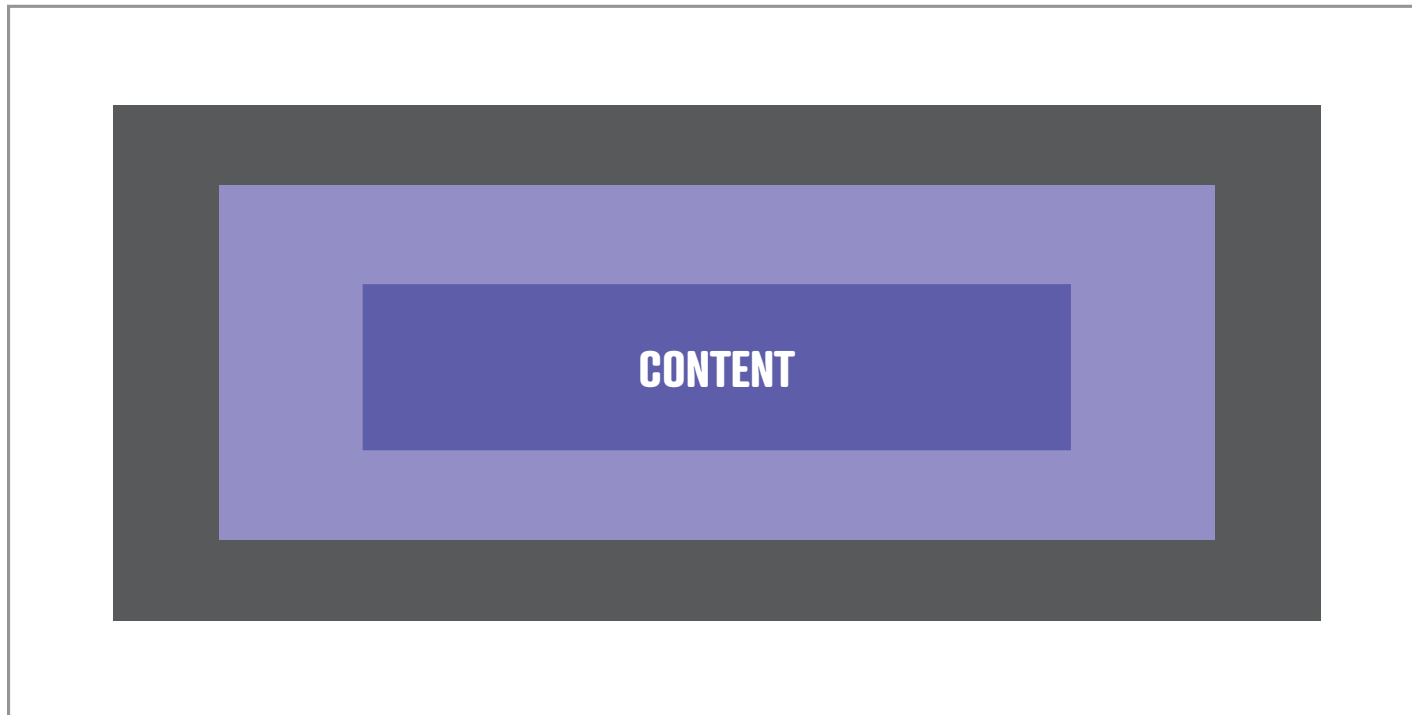