# Web Development

Produced
by

Eamonn de Leastar (edeleastar@wit.ie)

Department of Computing, Maths & Physics

Waterford Institute of Technology
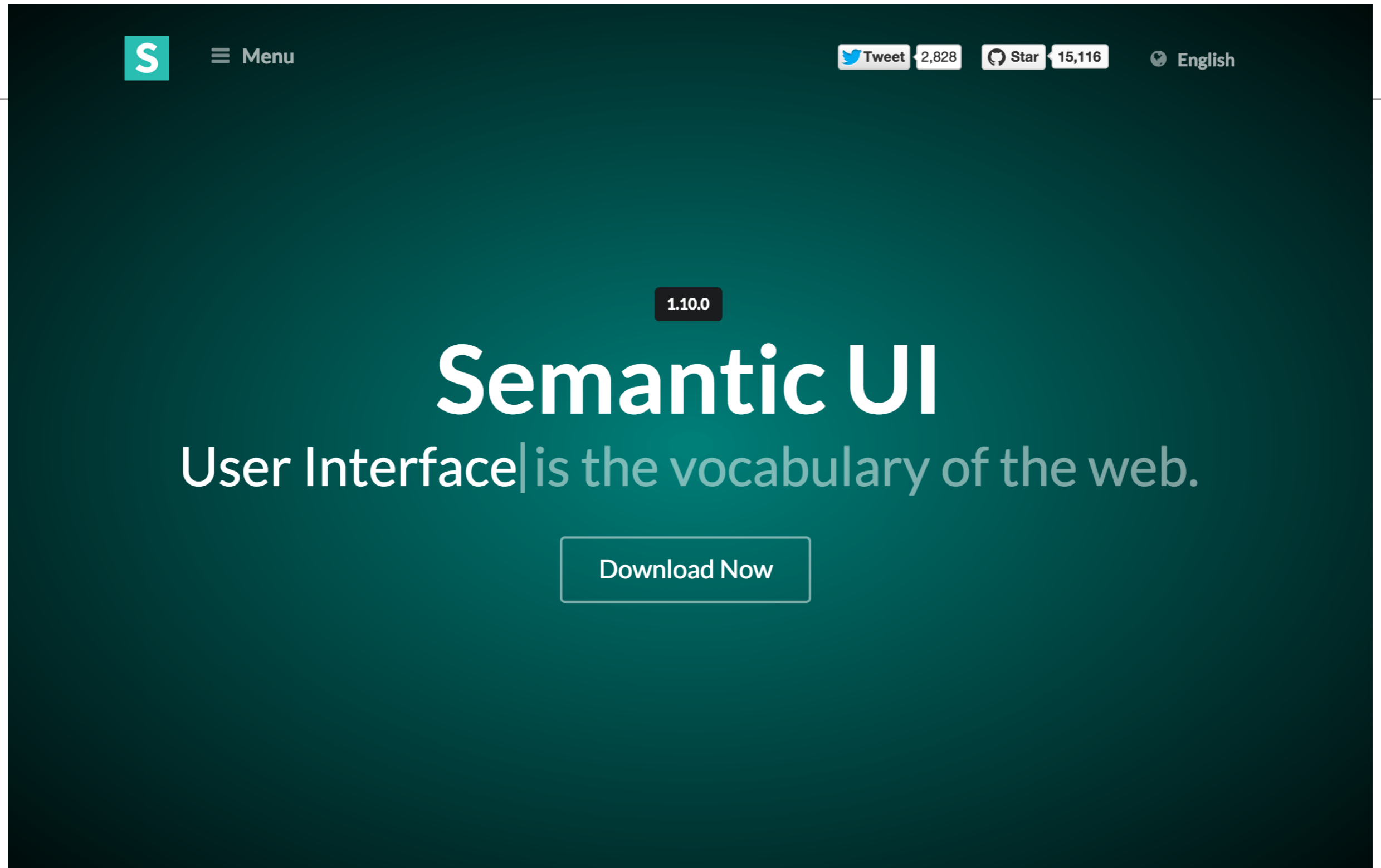
http://www.wit.ie

http://elearning.wit.ie

# Semantic UI

# Semantic UI

# Semantic UI Components

- **Elements:** The smallest useful homogenous unit for describing page content

- **Collections**: Heterogeneous group of several elements which are usually found together.

- **Views:** Ways of presenting common website content like comments, activity feeds, cards

- **Modules:**   Elements where behavior and design are both an essential part of its definition
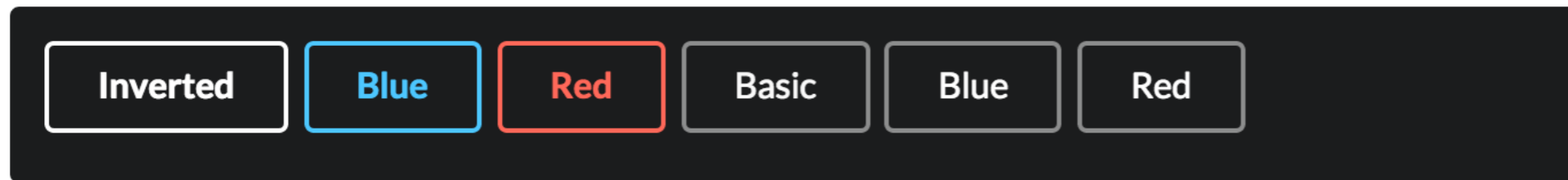
# Elements

