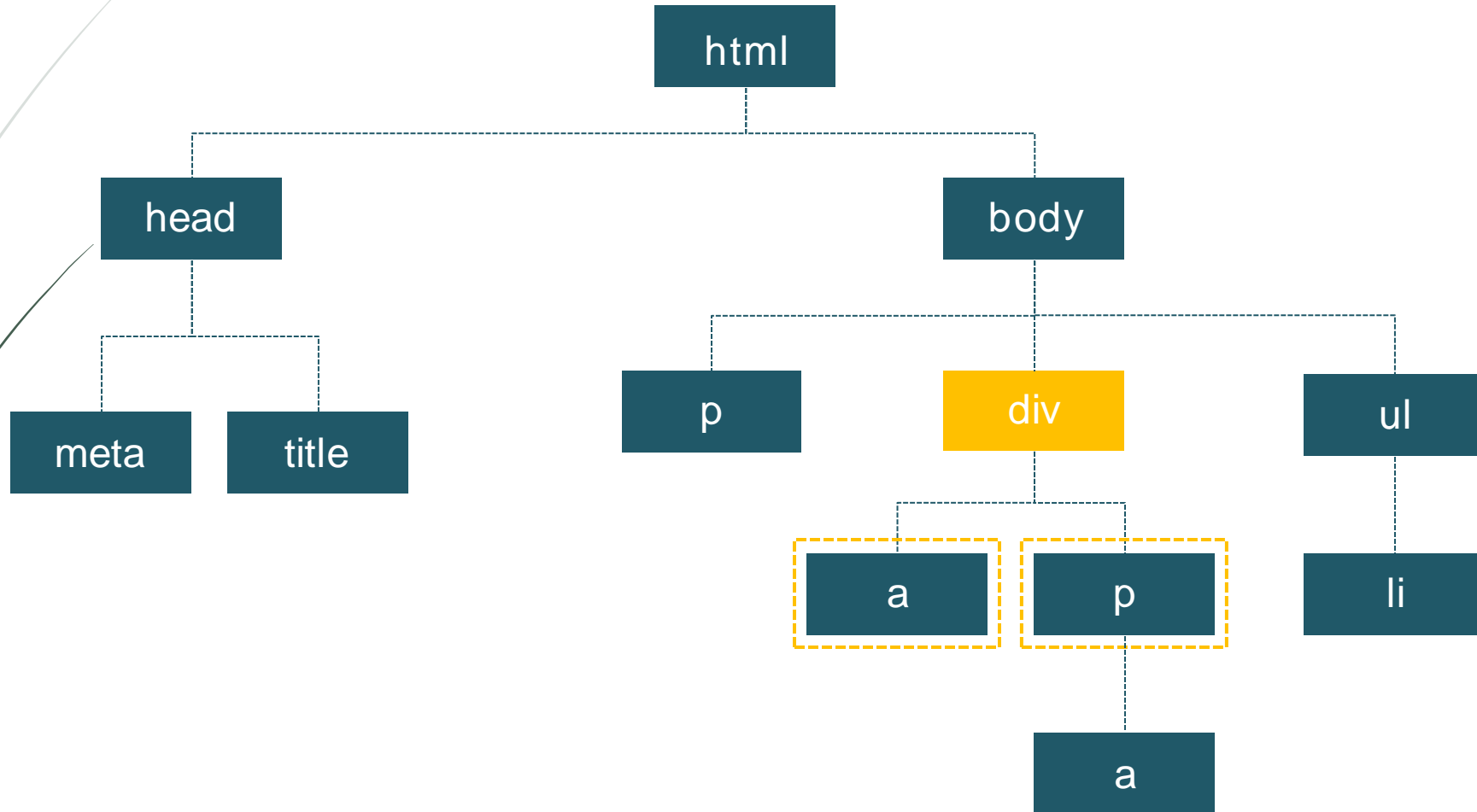
```
$("div").parent();
```



# DOM Traversing

Find

```
$("div").children();
```

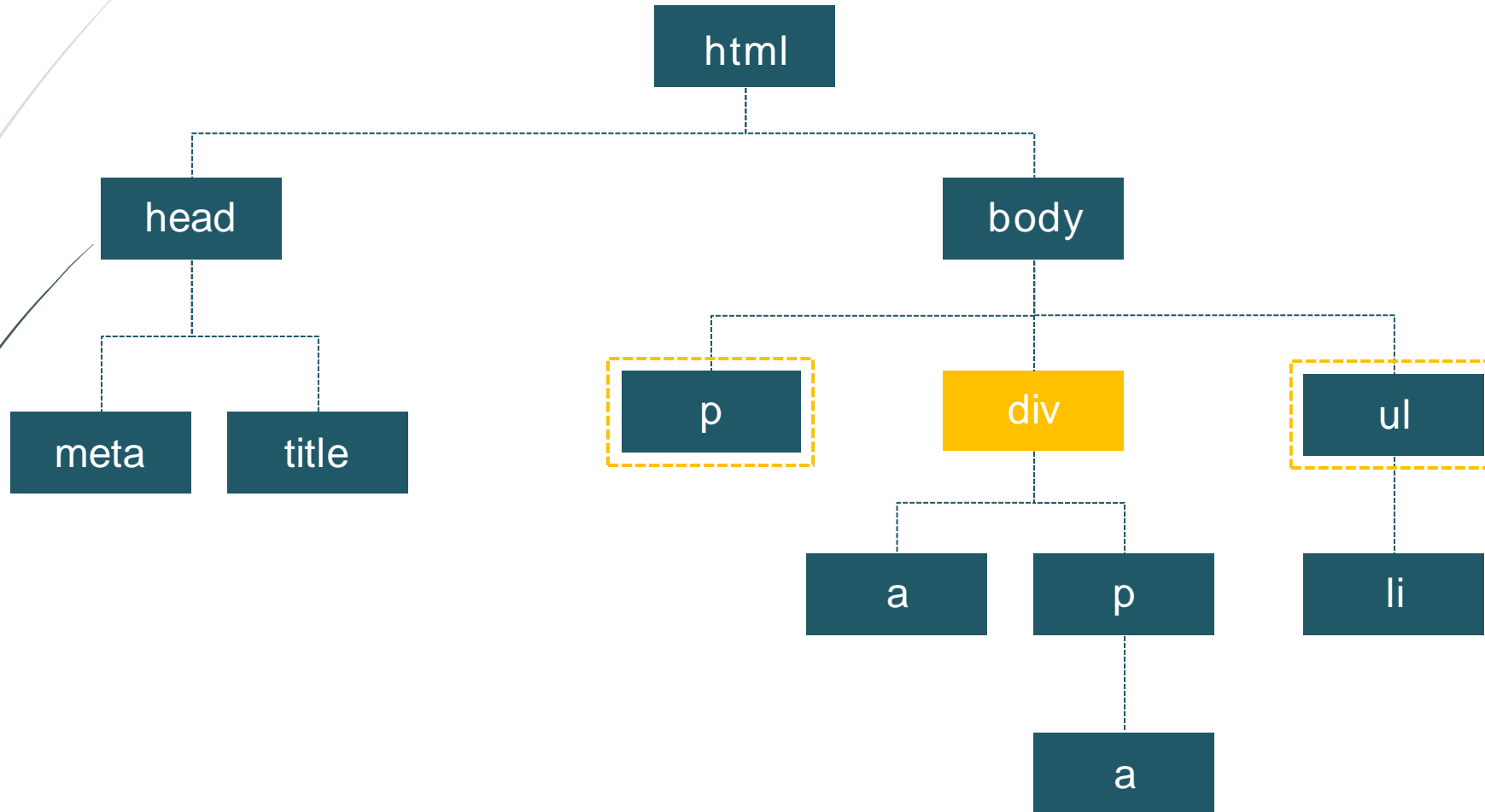




# DOM Traversing

Find

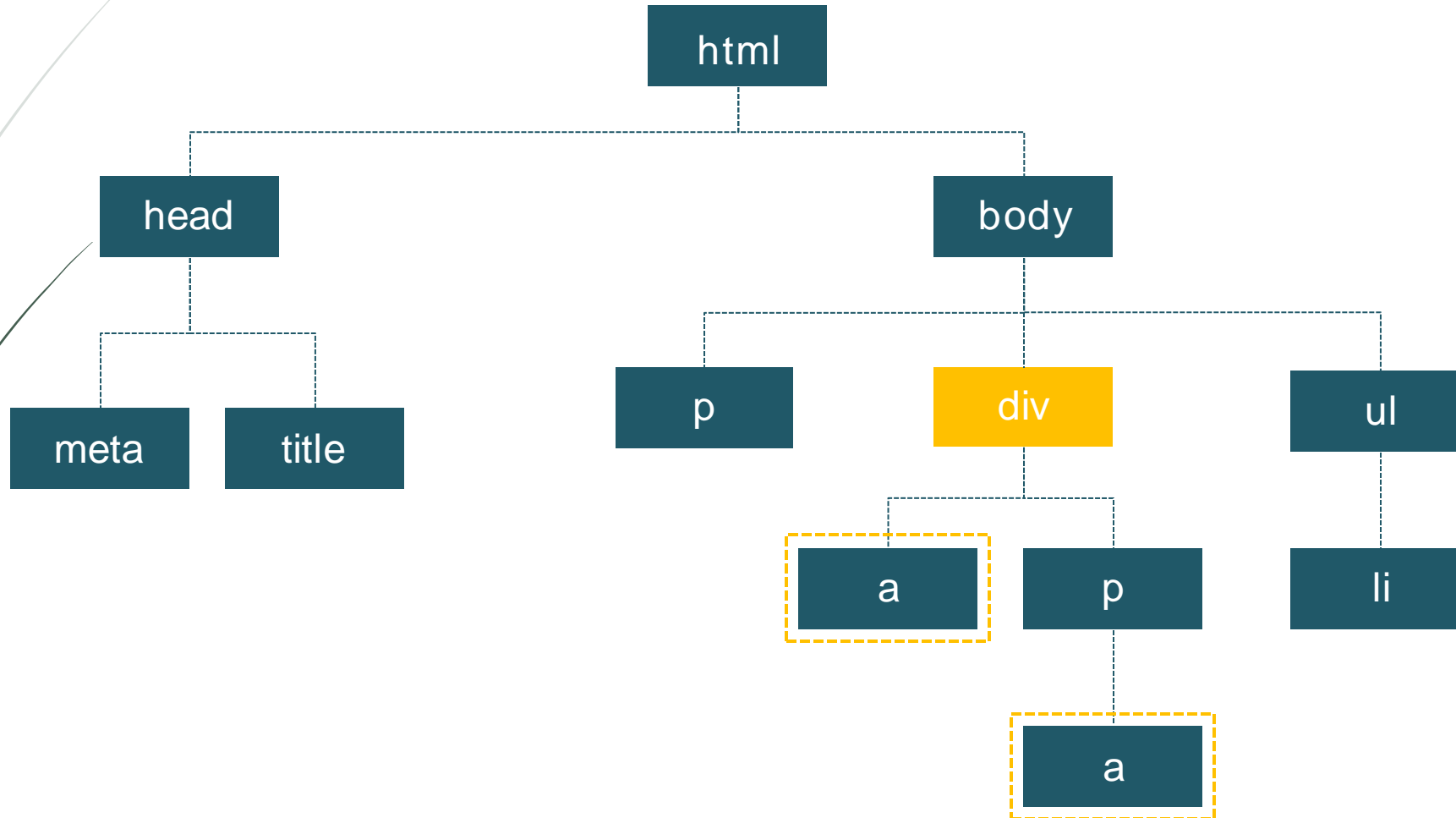
```
$("div").siblings();