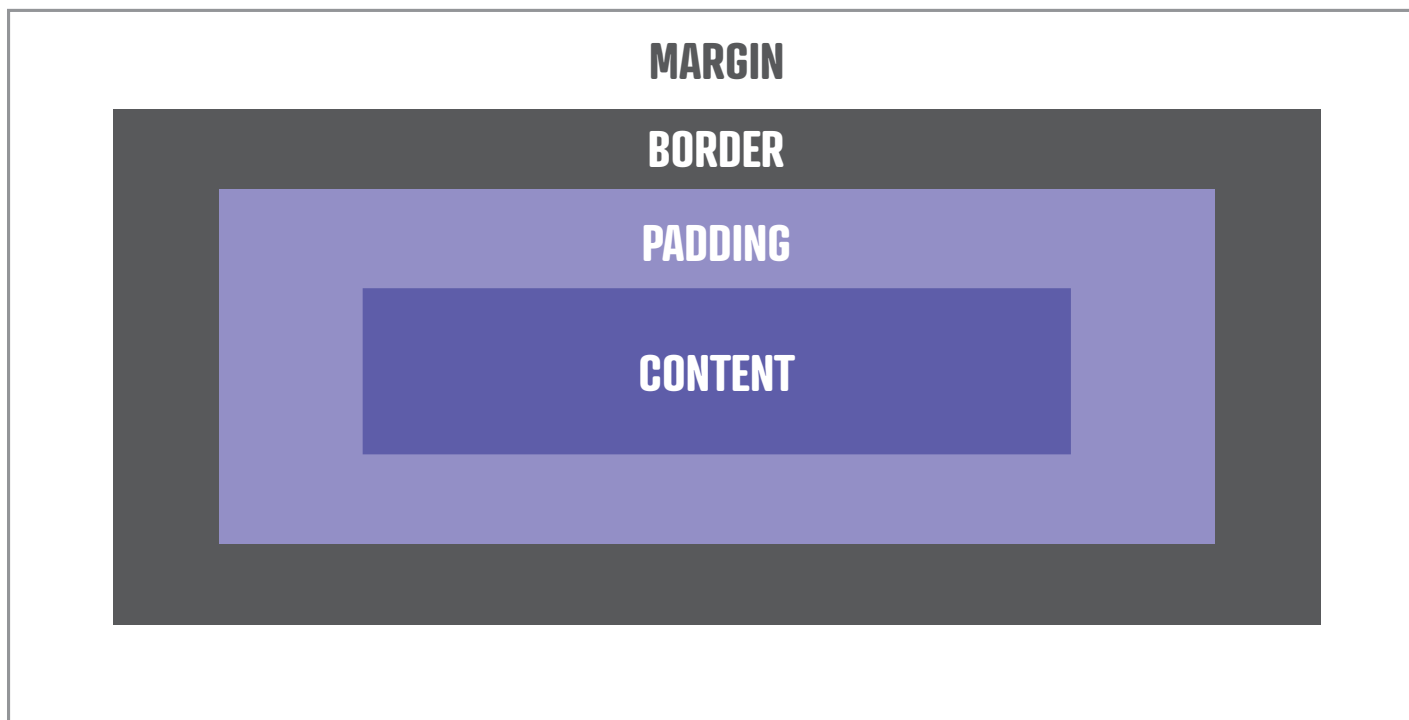# UNDERSTANDING
THE BOX MODEL

