

CSS Grid



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Agenda



Flexbox vs CSS Grid

News Stories

Image Gallery

Full Page Layout

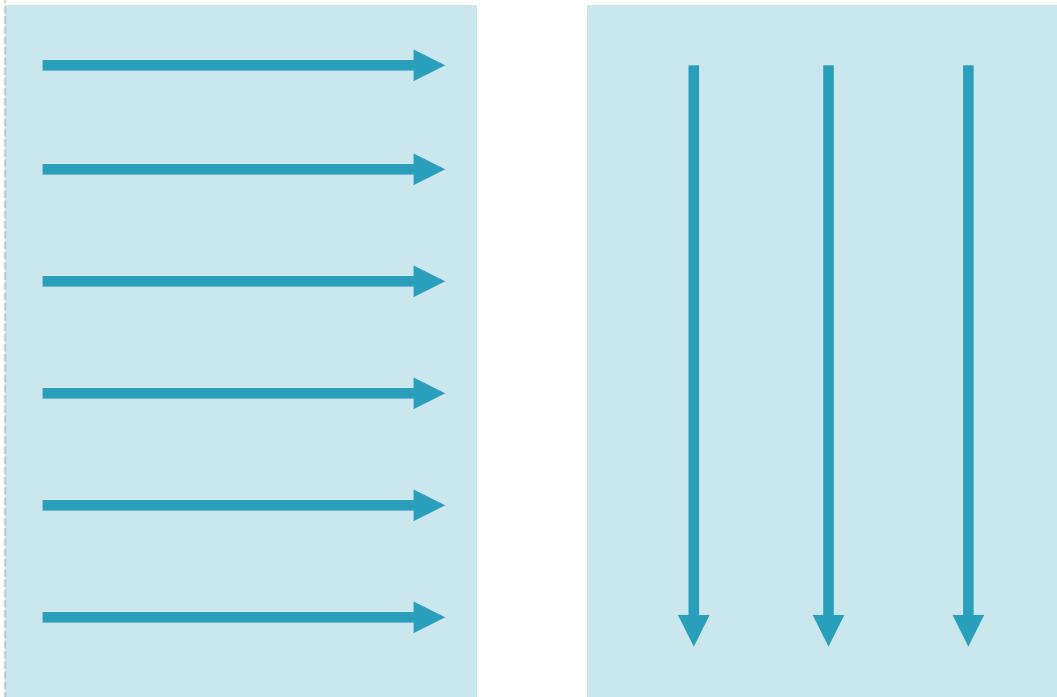
Testing



Flexbox vs. CSS Grid

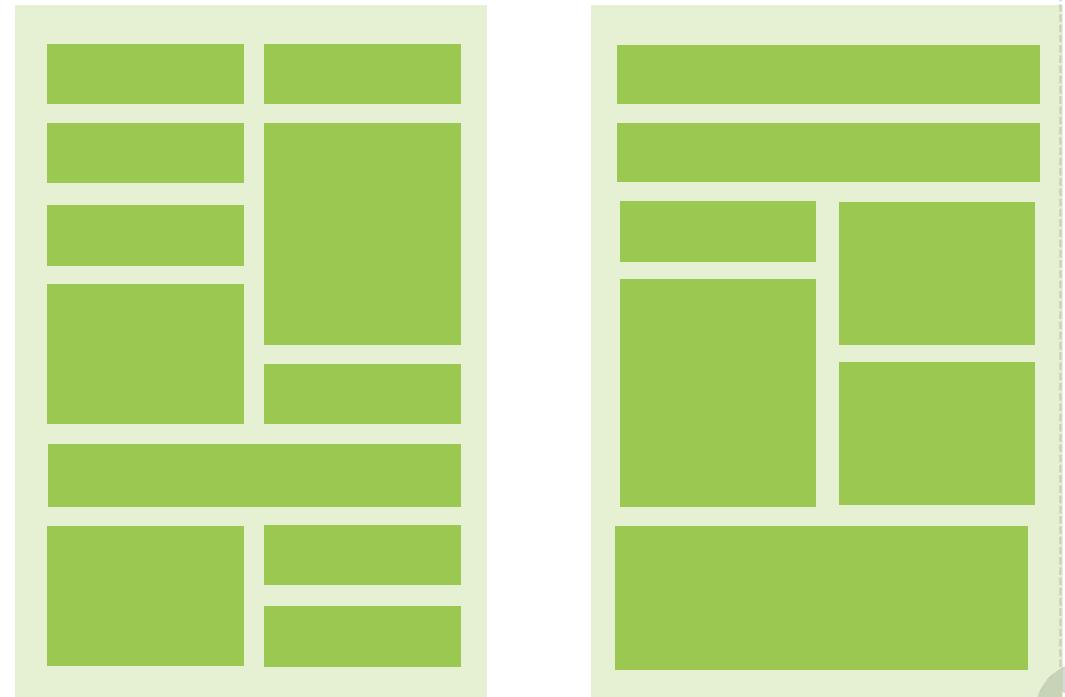
Flexbox

Single Dimension



CSS Grid

Two Dimensions



Projects



World News

Stories that Move You!

Breaking Politics Business Science

Breaking News

News Story One
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Suspendisse potenti. Aenean ac pulvinar diam, nec vestibulum purus. Proin aliquet eu nibh at laoreet. Duis et dolor neque. Suspendisse ut vehicula est. Nulla sed placerat neque, sit amet dapibus augue. Ut laoreet dui consectetur tellus gravida varius. Sed malesuada eros sit amet ex suscipit tempus non id arcu. Fusce ultricies quam erat, at suscipit sapien euismod non. Proin at turpis felis. Morbi euismod efficitur sem, vel ornare mauris consequat venenatis. Phasellus placerat condimentum dignissim.

