



Introduzione a Bootstrap



Bootstrap

- Bootstrap è un framework basato su HTML, CSS, and JavaScript per sviluppare applicazioni web responsive.
- Sviluppato da Mark Otto e Jacob Thornton (Twitter) Rilasciato come prodotto opensource nell'Agosto 2011 su GitHub.

Perché usare Bootstrap

- Bootstrap include template HTML e CSS for:
 - typography, forms, buttons, tables, navigation, modals, image carousels, etc..
- **Facile da usare:** basta avere basi minime di HTML e CSS.
- **Responsive features:** I CSS si adattano a qualunque tipo di dispositivo (Tablet, smartphone, PC Desktop)
- **Cross Browser :** Bootstrap è compatibile con tutti i moderni browser (Chrome, Firefox, Internet Explorer, Safari, Opera)

Come ottenere Bootstrap

- Download Bootstrap da getbootstrap.com
- Includere Bootstrap da CDN (Content Delivery Network)

```
<!-- Latest compiled and minified CSS -->
<link rel="stylesheet" href="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.7/css/bootstrap.min.css">

<!-- jQuery library -->
<script src="https://ajax.googleapis.com/ajax/libs/jquery/3.3.1/jquery.min.js"></script>

<!-- Latest compiled JavaScript -->
<script src="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.7/js/bootstrap.min.js"></script>
```

Aggiungere HTML5 doctype

- Bootstrap usa elementi HTML e CSS che richiedono HTML5

```
<!DOCTYPE html>  
<html lang="en">  
  <head>  
    <meta charset="utf-8">  
  </head>  
</html>
```

Bootstrap 3 è mobile-first

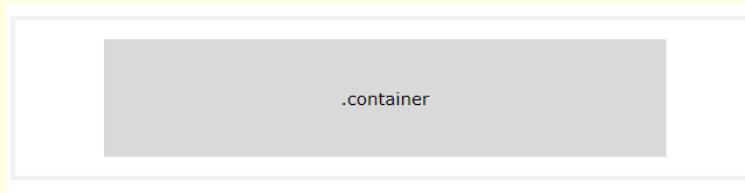
Larghezza della pagina

Livello di zoom iniziale

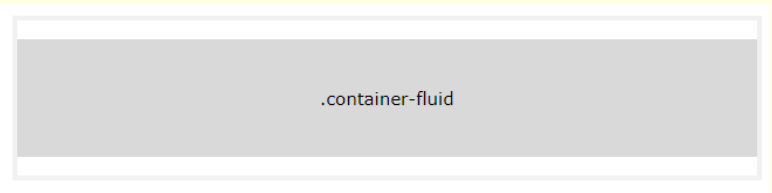
```
<!DOCTYPE html>
<html lang="en">
<head>
  <title>Bootstrap Example</title>
  <meta charset="utf-8">
  <meta name="viewport" content="width=device-width, initial-scale=1">
  <link rel="stylesheet" href="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.7/css/bootstrap.min.css">
  <script src="https://ajax.googleapis.com/ajax/libs/jquery/3.3.1/jquery.min.js"></script>
  <script src="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.7/js/bootstrap.min.js"></script>
</head>
<body>
```

Containers

- Bootstrap richiede dei contenitori per gestire gli elementi della pagina.
- Esistono due classi contenitore:
 - `.container`
 - `.container-fluid`



fixed width container



full width container

Grid System

- Il Grid System di Bootstrap consente fino a 12 colonne sulla pagina.
- Il Grid System è responsive e le colonne si riorganizzano automaticamente in base alle dimensioni dello schermo

span 1	span 1	span 1	span 1	span 1	span 1	span 1	span 1	span 1	span 1	span 1	span 1
span 4				span 4				span 4			
span 4				span 8							
span 6						span 6					
span 12											

Grid classes

- Il Grid system possiede quattro classi:
 - **xs** (for phones - screens less than 768px wide)
 - **sm** (for tablets - screens equal to or greater than 768px wide)
 - **md** (for small laptops - screens equal to or greater than 992px wide)
 - **lg** (for laptops and desktops - screens equal to or greater than 1200px wide)

Struttura di base

- Bisogna sempre creare una *row* e aggiungere dentro dei *div* con classe `col-*-*`

```
<div class="row">
  <div class="col-*-*"></div>
  <div class="col-*-*"></div>
</div>
<div class="row">
  <div class="col-*-*"></div>
  <div class="col-*-*"></div>
  <div class="col-*-*"></div>
</div>
<div class="row">
  ...
</div>
```

Es. colonne uguali

```
<div class="row">  
  <div class="col-sm-4">.col-sm-4</div>  
  <div class="col-sm-4">.col-sm-4</div>  
  <div class="col-sm-4">.col-sm-4</div>  
</div>
```



.col-sm-4	.col-sm-4	.col-sm-4
-----------	-----------	-----------

Es. Colonne diverse

```
<div class="row">  
  <div class="col-sm-4">.col-sm-4</div>  
  <div class="col-sm-8">.col-sm-8</div>  
</div>
```



.col-sm-4

.col-sm-8

Basic Tables

```
<div class="container">
  <h2>Basic Table</h2>
  <p>The .table class adds basic styling (light padding and only horizontal dividers) to a table:</p>
  <table class="table">
    <thead>
      <tr>
        <th>Firstname</th>
        <th>Lastname</th>
        <th>Email</th>
      </tr>
    </thead>
    <tbody>
      <tr>
        <td>John</td>
        <td>Doe</td>
        <td>john@example.com</td>
      </tr>
      <tr>
        <td>Mary</td>
        <td>Moe</td>
        <td>mary@example.com</td>
      </tr>
      <tr>
        <td>July</td>
        <td>Dooley</td>
        <td>july@example.com</td>
      </tr>
    </tbody>
  </table>
</div>
```

Basic Table

The .table class adds basic styling (light padding and only horizontal dividers) to a table:

Firstname	Lastname	Email
John	Doe	john@example.com
Mary	Moe	mary@example.com
July	Dooley	july@example.com

Striped Tables

```
<div class="container">
  <h2>Striped Rows</h2>
  <p>The .table-striped class adds zebra-stripes to a table:</p>
  <table class="table table-striped">
    <thead>
      <tr>
        <th>Firstname</th>
        <th>Lastname</th>
        <th>Email</th>
      </tr>
    </thead>
    <tbody>
      <tr>
        <td>John</td>
        <td>Doe</td>
        <td>john@example.com</td>
      </tr>
      <tr>
        <td>Mary</td>
        <td>Moe</td>
        <td>mary@example.com</td>
      </tr>
      <tr>
        <td>July</td>
        <td>Dooley</td>
        <td>july@example.com</td>
      </tr>
    </tbody>
  </table>
</div>
```

Striped Rows

The .table-striped class adds zebra-stripes to a table:

Firstname	Lastname	Email
John	Doe	john@example.com
Mary	Moe	mary@example.com
July	Dooley	july@example.com

Riferimenti

- Per approfondimenti e materiale:
 - <https://getbootstrap.com>
 - <https://www.w3schools.com/bootstrap/>
 - <http://wiki.lib.sun.ac.za/images/0/07/Bootstrap-tutorial.pdf>
 - <https://bootswatch.com>