- The smallest useful homogenous unit for describing page content



```html
<div class="ui button">
  View
</div>
<div class="ui primary button">
  <i class="shop icon"></i> Add to Cart
</div>
<div class="ui secondary button">
  <i class="save icon"></i>
   Save for Later
</div>
```
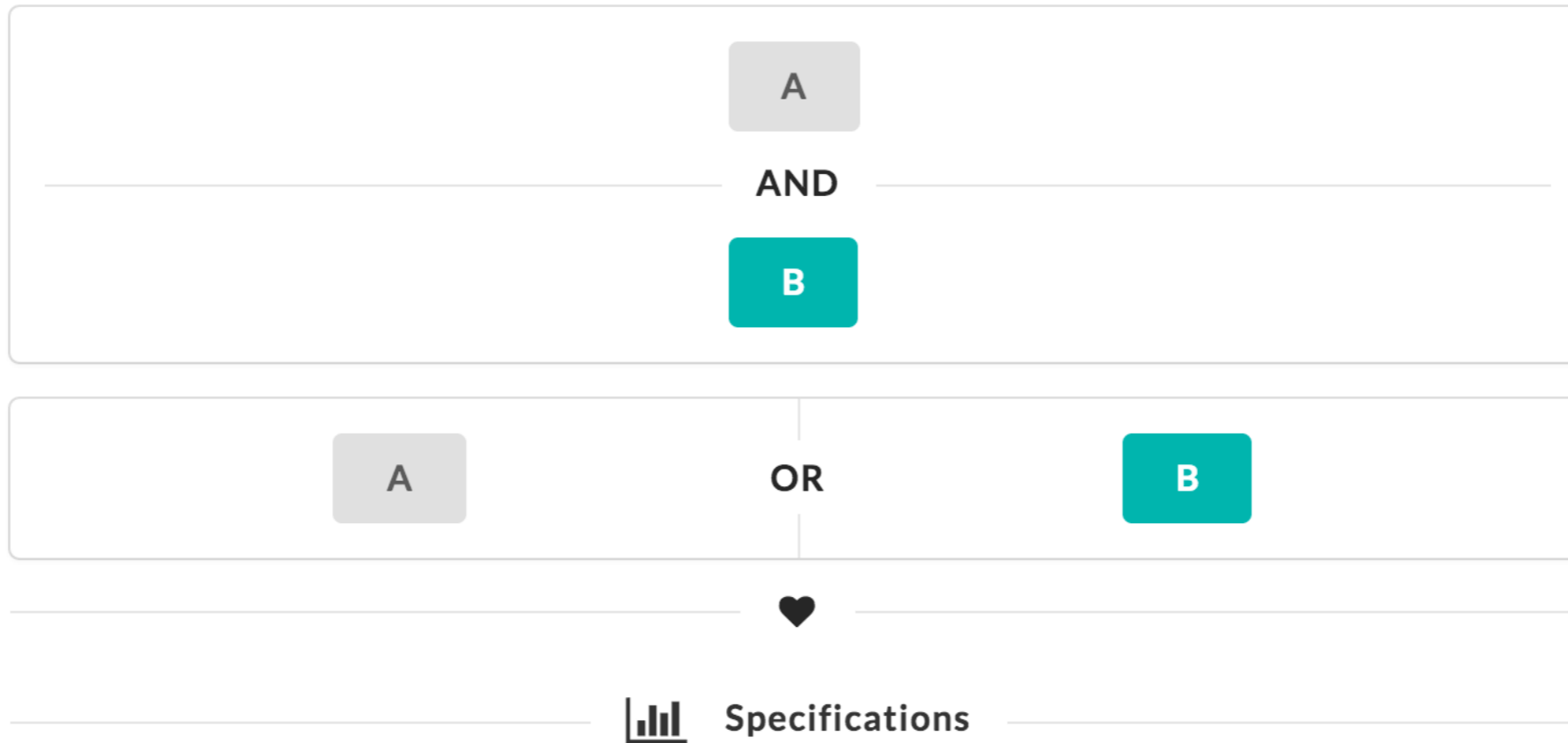
# Button

View **Add to Cart** **Save for Later** Rate Basic

Horizontal Vertical Fade In

**f Facebook** **Twitter** **8+ Google Plus**

1 2 3 Cancel *or* **Save**

**Blue** **Red** **Teal** Blue Red Teal

**Inverted** **Blue** **Red** Basic Blue Red

Feed

Messages

Events

Photos

1

2

3

```
<div class="ui vertical icon buttons">
<div class="ui button"><i class="align left icon"></i></div>
<div class="ui button"><i class="align center icon"></i></div>
<div class="ui button"><i class="align right icon"></i></div>
<div class="ui button"><i class="align justify icon"></i></div>
</div>
```

## Divider

A

**AND**

B

A **OR** B

♥

📊 **Specifications**

A

B

```html
<div class="ui inverted segment">
  <p>A</p>
  <div class="ui inverted divider"></div>
  <p>B</p>
</div>
```

# Header

```html
<div class="ui block header">
  <i class="settings icon"></i>
  <div class="content">
    Block
    <div class="sub header">Sub-header</div>
  </div>
</div>
```
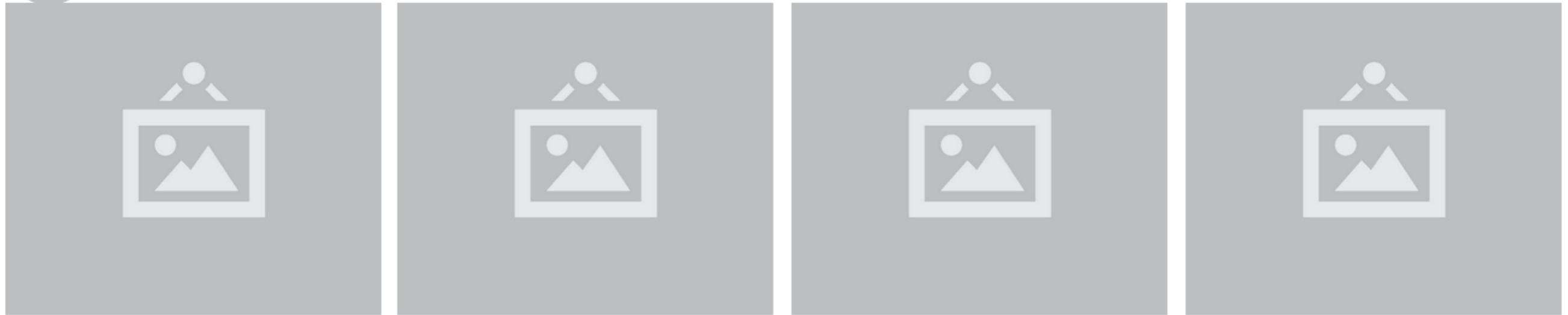
**Block**
Sub-header