News Story Two
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Suspendisse potenti. Aenean ac pulvinar diam, nec vestibulum purus. Proin aliquet eu nibh at laoreet. Duis et dolor neque. Suspendisse ut vehicula est. Nulla sed placerat neque, sit amet dapibus augue. Ut laoreet dui consectetur tellus gravida varius. Sed malesuada eros sit amet ex suscipit tempus non id arcu. Fusce ultricies quam erat, at suscipit sapien euismod non. Proin at turpis felis. Morbi euismod efficitur sem, vel ornare mauris consequat venenatis. Phasellus placerat condimentum dignissim.

News Story Three
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Scelerisque ac sagittis sed magna, aenean, est ac augue adipiscing.

News Story Four
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Scelerisque ac sagittis sed magna, aenean, est ac augue adipiscing.

News Story Five
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Scelerisque ac sagittis sed magna, aenean, est ac augue adipiscing.

News Story Six
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut! Tincidunt lectus magna Elementum.

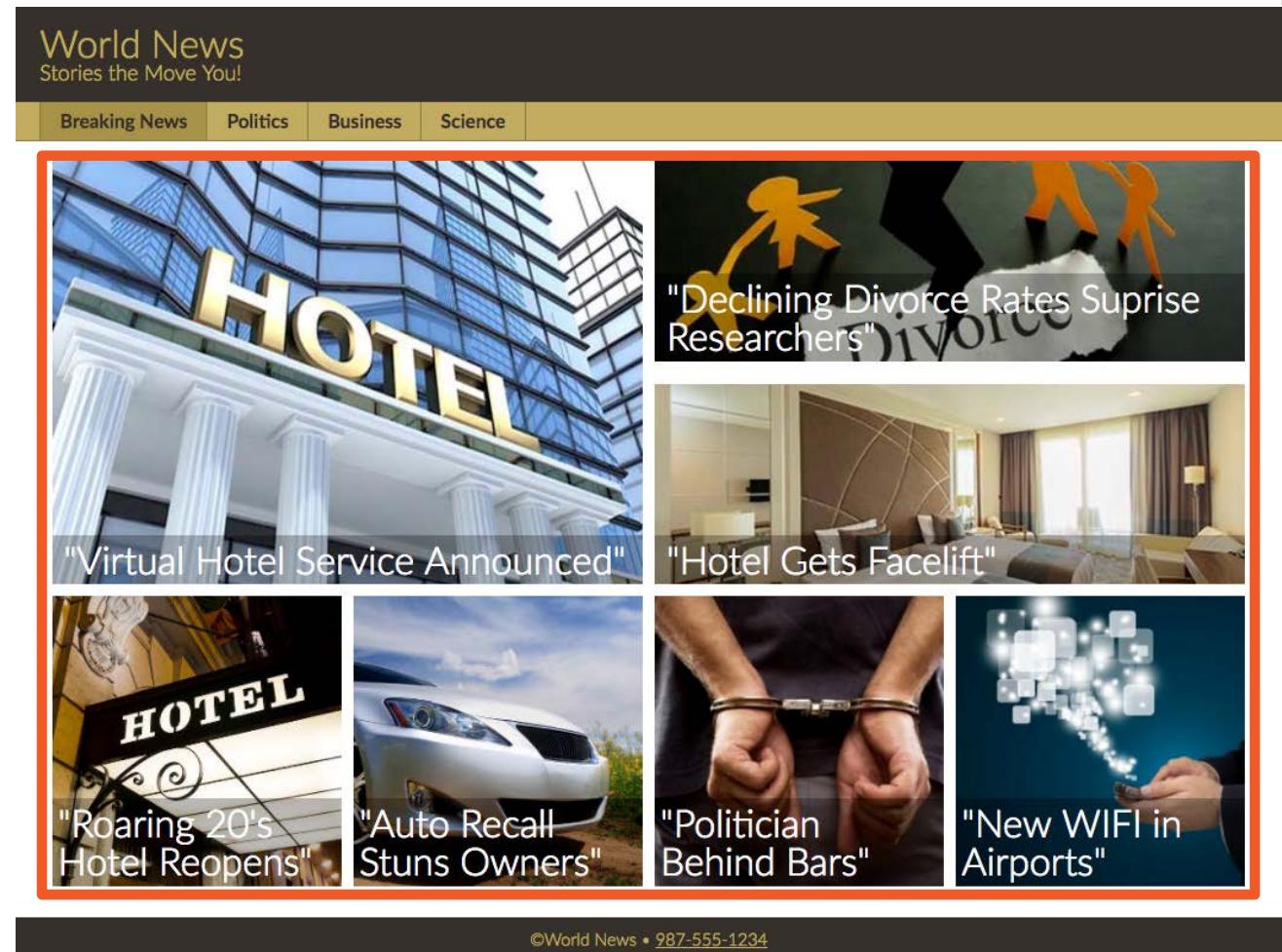
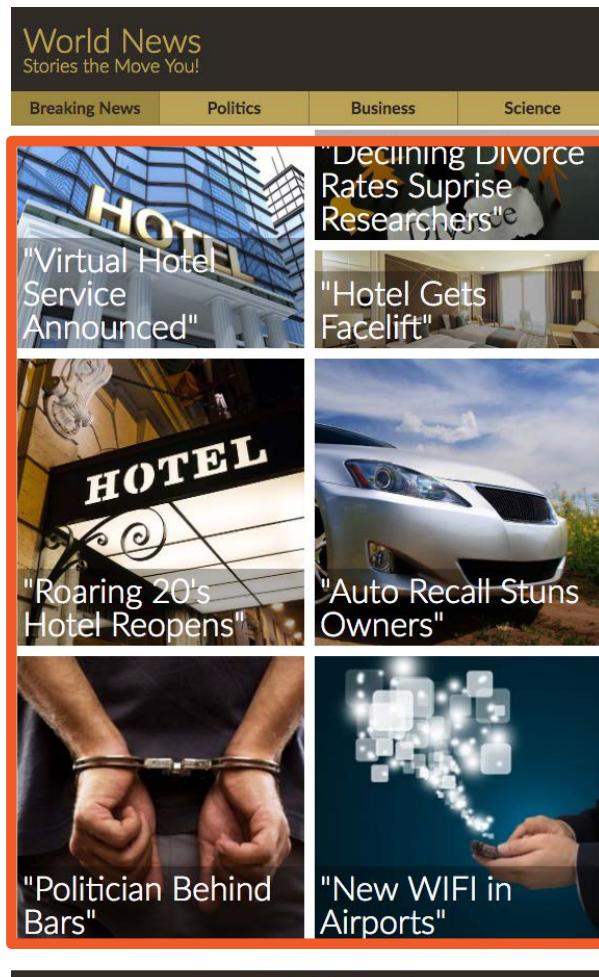
News Story Seven
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut!

