



Introduction to Flexbox Properties

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What is flexbox?

- Flexbox is **Flexible Box Layout Module**
- It is mainly a flexible container in short flexbox
- CSS floats and clearfix hacks are very much popular to get proper multi-column layouts.
- Flexbox is an alternative for this.
- In future it can overcome Floats and clearfixs.
- It's great for mobile screens and responsive content for dynamic layouts and webapps.



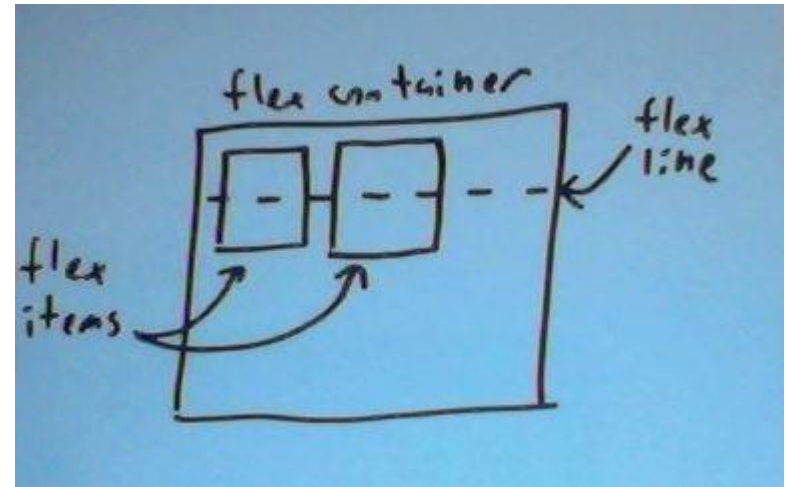
Syntax

HTML:

```
<div class="flex-container">  
  <div class="flex-item">flex item 1</div>  
  <div class="flex-item">flex item 2</div>  
</div>
```

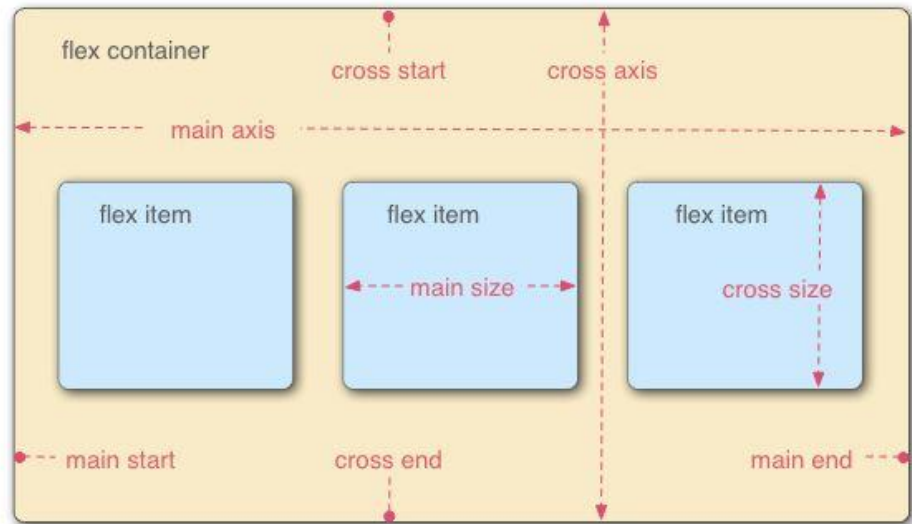
CSS

```
.flex-container {  
  display: -webkit-flex;  
  display: flex;  
  width: 300px;  
  height: 240px;  
  background-color: Silver;  
}  
.flex-item {  
  background-color: DeepSkyBlue;  
  width: 100px;  
  height: 100px;  
}
```



The Keys to a Flexbox Layout

- Container: Flex container: `display:flex`
- Children: flex items: items
- Axes: Every flexible box layout follows two axes.
 - The **main axis** is the axis along which the flex items follow each other.
 - The **cross axis** is the axis perpendicular to the **main axis**.
- Direction/Flow of items: `flex-direction`



Browser Support

caniuse.com

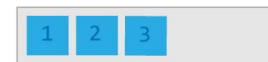
IE	Edge *	Firefox	Chrome	Safari	Opera	iOS Safari *	Opera Mini *	Android Browser *	Chrome for Android
8			45					4.3	
9			46					4.4	
10		43	47			8.4		4.4.4	
11	13	44	48	9	34	9.2	8	47	47
	14	45	49	9.1	35	9.3			
		46	50		36				
		47	51						

display:-webkit-box; /*old prefixed for webkit*/
display:-moz-box; /*old prefixed for mozilla*/
display:-ms-flexbox; /*inbetween prefixed for ie*/
display:-webkit-flex; /*new prefixed for webkit*/
display:flex; /*new*/

justify-content Property

- **justify-content:** aligns items horizontally, (along the main axis) and accepts the following values:
- **flex-start:** Items align to the left side of the container.
- **flex-end:** Items align to the right side of the container.
- **center:** Items align at the center of the container.
- **space-between:** Items display with equal spacing between them.
- **space-around:** Items display with equal spacing around them.