**Dividing**
Sub-header

**Color**
Sub-header

### H3

#### H4

##### H5

**Attached**

**Attached**

**Icon Header**
Sub-header

**Header**
Sub-header

# Icon



```html
<i class="search icon"></i>
<i class="mail outline icon"></i>
<i class="external icon"></i>
<i class="wifi icon"></i>
<i class="setting icon"></i>
<i class="home icon"></i>
<i class="inbox icon"></i>
```

# Image

User Avatar

```html
<img class="ui avatar image" src="/images/wireframe/square-image.png">
<div class="ui small images">
  <img class="ui image" src="/images/wireframe/image.png">
  <img class="ui image" src="/images/wireframe/image.png">
  <img class="ui image" src="/images/wireframe/image.png">
  <img class="ui image" src="/images/wireframe/image.png">
</div>
<img class="ui small circular image" src="/images/wireframe/square-image.png">
```
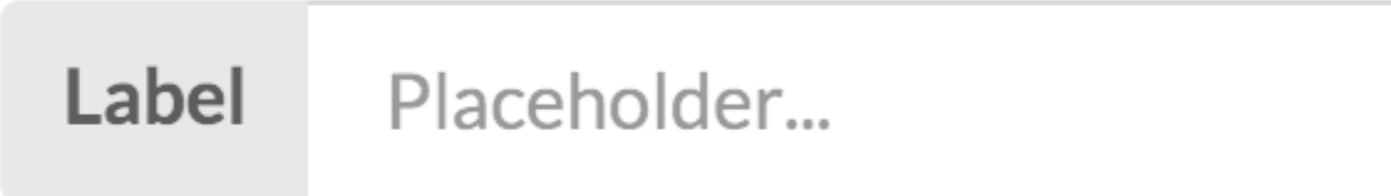
# Input



```html
<div class="ui action left icon input">
  <i class="search icon"></i>
  <input type="text" placeholder="Search...">
  <div class="ui teal button">Search</div>
</div>
```



http:// | domain.com | +

Label | Placeholder...

Placeholder... | Label

**Label**

email@address.com ✖  |  **Some Name** **Group**  |  ✉ Icon  ⬡ Tag  ● ● ●

First name

Pointing below label

Pointing Label

141

Item | Item

Top Labeled

Bottom Labeled

Top Left                    Top Right

Bottom Left                  Bottom Right

Ribbon

## List

**Header**
Description

> **Sub Header**
> Sub Description

> **Sub Header**
> Sub Description

**Header**
Description

> **Sub Header**
> Sub Description

> **Sub Header**
> Sub Description

★ **Header**
Description

★ **Header**
Description

★ **Header**
Description

**Header**
Description

**Header**
Description

**Header**
Description

**Header**
Description

**Header**
Description

**Header**
Description

- Link
- Link
- Link
- Link
- Link

Selection

Selection

Selection

Selection

Selection

- **Header**
Description
  - Sub-header
  - Sub-header
  - Sub-header
- **Header**
Description
- **Header**
Description

1   Getting Started

2   Introduction

3   Languages

   3.1   HTML

   3.2   Javascript

   3.3   CSS

4   Review

# Segment

# Step

| Step | Step |
|------|------|
| Description | Description |

| | |
|---|---|
| 1 | **Previous Step** <br> Description |
| 2 | **Active Step** <br> Description |
| 3 | **Disabled Step** <br> Description |

| | |
|---|---|
| ✔ | **Previous Step** <br> Description |
| 💳 | **Active Step** <br> Description |
| ℹ | **Disabled Step** <br> Description |

# Collections

- Heterogeneous group of several elements which are usually found together.

**Breadcrumb**

| Example |
| --- |

Home / Store / **T-Shirt**

```
<div class="ui large breadcrumb">
  <a class="section">Home</a>
  <div class="divider"> / </div>
  <a class="section">Store</a>
  <div class="divider"> / </div>
  <div class="active section">T-Shirt</div>
</div>
```