News Story Eight
Nec mid tincidunt hac augue, eu dignissim elementum, nec massa dictumst pulvinar porta ridiculus, nascetur vut!

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Projects



header

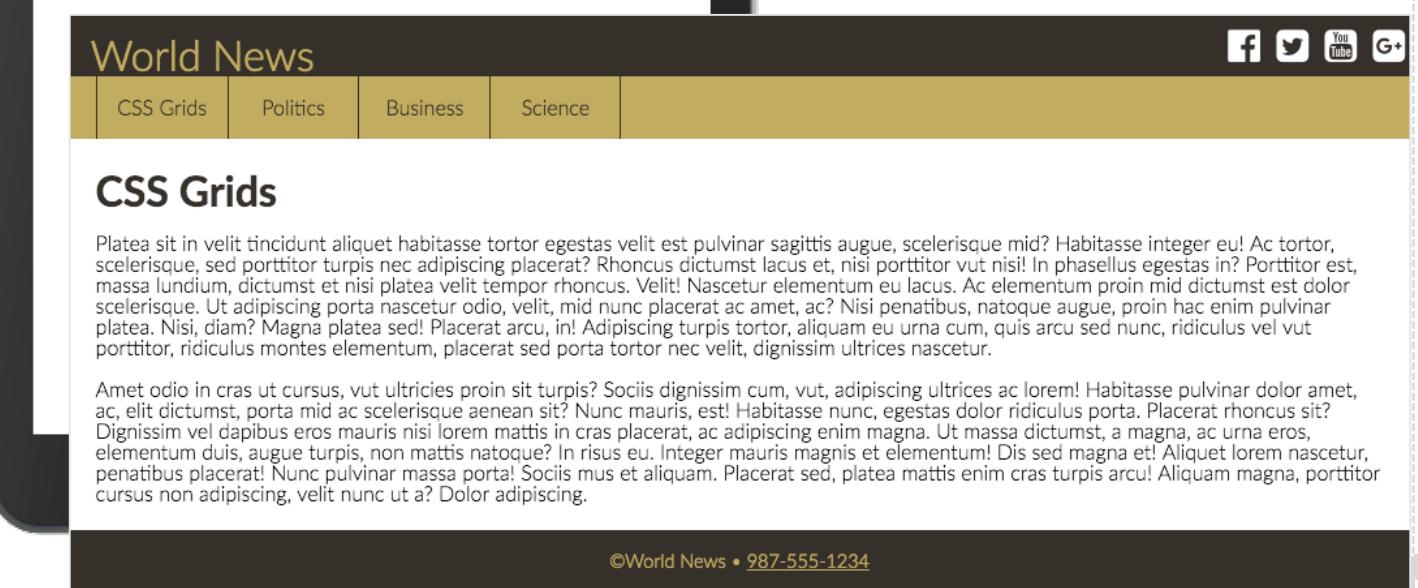
social

hamburger

navigation

main

footer



Demos



Let's open the snippets file for this unit.

Copy and paste the code for div with a class of parent to the main tag of your html document just below the Breaking News heading.

Now open your small-default partial sass file.

Lets tell the parent item to display as a grid.

Make sure that your CSS Preprocessor is running.

If we view the html page there is no difference.

Now lets create some columns by adding grid-template-columns.

Lets start with 250px and auto. This will create two columns.

Notice that as we change the page size the first column is fixed and the second is filling the remaining space.

Now lets divide the page into three fractions with the middle fraction being twice as big as the other two.

This is sooo easy and we don't have to worry about the blog articles being different heights, it just works!

Now lets try our standard multiple column layout by setting the small screens to a single column. We will set the medium screens to display in two even columns.

Finally we will go to the large screens and show 4 columns.

You have got to be so excited right now seeing how much easier this is than the old way of creating columns and rows. But please don't leave because the best is still ahead.