```



# DOM Traversing

Find

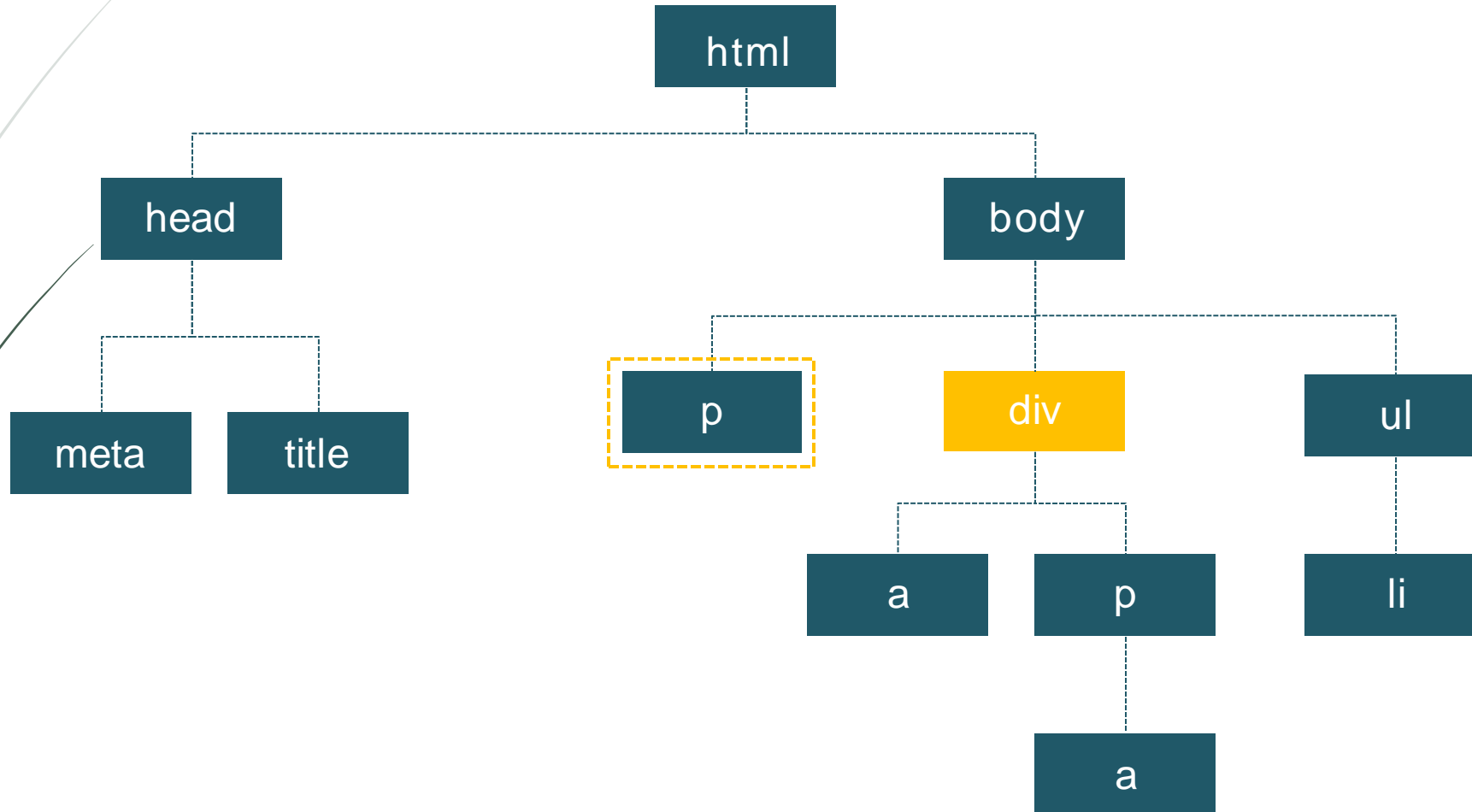
```
$("div").find("a");
```



# DOM Traversing

Find

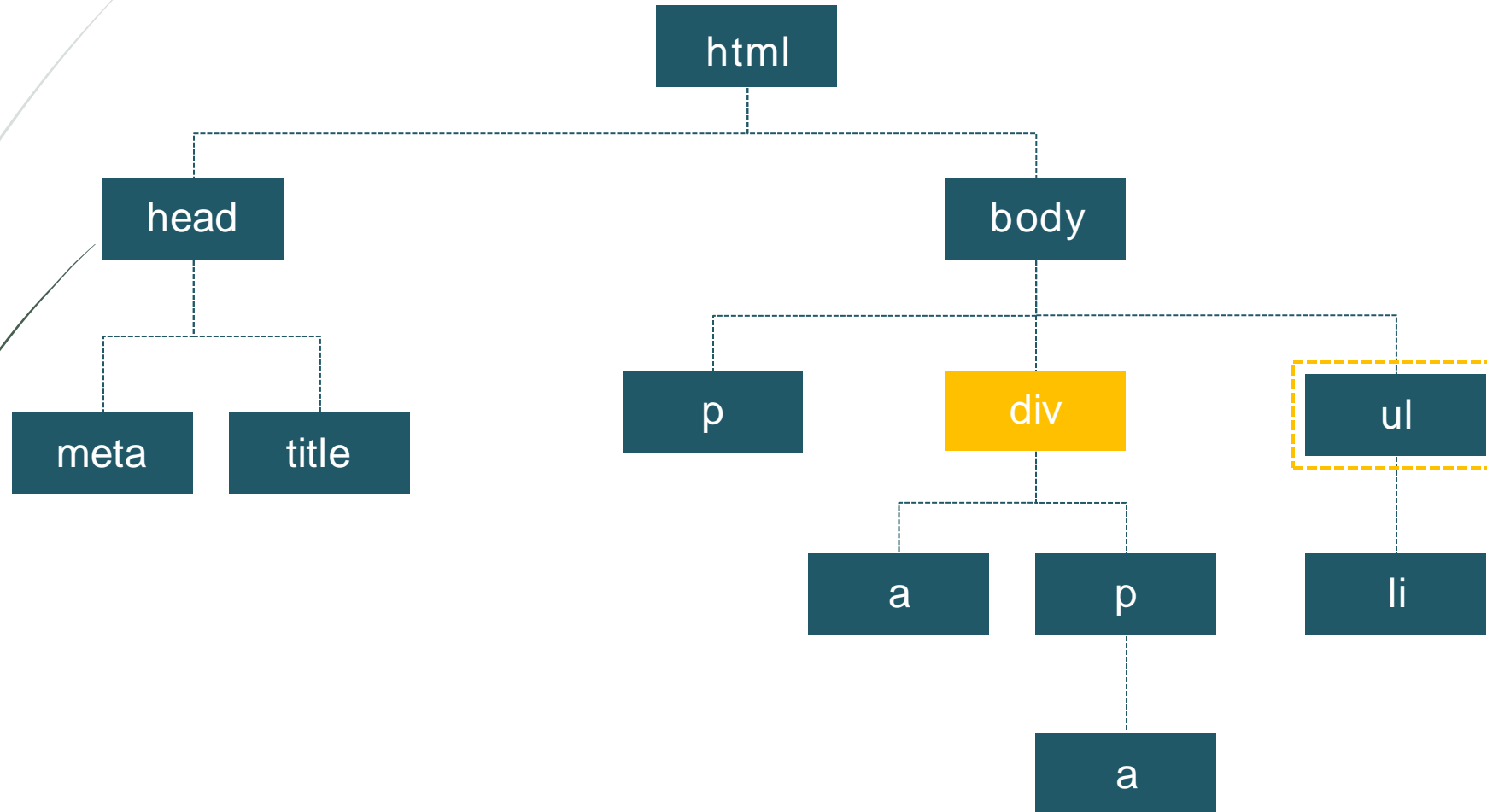
```
$("div").prev();
```



# DOM Traversing

Find

```
$("div").next();
```



# Do

Let's do some actions

# Appending Elements

Do

```
$(".inner").append("<p>append text</p>")
```

---

```
<div class="container">
```

```
  <div class="inner">
```

```
    <p> some text</p>
```

```
    <p> some text</p>
```

```
  </div>
```

```
</div>
```

# Appending Elements

Do

```
$(".inner").append("<p>append text</p>")
```

---

```
<div class="container">
```

```
  <div class="inner">
```

```
    <p> some text</p>
```

```
    <p> some text</p>
```

```
    <p> append Text</p>
```

```
  </div>
```

```
</div>
```

# Inserting Elements

Do

```
$(".inner").before("<p>before inner</p>")
```

---

```
<div class="container">
```

```
<div class="inner">
```

```
<p> some text</p>
```

```
<p> some text</p>
```

```
</div>
```

```
</div>
```