flex-start



flex-end



center



space-between



space-around



Justify-Content

align-items/align-self Property (same)

- **align-items:** aligns items vertically (along the cross axis) and accepts the following values:
- **flex-start:** Items align to the top of the container.
- **flex-end:** Items align to the bottom of the container.
- **center:** Items align at the vertical center of the container.
- **baseline:** Items display at the baseline of the container.
- **stretch:** Items are stretched to fit the container.

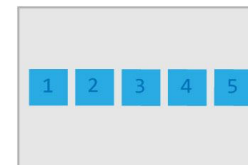
flex-start



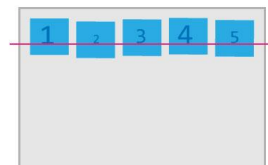
flex-end



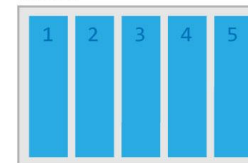
center



baseline



stretch



Align-Items

align-content Property

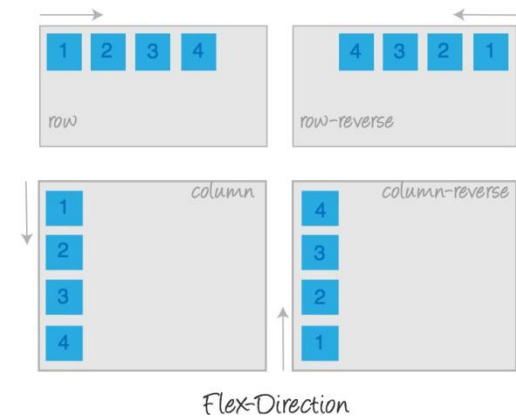
- align-content to set how multiple lines are spaced apart from each other. This property takes the following values:
- **flex-start:** Lines are packed at the top of the container.
- **flex-end:** Lines are packed at the bottom of the container.
- **center:** Lines are packed at the vertical center of the container.
- **space-between:** Lines display with equal spacing between them.
- **space-around:** Lines display with equal spacing around them.
- **Stretch:** Lines are stretched to fit the container.

NOTE: When there is only one line, align-content has no effect.



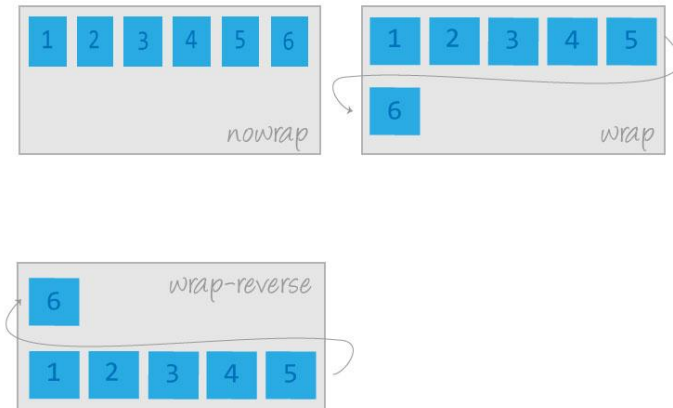
flex-direction Property

- **flex-direction**: defines the direction items are placed in the container, and accepts the following values:
- **row**: Items are placed the same as the text direction.
- **row-reverse**: Items are placed opposite to the text direction.
- **column**: Items are placed top to bottom.
- **column-reverse**: Items are placed bottom to top.



flex-wrap Property

- flex-wrap: nowrap | wrap | wrap-reverse
- Items are placed the same as the text direction.
- **nowrap**: Every item is fit to a single line.
- **wrap**: Items wrap around to additional lines.
- **wrap-reverse**: Items wrap around to additional lines in reverse.



FlexWrap

flex-flow Property

- The two properties flex-direction and flex-wrap are used so often together that the shorthand property flex-flow was created to combine them. This shorthand property accepts the value of one of the two properties separated by a space.
- For example, you can use flex-flow: row wrap to set rows and wrap them.

```
div {  
  display: flex;  
  flex-flow: row-reverse wrap;  
}
```



Order

- Sometimes reversing the row or column order of a container is not enough. In these cases, we can apply the order property to individual items. By default, items have a value of 0, but we can use this property to set it to a positive or negative integer value.
- Order <integer>

(default)



order: 1



order: 3



Order



ANY QUERIES





Thank you