Lets open the large and medium scss and comment out the grid columns statement.
Back to the small scss lets create two even rows with 1 fraction and 1 fraction.
Now lets have the first child article start at column 1 and span across two columns.
lets also set the background-color to orange so we can easily see it.
Here is the result in a browser.

Lets change to the medium scss and create 3 fractional columns.
We will then have the first article start at column 2 and span two columns.
Notice in the results that the first cell has been left empty.
Lets change it back to start at column 1 and this time span 1
Now lets set the grid row to start to 1 and span down 1
This is the result.

Now lets jump to the large scss file and create 4 even columns.
We will change the first child to display 2 columns wide and two rows high.
This is what we have.
Lets go another step and have the second article change the background-color and have
to start at 3 and span two columns.
Here is the result.



Now I can feel that your sense of design is screaming in pain because all these rows and column are touching each other.

Lets return to the small-default and assign a light grey color to the background of all the children items.

Here is what we have.

Now lets add a column gap of 2% and a row gap of .5rem.

Notice how the articles are now spaced apart.

Lets remove the background colors and take another look.

Here is the result on small screens.

Here is the medium screens with the wider leading article.

Here is the large screen with the large leading article and wide second article.

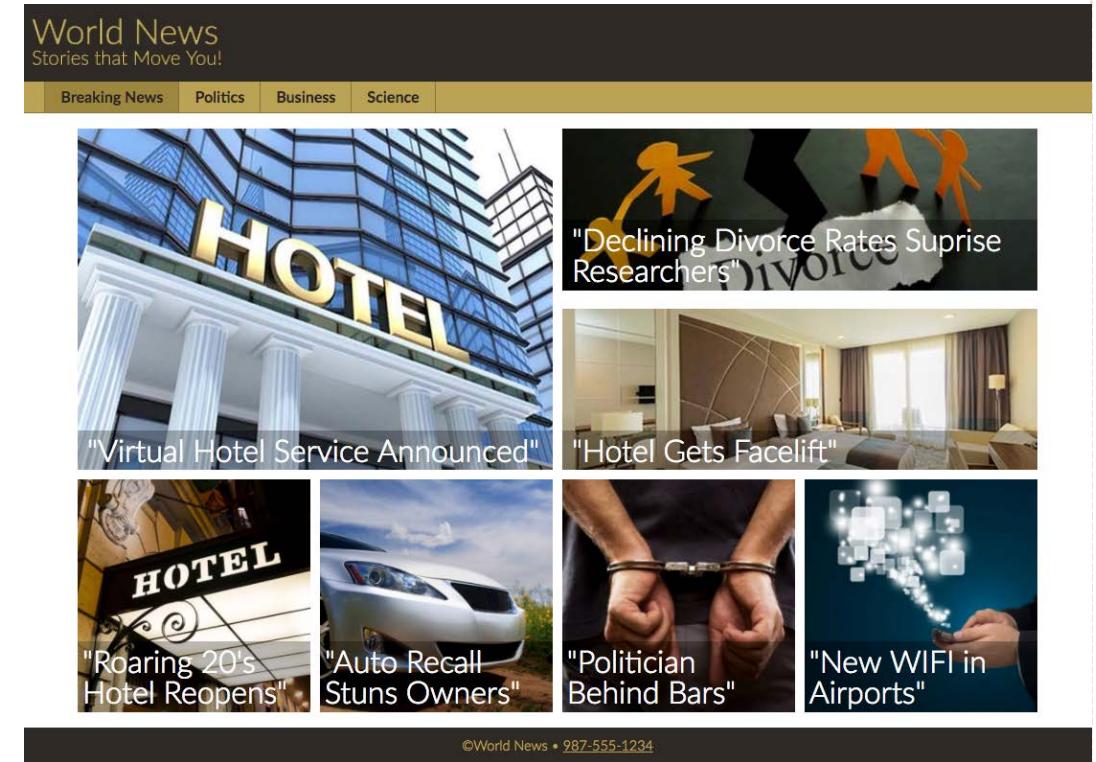
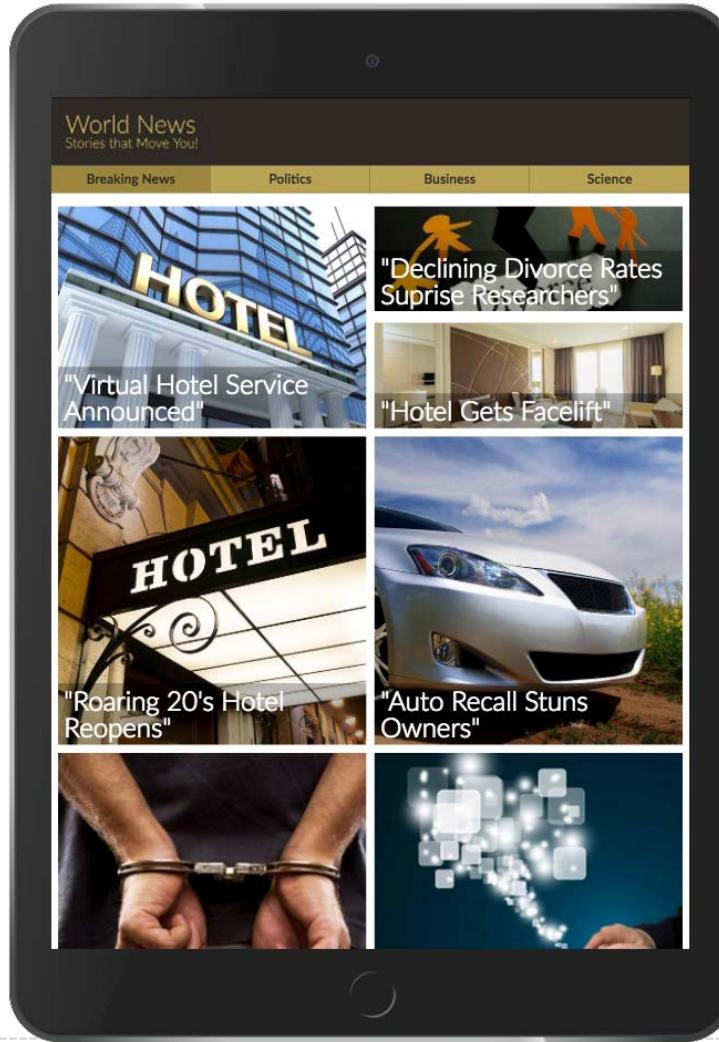
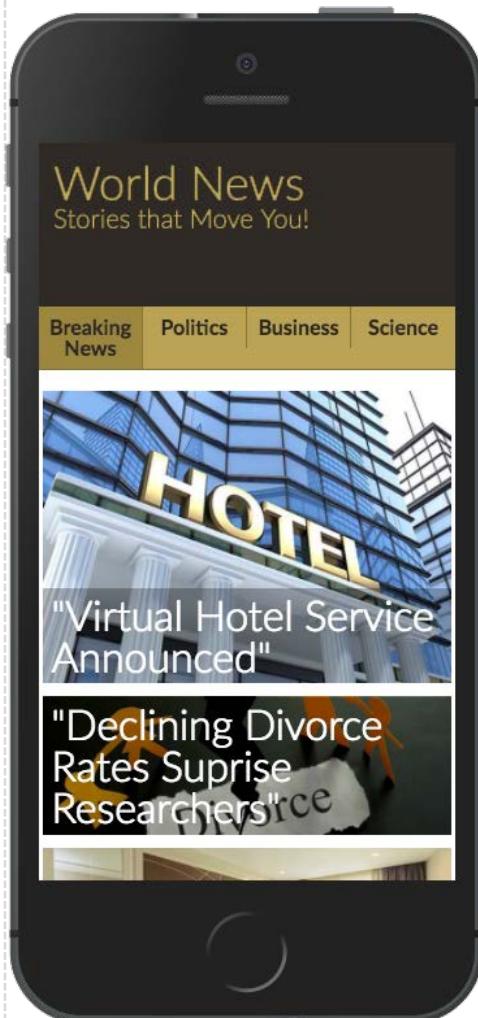
And this was all done entirely with a few lines of css.