# Inserting Elements

Do

```
$ (".inner") .before("<p>before inner</p>")
```

---

```
<div class="container">
```

```
<p>before inner</p>
```

```
<div class="inner">
```

```
<p> some text</p>
```

```
<p> some text</p>
```

```
</div>
```

```
</div>
```

# Replacing Elements

Do

```
$("#np").replaceWith("<p>I'm the new one</p>")
```

---

```
<div class="container">
```

```
<p id="np">I warn you, Don't Replace Me </p>
```

```
</div>
```

# Replacing Elements

Do

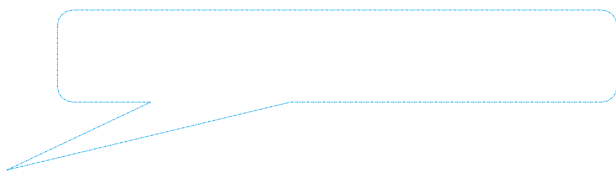
```
$("#np").replaceWith("<p>I'm the new one</p>")
```

---

```
<div class="container">
```

```
<p>I'm the new one</p>
```

```
</div>
```



# Wrapping Elements

Do

```
$("#par").wrap("<div class='umbrella'></div>")
```

---

```
<p id="par">It's so sunny today </p>
```

# Wrapping Elements

Do

```
$("#par").wrap("<div class='umbrella'></div>")
```

---

```
<div class="umbrella">
```

```
<p id="par">It's so sunny today </p>
```

```
</div>
```

# Wrapping Contents

Do

```
$ (".blanket") .wrapInner ("

>")


```

```
<div class="blanket">
```

```
I feel cold
```

```
</div>
```

# Wrapping Contents

Do

```
$ (".blanket") .wrapInner("<p>")
```

```
<div class="blanket">
```

```
<p>
```

I feel cold

```
</p>
```

```
</div>
```

# Changing CSS

Do

## 1 Modify one CSS property

```
$("div").css("color", "blue");
```

## 2 Modify Many CSS Properties

```
$("div").css({  
    "color": "blue",  
    "background": "red"  
});
```



# Getting Contents

## 1 GET HTML Content

```
$ ("div").html ();
```

## 2 GET Text Content

```
$ ("p").text ();
```

## 3 GET Input Value

```
$ ("input").val ();
```

# Setting Contents

Do

## 4 Set HTML Content

```
$ ("div").html("<p>some html</p>");
```

## 5 Set Text Content

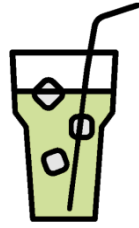
```
$ ("p").text("some text");
```

## 6 Set Input Value

```
$ ("input").val("Hello There!");
```

# Treating with Attributes

Do



## 1 GET Attribute Value of an Element

```
$("img").attr("src");
```

# Treating with Attributes

Do



## 1 GET Attribute Value of an Element

```
$("img").attr("src");
```

## 2 Set Attribute value

```
$("img").attr("src", "orange.png");
```

# Treating with Classes

Do

```
addClass ("my-cls")
```

```
$ ("div") .
```

```
<div class="my-cls">
```

```
</div>
```

# Treating with Classes

Do

```
$("#div").
```

```
addClass("my-cls")
```

```
removeClass("my-cls")
```

```
<div >
```

```
</div>
```

# Treating with Classes

Do

`$("div")` .

`addClass("my-cls")`

`removeClass("my-cls")`

`toggleClass("my-cls")`

```
<div class="my-cls">
```

```
</div>
```

# Treating with Classes

Do

`$("div")` .