THE BOX MODEL

This is something that many people think they understand, but a lack of proper understanding of it causes so many problems.
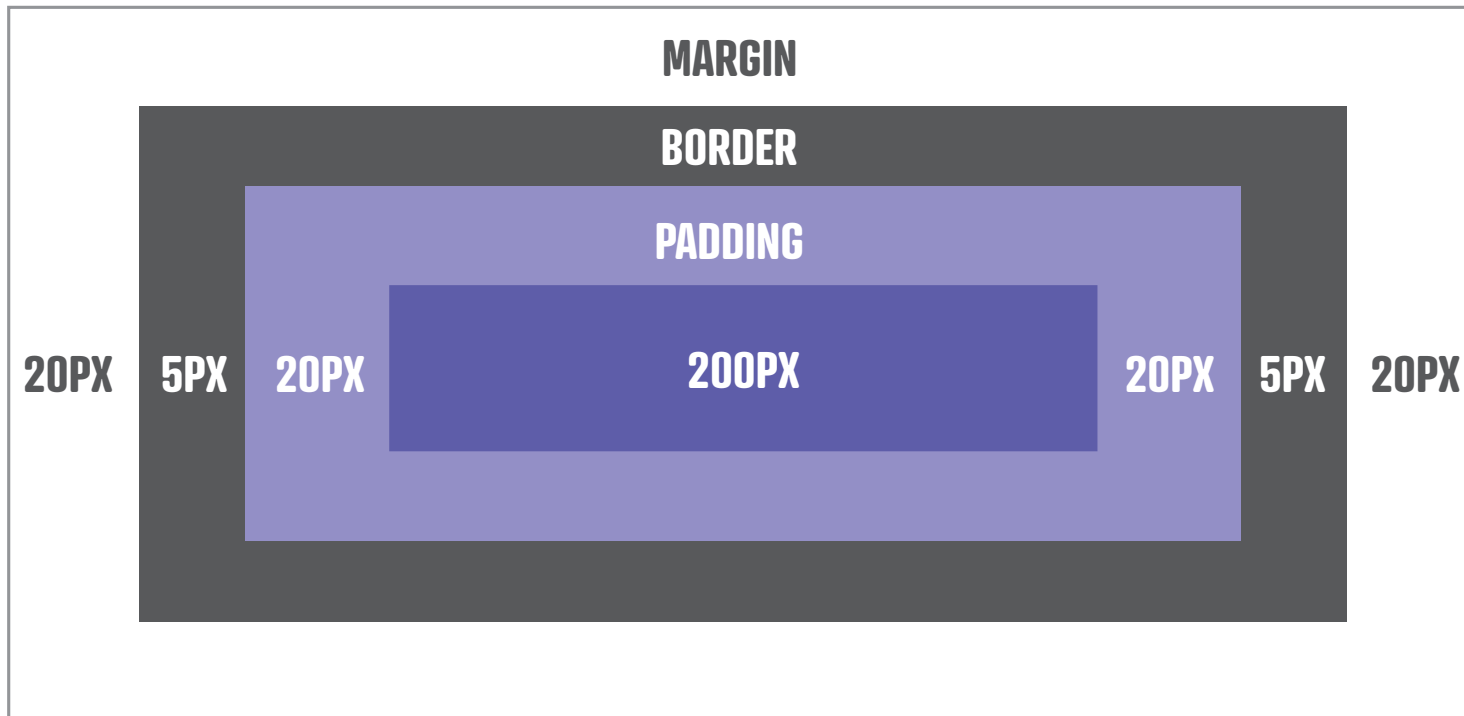
THE BOX MODEL

CONTENT

THE BOX MODEL

When we declare a `width` to an element, that width is setting the width of **the content**.