Delete Me



CSS Grids Using Images



Class Names for Children

:nth-child()



class="lead"



-ms-

```
div.lead {grid-row: 1; grid-column: 1 / span 2;  
          -ms-grid-row: 1;  
          -ms-grid-column: 1;  
          -ms-grid-column-span: 2;}
```

-ms-



Lets get a clean copy of the start file from the demos for this module.

copy the 7 photos to the images folder of the start folder

Open your text editor and css preprocessor and lets get started.

Open the snippets from this module and copy the second block of code which is 7 divisions with a class of teaser.

Past it in the index page just below the Breaking News heading

When we preview the page we get a stack of images with text to the right of each one.

Lets start by moving the text over each image and sizing it appropriately.

Open the small-default file and around line 103, lets tell the divisions with a class of teaser to position themselves as relative.

Next we will talk to the spans inside each division.

Position each one as absolute and display as a block. Now we can set the bottom to 0 so the text sits at the bottom of the photo.

This is what it looks like.

Now lets set the background color to rgba black at 30% transparent.

As you can see the black color is only as large as the text.

Lets set the width to 100% so it extends all the way across like this.

Finally we will add some padding around the text, change the color to white and increase the font size to 1.5 rem for the small screens.

In the large scss lets change the font size for the span to 2 rem.

Now it looks like this. With the labels styled, were ready for the grids.



We want the division images to scale with the grid cells so lets tell them to display as blocks and set the width to 100%. Now they are scaling to the full width of the main tag.

Lets scroll up to the main tag which is the parent and tell it to display as a grid. For the small screens we want to set the grid template columns to 2 equal fractions. We will also provide some space between cells using grid column gap at 10px and grid row gap at 10px.

When we look at the results we see that everything is now fitting inside one of the grid cells including the h1 "Breaking News" text. I really don't want to have the page name showing so lets just remove that from the index file.

Now it looks like this. Here is where the fun begins.

Our design calls for the leading new item to be full width on the small screens so lets go into the index page and add a class to the first news item of "lead"

Now lets open the small default file and around line 125, lets reference the division with a class of lead and assign it to the grid row 1 and grid column 1 with a span of 2. That should do it.

Here is the result.



The next two articles are also full width on the small screens so lets go back to the index file and add a class of secondTop and secondBot to them.