# Form

**Selection Dropdown**

Select ▼

**HTML Select**

Select ⬍

**Text Area**

**Required Input** *   **Required Input** *   Disabled

Text Input | Text Input | Text I

**Radio Selection**

○ Radio Option
○ Radio Option
○ Radio Option
○ Radio Option

**Password**

🔒

☐ Checkbox

**Inline Radio Selection**   ○ Radio Option   ○ Radio Option   ○ Radio O
○ Radio Option

**Multiple Inline Fields**   (xxx)   xxx

xxxx

**Inline Field**   Text Input

**Sub-header**

○ Toggle

○ — Option

Submit

## Warning Message

- Problem #1
- Problem #2

**Input**

Text Input

**Input**

Text Input

Submit

## Error Message

Error message long description

**Errored Input**

Text Input

**Errored Input**

Text Input

Submit
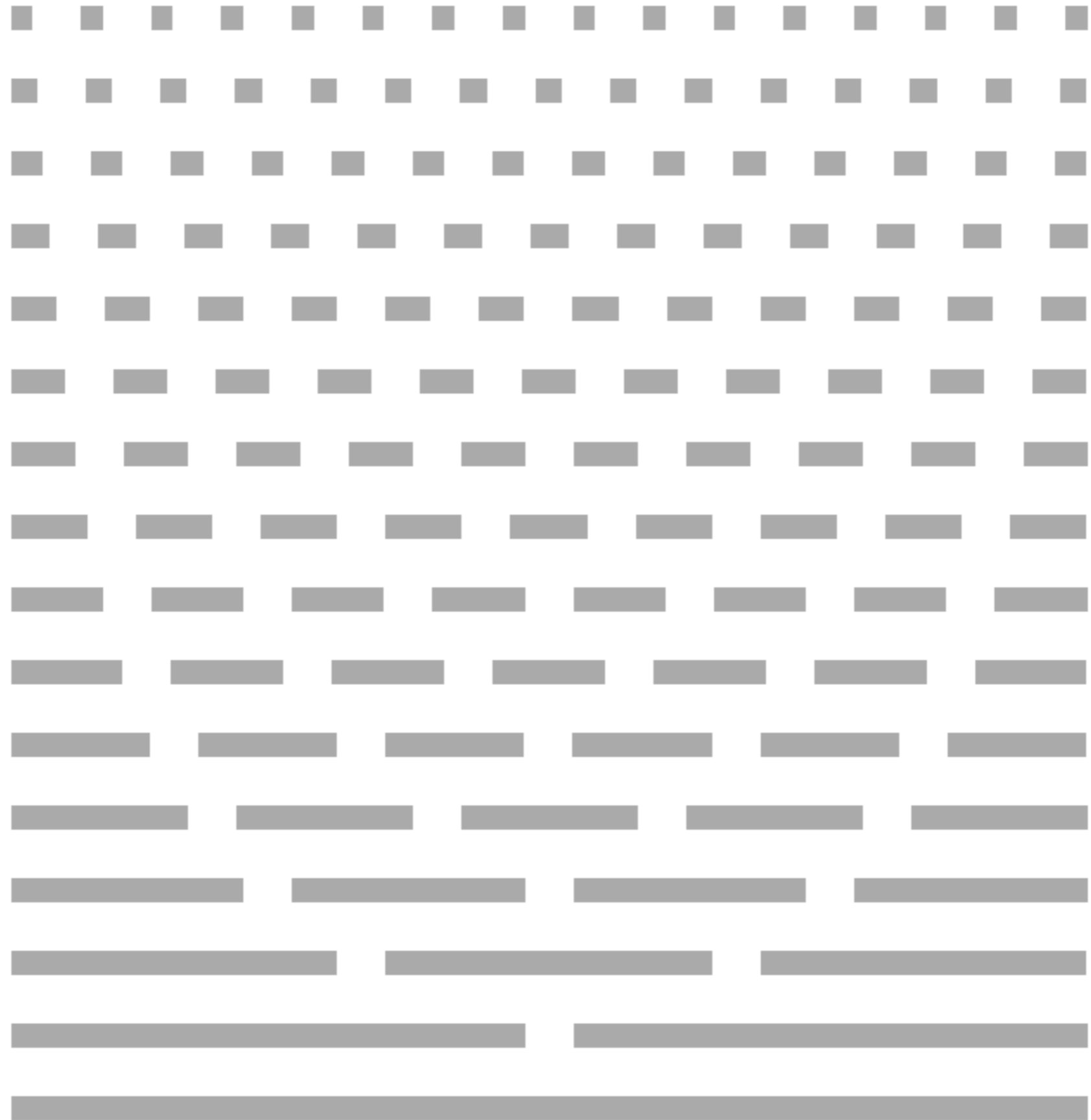
# Menu

<>

| A | B | C |
|---|---|---|

| | |
|---|---|
| A | |
| B | 1 |
| Search... | 🔍 |

**Tab**  Tab

A    B    C

A    B    C

| A | B | C |
|---|---|---|

| A |
|---|
| B |
| C |

A

B

C

# Message

Closable message ✖

## Warning Message

- List item
- List item

## List Message

- List item 1
- List item 2
- List item 3

## Info Message

Example description

## Positive Message

Example description

## Negative Message

Example description

Top attached

Bottom attached

## Table

| Files | | |
|---|---|---|
| 📁 folder | Comment | 10 hours ago |
| 📁 folder2 | Comment | 10 hours ago |
| 📁 folder3 | Comment | 10 hours ago |
| 📄 package.json | Comment | 10 hours ago |
| 📄 Gruntfile.js | Comment | 10 hours ago |

| | Header 1 | Header 2 |
|---|---|---|
| Definition | 1A | 1B |
| Definition | 2A | 2B |

| | Name | Registration Date | E-mail address | Premium Plan |
|---|---|---|---|---|
| ⦿ | | | | |
| ⦿ | | | | |
| ⦿ | | | | |
| | Button    Disabled | | | 👤 Primary |

| Name | Status | Notes |
|------|--------|-------|
| User 1 | Value | Comment |
| User 1 | Selected | Data |
| User 1 | Value | Comment |
| User 2 | Value | Data |
| User 1 | Value | ! Warning |
| User 3 | Value | Data |
| User 1 | Value | ✖ Positive |
| User 2 | ! Warning | Data |
| User 2 | ✔ Positive | Data |
| User 2 | Value | Data |

| Name | Status | Notes |
|------|--------|-------|
| User 1 | Data | Data |
| User 3 | Data | Data |
| User 2 | Denied | Data |
| Footer | Footer | |

# Views

- **Views:** Ways of presenting common website content like comments, activity feeds, cards