THE BOX MODEL

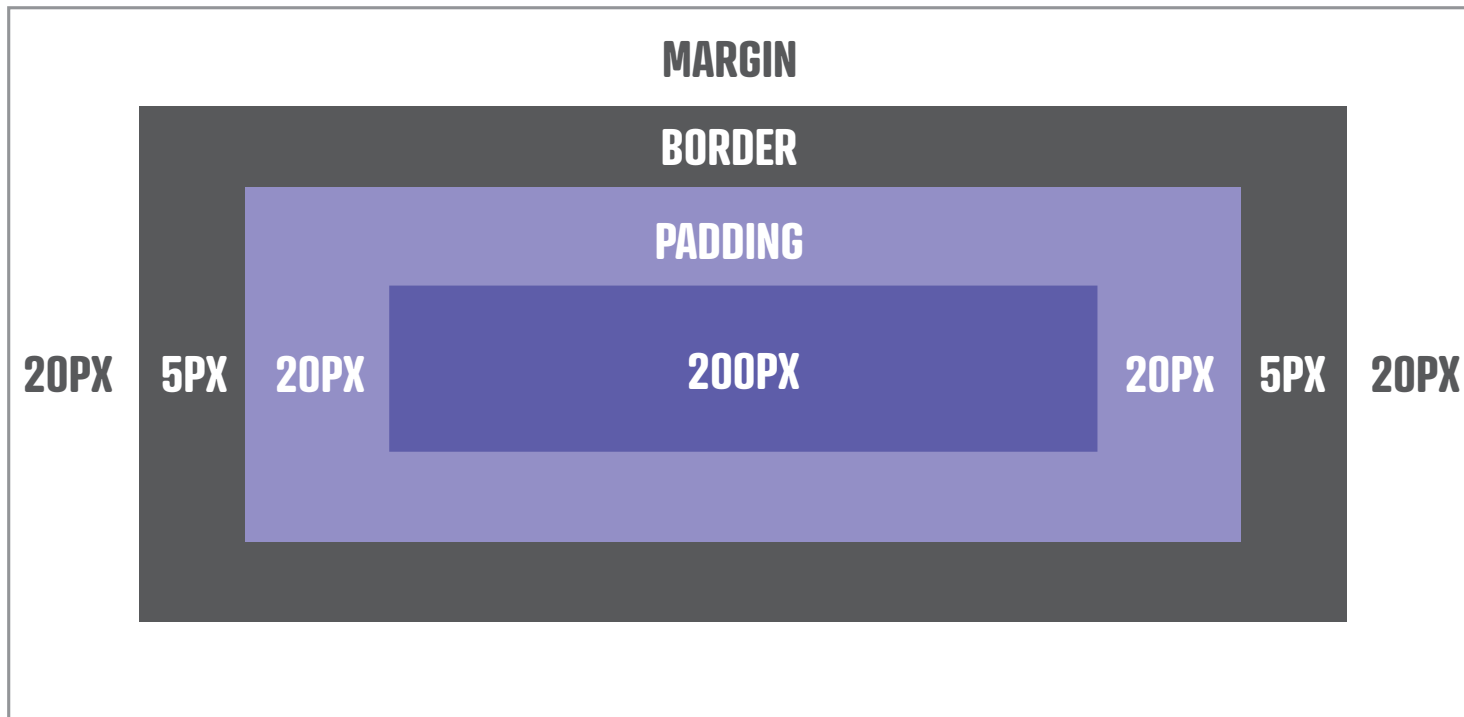20 + 5 + 20 + 200 + 20 + 5 + 20 = total width

MARGIN

BORDER

PADDING

| 20PX | 5PX | 20PX | 200PX | 20PX | 5PX | 20PX |

THE BOX MODEL

20 + 5 + 20 + 200 + 20 + 5 + 20 = 290px

MARGIN

BORDER

PADDING

20PX | 5PX | 20PX | 200PX | 20PX | 5PX | 20PX

THE BOX MODEL

So even though we've declared `width: 200px` we have an element with an actual width of 290px!

```css
.element {
  width: 200px;
  padding: 20px;
  border: 5px solid #820b35;
  margin: 20px;
}
```

box-sizing
TO THE RESCUE!

THE BOX MODEL

To help make our lives easier, it's very common to change the `box-sizing` of and element to `border-box` .

```
.element {
  box-sizing: border-box;
}
```