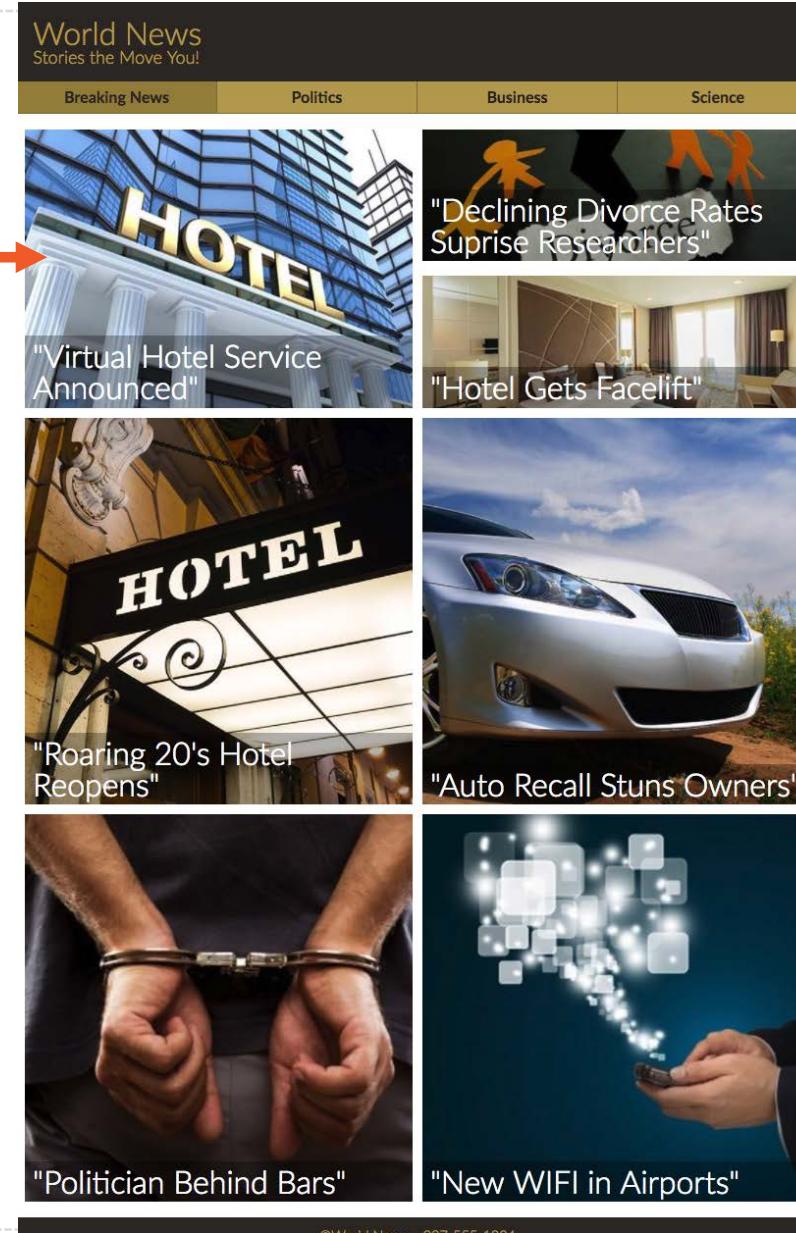
To make things faster lets copy the division dot lead and paste it two more times.

Change the class to secondTop and secondBot.

Change the grid row to 2 for the first one and 3 for the second one.

The last four articles flow automatically into the remaining spots on the grid and were done with small screens.





Please copy the code for these three articles from the small file.
open the medium scss file and paste it.

In the lead we add span of 2 to the row and remove it from the column.

Remove the span of two from both of the others.

The secondTop will change to row 1 and column 2.

The secondBot will change to row 2 and column 2

Do you see this grey border along the bottom?

We will remove it by adding align self start to the top item and
align self end to the bottom one. This will keep everything aligned to the lead image.

Lets take a look now and see how great things are working out.

We still have one more to go.

Lets copy the css for lead and second articles.

Paste it in the large scss file where we ill get to it in a minute.

But first we need to change the grid layout to 4 equal fractions using grid template columns.

We don't need the align self here so we can remove those two statements.



The lead article now starts at row 1 and spans two rows. It also starts at column 1 and spans two columns.

That alone caused a bit of a mess on our browser.

The second top needs to stay at row 1 but start at column 3 and span 2

The second bottom stays at row 2 and starts at column 3 and spans 2 as well.

Here is our awesome result on the large screen.



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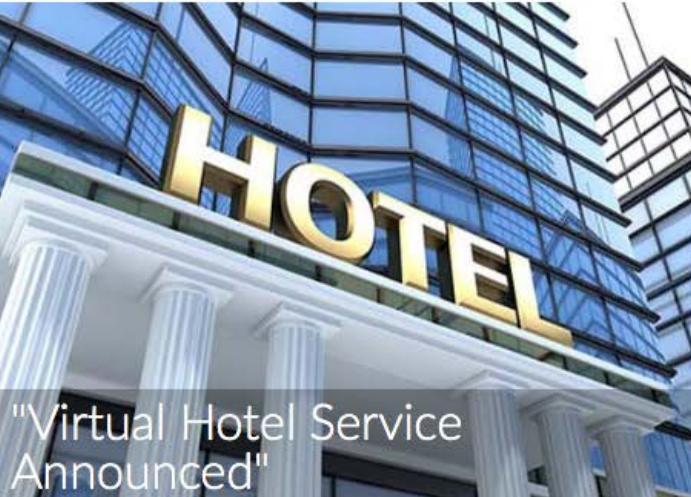


file:///Users/paulcheney/Desktop/start/index.html

World News

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Breaking Politics Business Science



"Virtual Hotel Service Announced"



"Declining Divorce Rates Surprise Researchers"



"Hotel Gets Facelift"



"New WIFI in Airports"



"Politician Behind Bars"



"Auto Recall Stuns Owners"