**Card**



Title
Meta
One or two sentence description that may go to several lines

Arbitrary                    Arbitrary



**Abbreviated Header**

Short Description

Action 1                    Action 2
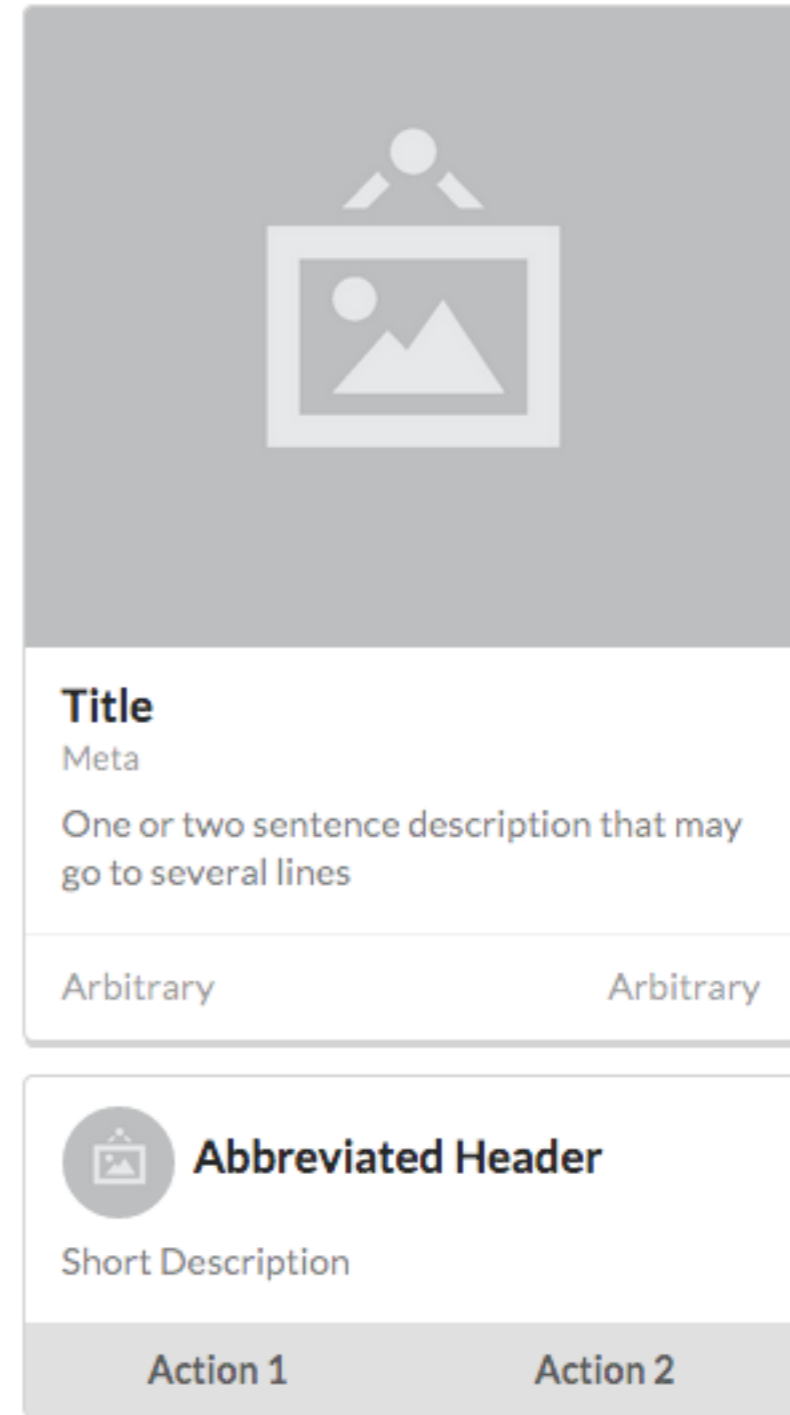
# Feed

**Username** added you as a friend

You added Username to the group **Group Name**

Time period ago
**Userrname** added **new photos**



♥ 1 Like

✏ **You wrote something** Time period ago

> Blockquote

Metadata    Metadata

📷 **You uploaded a photo** Time period ago

Metadata    Metadata

**Elliot Fu** added **Jenny Hess** as a friend

**Stevie Feliciano** added **Elliot Fu** as a friend

**Helen Troy** added **Christian Rocha** as a friend

**Christian Rocha** signed up for the site.

## Item

### Content Header
Date  Category

A description which may flow for several lines and give context to the content.

Username

---

### Content Header
Date  Category

A description which may flow for several lines and give context to the content.

Limited

**Primary** >

---

### Content Header
Date  Category

A description which may flow for several lines and give context to the content.

**Primary** >

---

### Content Header

A description which may flow for several lines and give context to the content.

---

### Content Header

A description which may flow for several lines and give context to the content.

---

### Content Header

A description which may flow for several lines and give context to the content.

## Statistic

Top Label

# 4:05

# 22

Bottom Label

# EIGHTY TWO

Text

5

Labeled Icon

22 Horizonal Label

51 Horizonal Label

81 Horizonal Label

# Modules

- **Modules:** Elements where behavior and design are both an essential part of its definition

## Checkbox

<>

☐ Checkbox

◉ A  ◯ B  ◯ C  ◯ D

◯━━ Slider

◯ Toggle

## Dimmer

<>

**Dimmable Section**

# Dropdown

| Select Language | Select Country ▼ |

| 🇦🇩 Andorra |
| 🇦🇪 U.A.E |
| 🇦🇫 Afghanistan |
| 🇦🇬 Antigua |
| 🇦🇮 Anguilla |
| 🇦🇱 Albania |

| Filter Posts |

Show me posts trending **today**

⚙️

| Home | Shopping ▼ | Forums | Contact Us |

Home

Messages ▶

Browse

Help

👤 👥 ⚙️

# Modal

Standard Modal | Basic Modal | Full-Screen Modal

## Profile Picture



### We've auto-chosen a profile image for you.

We've grabbed the following image from the **gravatar** image associated with your registered e-mail address.