THE BOX MODEL

Now, when we declare a width (or height), the number we declare includes the **content**, but also includes the **padding** and **border**.

```css
.element {
  box-sizing: border-box;
}
```
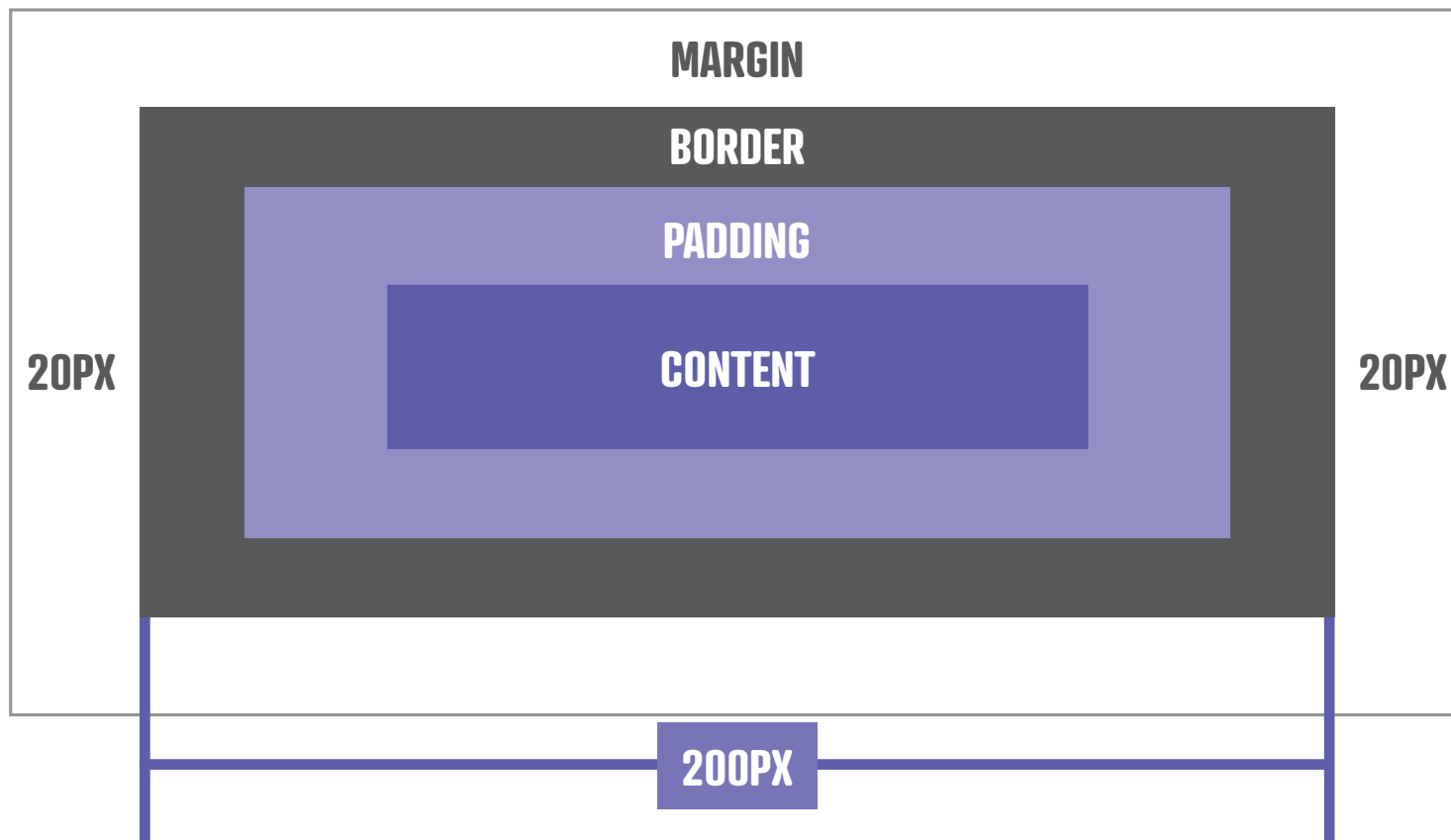
THE BOX MODEL

So let's say that we have the following:

```css
.element {
  box-sizing: border-box;

  width: 200px;
  padding: 20px;
  border: 5px solid #820b35;
  margin: 20px;
}
```

THE BOX MODEL

That would result in the following:

MARGIN

BORDER

PADDING

CONTENT

20PX

20PX

200PX

THE BOX MODEL

Some people ask why the `margin` isn't included in that `200px` since that would make it even easier.

THE BOX MODEL

`margin` is spacing between elements.

By only adding the `padding` and `border` to the total, our `width` and `height` now give us the total size of the visual parts of our element.

THE BOX MODEL

The fact that margin can impact another element is a big deal.

box-sizing
IN ACTION

```
* {
  box-sizing: border-box;
}
```

```
*,
*::before,
*::after {
  box-sizing: border-box;
}
```

THE BOX MODEL
INTRINSIC & EXTRINSIC SIZING

This is a bit out of scope for what I want to talk about right now, but if you'd like to know more, go check out the "bonus materials" section.