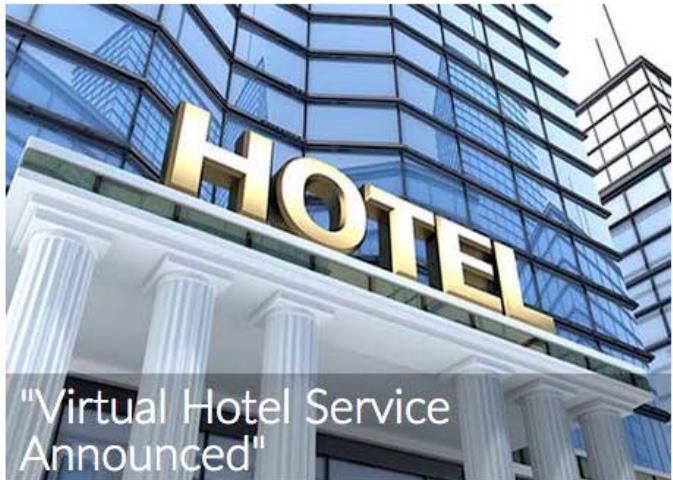
"Roaring 20's Hotel Reopens"

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"Virtual Hotel Service Announced"

"Declining Divorce Rates Surprise Researchers"

"Hotel Gets Facelift"

"Roaring 20's Hotel Reopens"

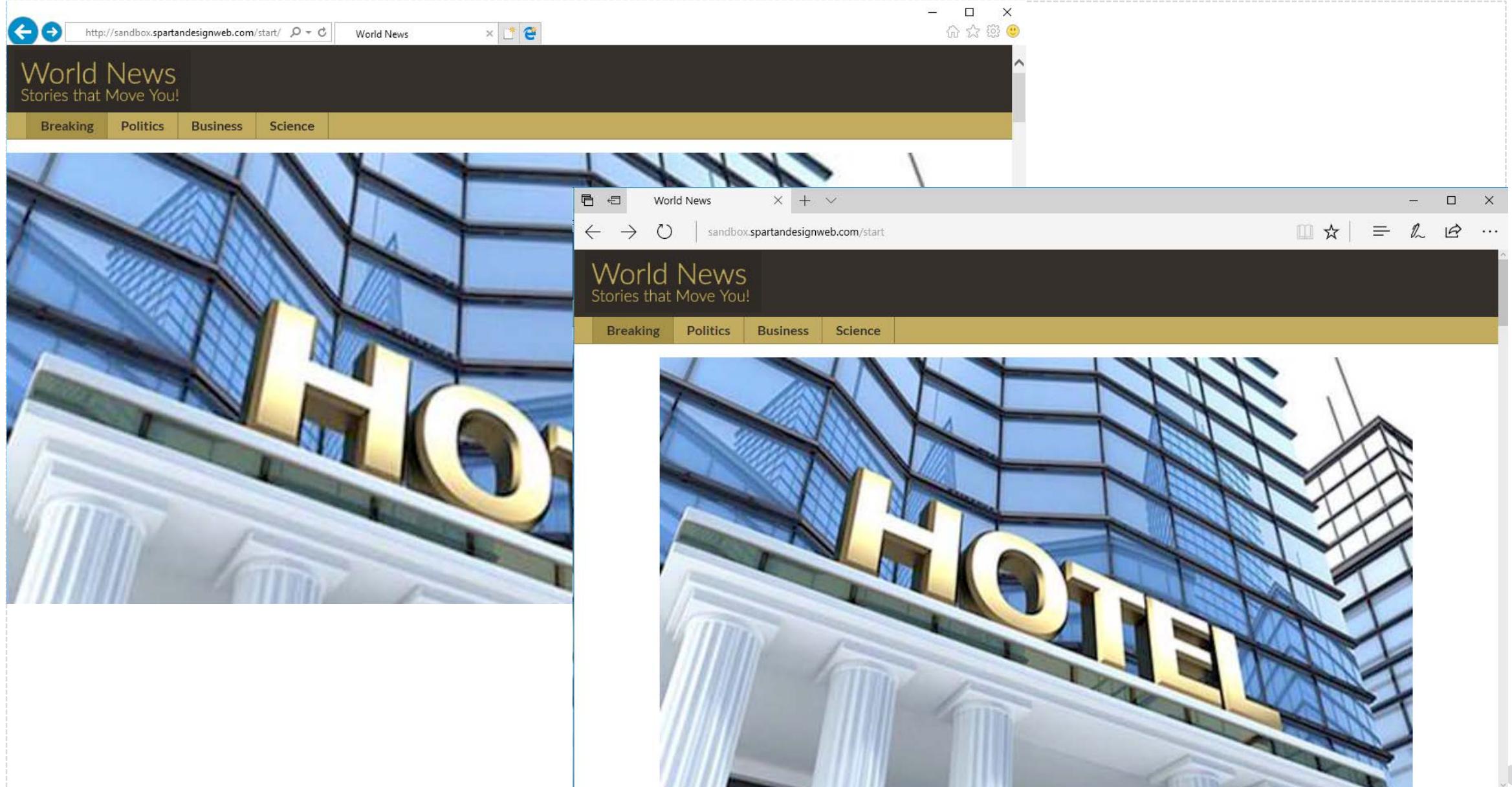
"Auto Recall Stuns Owners"

"Politician Behind Bars"

"New WIFI in Airports"

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Lets return to our small default file and add display ms grid

We also need to use a prefix for the number of grid columns

Down in the code for the lead class, we need to set the grid row, grid column and column span as three separate statements with the -ms prefix. Its the same information as above but separated out.