Is it okay to use this photo?

Nope | Yep, that's me ✔

# Popup

**User Rating**
⭐⭐⭐☆☆

| Fluid Popup | HTML Content | Basic Popup | Small |

| Large | Inverted |

| Link | Popup Link ▼ | |

# Progress
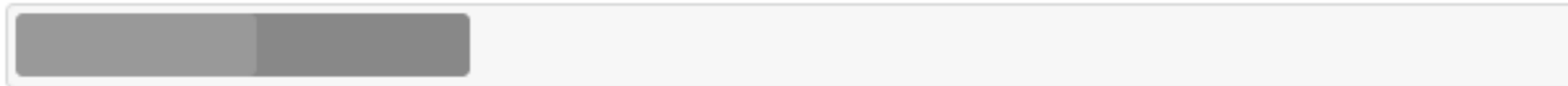
**29% Complete**

**70% Done**
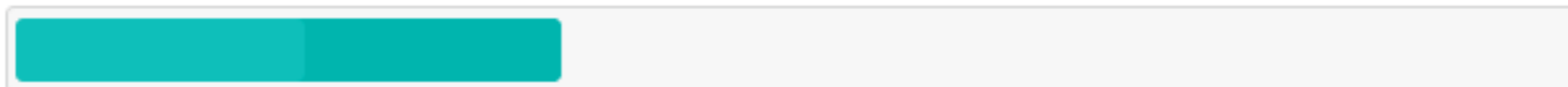
Uploading 8 of 20

## Rating

★★☆☆☆  Choice #1

★★★☆  Choice #2

★★★★  Choice #3

### Content Header

A description which may flow for several lines and give context to the content.

11 ♥

### Content Header

A description which may flow for several lines and give context to the content.

42 ♥

### Content Header

A description which may flow for several lines and give context to the content.

16 ♥

## Search

Remote search...

Category search...

Local search...

## Shape



1
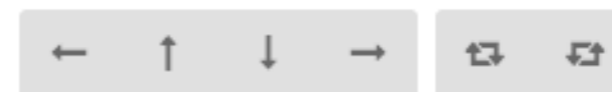
Did you know? This side starts visible.

# Tab

First    Second    Third

**1A**    1B    1C

1A

# Transition

Flash  Shake  Pulse  Tada  Bounce  Drop  Browse

Horizontal Flip  Vertical Flip  Fade  Fade Up  Fade Down
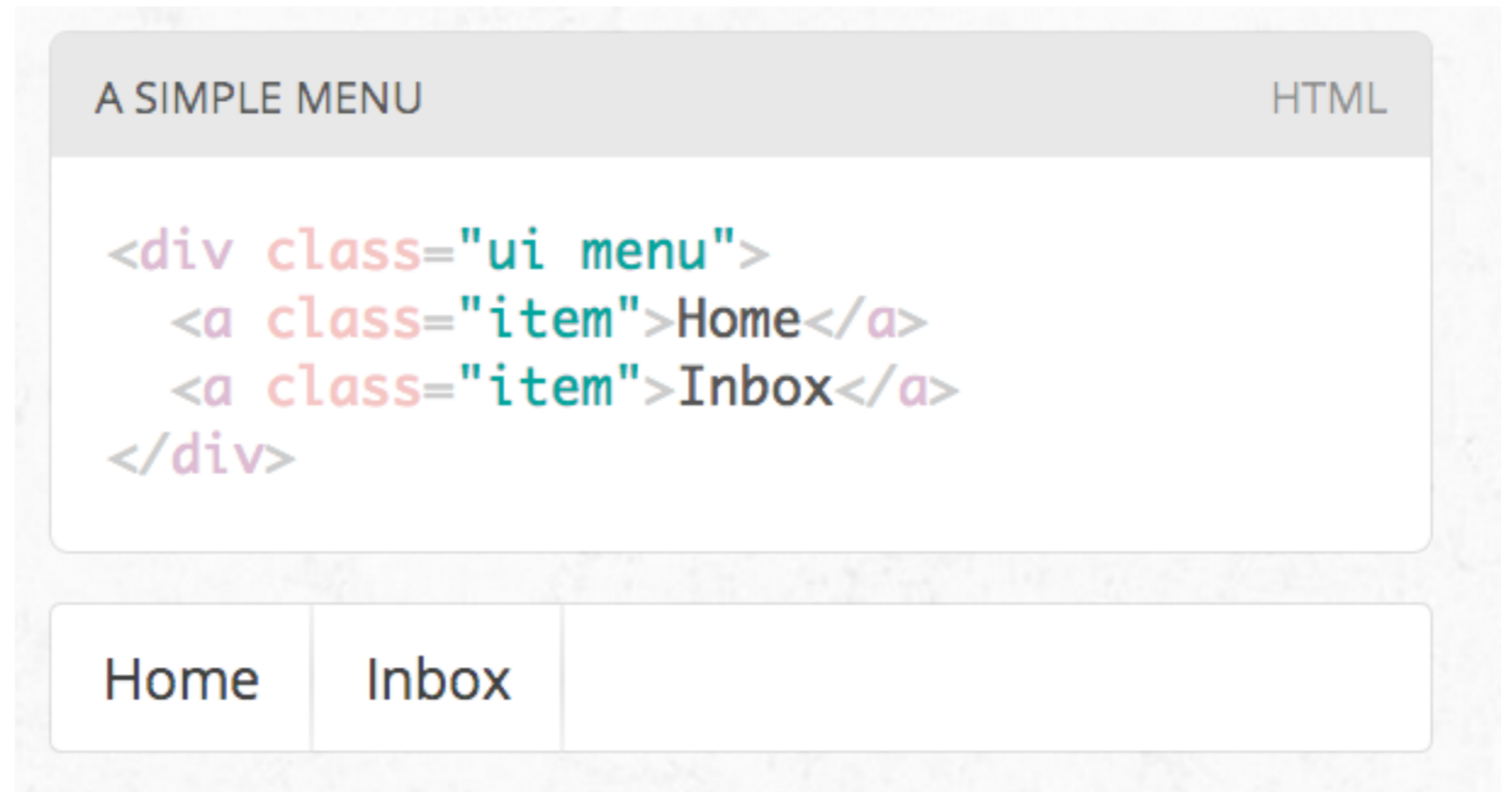
Scale  Slide Down  Slide Up