`addClass("my-cls")`

`removeClass("my-cls")`

`toggleClass("my-cls")`

`toggleClass("my-cls")`

`<div >`

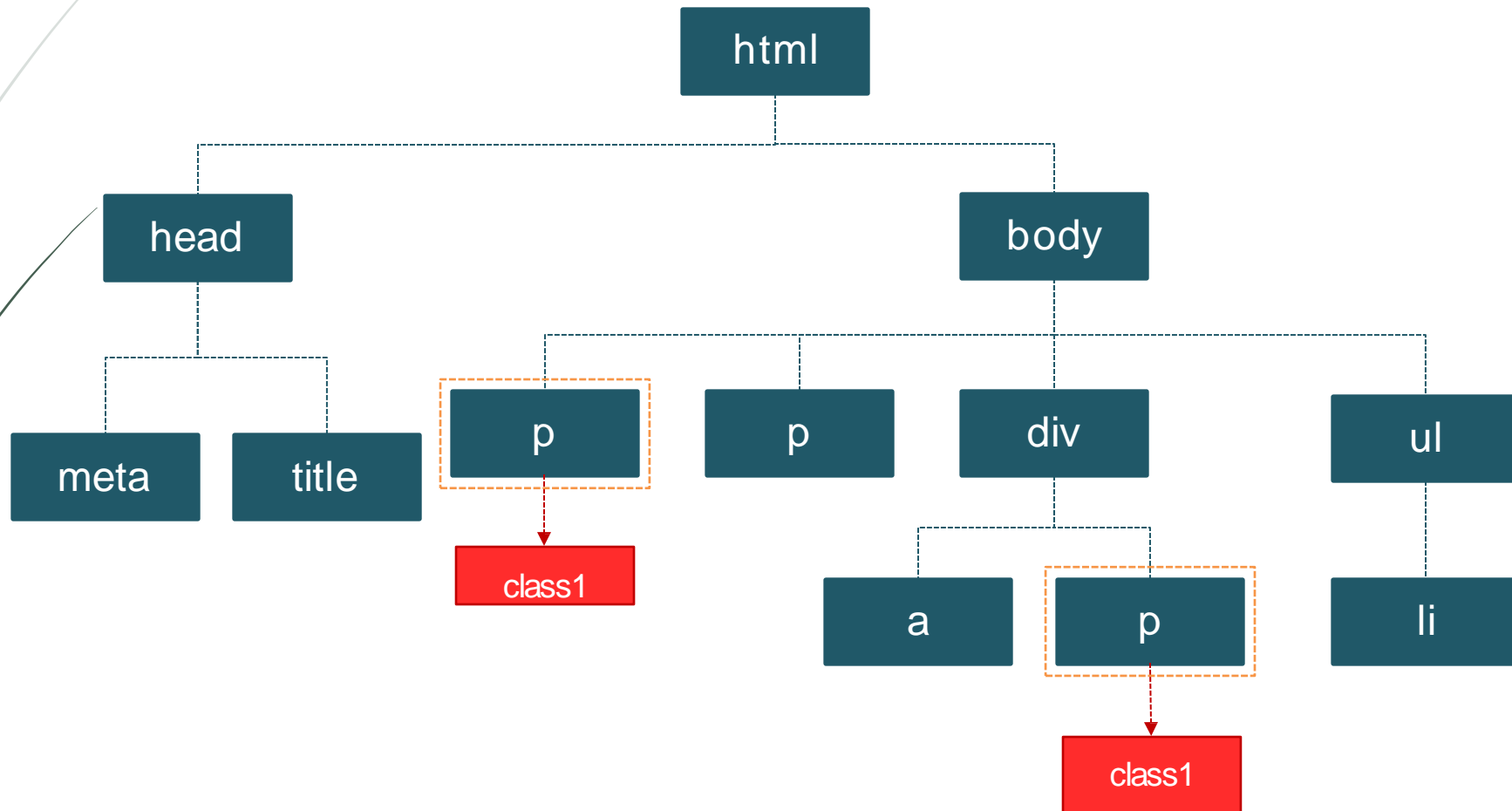
`</div>`



# Helper Methods

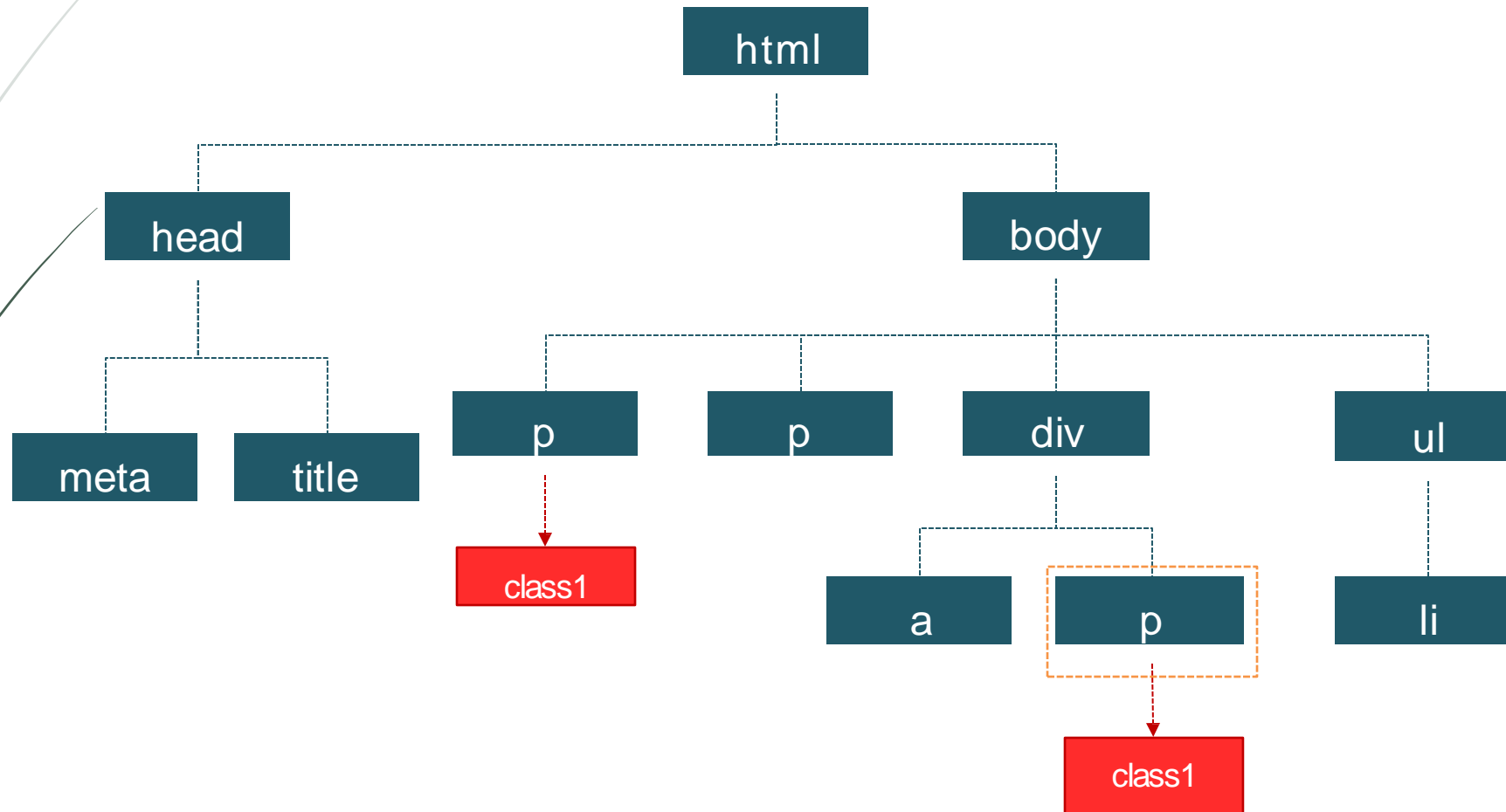
jQuery has many of them,  
let's explore some

```
$("p").filter('.class1');
```



## filter

```
$("p").filter($('div p.class1'));
```



## each



```
var colorArr = ['orange', 'red', 'blue', 'green'];
```

```
$('#p').each(function(index) {  
    $(this).css('background', colorArr[index]);  
});
```

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph

## each



```
var colorArr = ['orange', 'red', 'blue', 'green'];
```

```
$('#p').each(function(index) {  
    $(this).css('background', colorArr[index]);  
});
```

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph



```
var colorArr = ['orange', 'red', 'blue', 'green'];
```



```
$('#p').each(function(index) {  
    $(this).css('background', colorArr[index]);  
});
```



Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph



```
var colorArr = ['orange', 'red', 'blue', 'green'];
```

```
$( 'p' ).each( function( index ) {  
    $( this ).css( 'background', colorArr[ index ] );  
});
```



Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph

Hello, I'm paragraph