# Interfacing Carefully

- UI definitions in Semantic are given the class name ui.
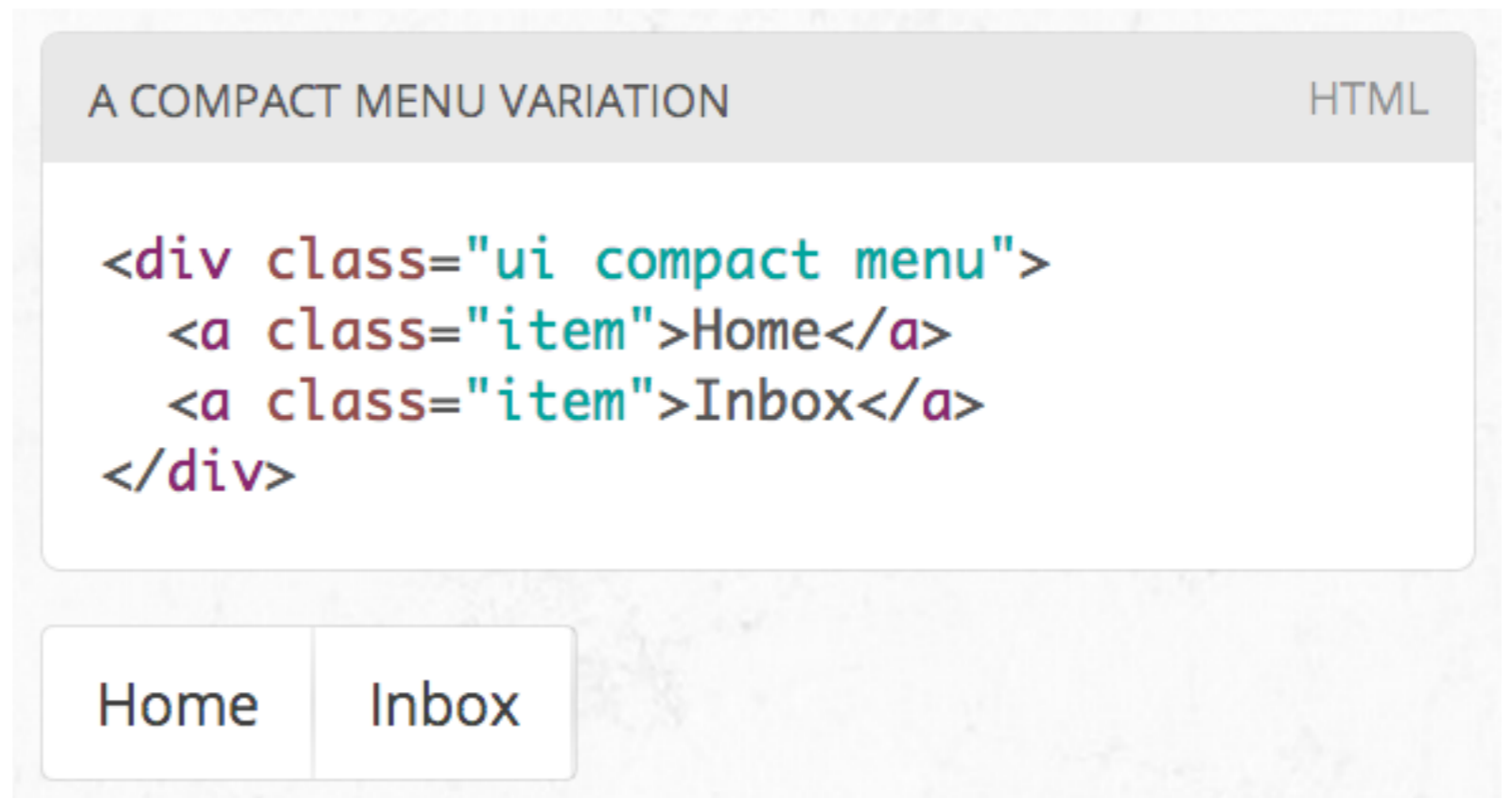


```
A SIMPLE MENU                                    HTML

<div class="ui menu">
  <a class="item">Home</a>
  <a class="item">Inbox</a>
</div>
```

| Home | Inbox | |

# Changing an Element

- Class names in Semantic always use single english words.

- If a class name is an adjective it is either a type of element or variation of an element.

- CSS definitions always define adjectives in the context of a noun. In this way class names cannot pollute the namespace.

A COMPACT MENU VARIATION                                    HTML

```
<div class="ui compact menu">
  <a class="item">Home</a>
  <a class="item">Inbox</a>
</div>
```

| Home | Inbox |

# Combining an Element

- All UI definitions in semantic are stand-alone, and do not require other components to function.

- However, components can choose to have optional couplings with other components.

- For example you might want to include a badge inside a menu. A label inside of a menu will automatically function as a badge

USING A UI LABEL INSIDE A UI MENU                    HTML

```html
<div class="ui compact menu">
  <a class="item">Home</a>
  <a class="item">
    Inbox
    <div class="ui label">22</div>
  </a>
</div>
```

Home    Inbox    22

# Types / Variations

- A ui definition in Semantic usually contains a list of mutually exclusive variations on an element design.

- A type is designated by an additional class name on a UI element

TYPES OF UI BUTTON                                     HTML

```html
<div class="ui labeled icon button">
  Download <i class="download icon"></i>
</div>
<div class="ui icon button">
  <i class="download icon"></i>
</div>
<div class="ui button">
  Download
</div>
<div class="ui facebook button">
  <i class="facebook icon"></i>
  Facebook
</div>
```

⊕  **DOWNLOAD**        ⊕  **DOWNLOAD**        f  **FACEBOOK**

# Types / Content

- Types may require different html structures to work correctly.

- For example, an icon menu might expect different content like icons glyphs instead of text to be formatted correctly

ICON MENU TYPE                                    HTML

```
<div class="ui icon menu">
  <a class="item">
    <i class="mail icon"></i>
  </a>
  <a class="item">
    <i class="lab icon"></i>
  </a>
  <a class="item">
    <i class="star icon"></i>
  </a>
</div>
```
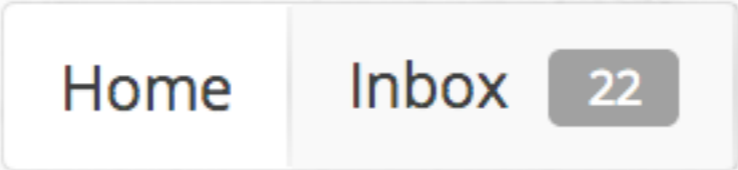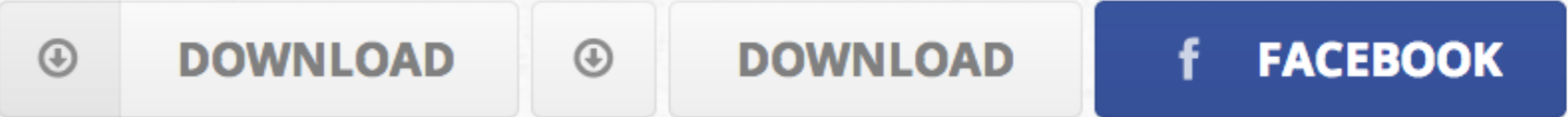
# Types / HTML Differences

- Types may also each require slightly different html.

- For example, a tiered menu needs html specified for a sub menu to display itself correctly

TIERED MENU TYPE                                    HTML

```
<div class="ui tiered menu">
  <div class="menu">
    <div class="active item">
      <i class="home icon"></i>
      Home
    </div>
    <a class="item">
      <i class="mail icon"></i>
      Mail
      <span class="ui label">22</span>
    </a>
  </div>
  <div class="sub menu">
    <div class="active item">Activity</div>
    <a class="item">Profile</a>
  </div>
</div>
```

⌂ Home      ✉ Mail   22

Activity    Profile

# Variations

- A variation alters the design of an element but is not mutually exclusive.

- Variations can be stacked together, or be used along with altering an element's type.

- For example, having wide menus that take up the full width of its parent may sometimes be overwhelming. You can use the compact variation of a menu to alter its format to only take up the necessary space.

```
<div class="ui compact tiered menu">
    ...
</div>
```

🏠 Home    ✉ Mail    22

Activity    Profile

# Intersecting Variations

- The definition for the variation red contains css specifically for describing the intersection of both red and inverted.

```
<div class="ui red tiered menu">
   ...
</div>
```

# Whats Different?

# Build Responsive Layouts Easier

- Designed Completely with EM

- Every component is defined using em and rem so that components can be resized simply on the fly.

- Want a menu to get smaller on mobile? Simply have it's font-size change using a media query.

# Self Explanatory

- Descriptive not Prescriptive

- Writing front end code shouldn't require learning the naming or programming conventions of a particular developer.

- Instead of using short-hand, or codifying naming conventions, Semantic uses simple, common language for parts of interface elements, and familiar patterns found in natural languages for describing elements.

# Tag Agnostic

- Use whatever html tags you please.

- Interface definitions in Semantic are tag ambivalent.

- That means you can use div, article, section, span without affecting the display of the element.

- Special tags like a, table, td still carry special meaning in certain circumstances however.

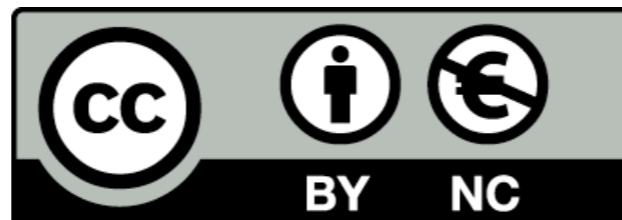# Powerful tools for expressing groups and collections.

- Don't repeat yourself

- In English it's much easier to say "There are three tall men" than "There is a tall man, a tall man and a tall man".

- In Semantic element definitions can be expressed in groups have shared attributes like size, color, type avoiding repetitive declarations.

# Portable and self-contained.

- Using Semantic doesn't mean adopting an entire framework, or rewriting your code base

- Semantic components are written in a singular style, but are not part of mandated overarching library. Only like a couple components? No problem, use only what you need.

- UI components in Semantic also define optional and required couplings with other components where their usage intersect. That means for example, a popup can check for the existence of CSS animation component before using the fallback javascript animations.

# Shared language, different implementations

- Restyle your site without Restructuring it

- Describing your site's content using a common language like Semantic allows other developers to create UI definitions to match one shared vocabulary.

- This means you can redesign your website without retooling your html.

- Simply alter the look and feel of your UI using a different UI style definition.

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