Repeat this for the second top and second bottom

Now when we look at the results we can see the lead and second articles in the right place and the remaining 4 are all stacked on top of each other in the first grid cell. The problem is that the remaining items do not automatically flow into the additional cells. We have to manually place each one..

Return to the html file and add a class to the remaining four articles of ie1 through ie4

Now in the small scss file, we will position all four to the exact cell they are to occupy.

ie1 goes in row 4 column 1

ie2 also goes in row 4 but in column 2

ie3 jumps down to row 5 column 1 and

ie4 stays in row 5 but in column 2

Lets try this again in the Microsoft bowsers.

What do you notice is missing here? Yes there is not space between the images. It turns out that microsoft does not support the column and row gaps even with a prefix so this will just have to be the fallback position. It's really not that bad.



We still need to fix the medium scss by setting four ms prefix values for the lead and secondary articles. Notice that whenever I set a column span to 2 in the small scss I have to reset it back to one in the medium file.

In the large we need to use the ms prefix to set the number of columns to four.

We also have to replicate all the information for the lead and secondary articles.

The final 4 with classes of ie 1 through ie4 need to be placed in row 3 columns 1 through 4.

Now lets test our work in ie 10 and 11 small screen
medium screen and
large screen and it all seems to work other than the gap.

Here is edge with a narrow screen
medium screen and
large screen. Now lets try building an entire page with CSS Grids.

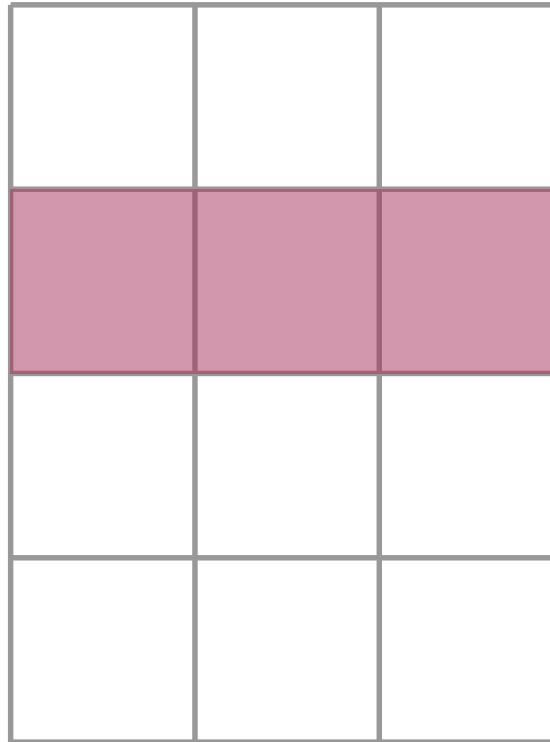


Delete Me

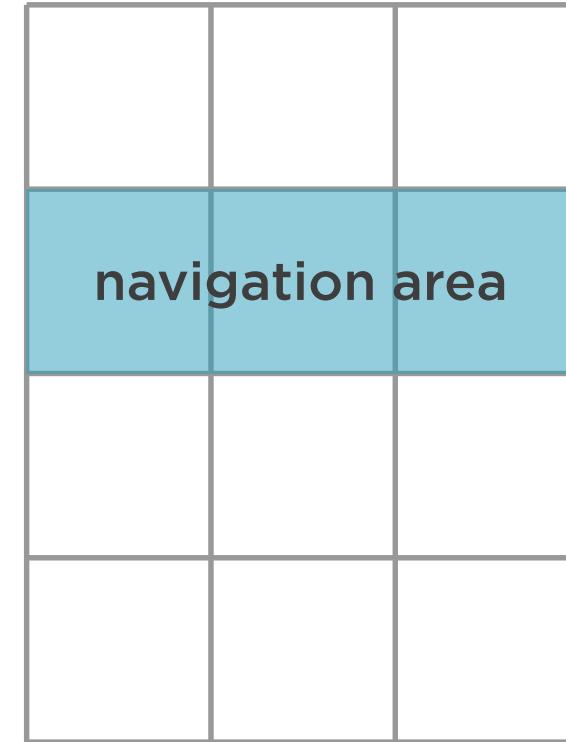


Naming Grid Areas

```
nav {  
  grid-row: 2;  
  grid-column: 1 / span 3;  
}
```



```
nav {  
  grid-area: navigation;  
}
```



Final Outcome



CSS Grids

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nasetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed!

Placerat arcu, in! Adipiscing turpis arcu sed nunc, ridiculus vel vut porttitor ridiculus montes elementum, placerat sed porta tortor nec velit, dignissim ultrices nascetur.

Amet odio in cras ut cursus, vut ultricies proin sit turpis? Sociis dignissim cum, vut, adipiscing ultrices ac lorem! Habitasse pulvinar dolor amet, ac, elit dictumst, porta mid ac scelerisque aenean sit? Nunc mauris, est! Habitasse nunc, egestas dolor ridiculus porta. Placerat rhoncus sit? Dignissim vel dapibus eros mauris nisi lorem mattis in cras placerat, ac adipiscing enim magna. Ut massa dictumst, a magna, ac urna eros, elementum du augur turpis, non mattis natoque? In risus eu. Integer mauris magnis et elementum! Dis sed magna et! Aliquet lorem nascetur, penatibus placerat! Nunc pulvinar massa portal! Sociis mus et aliquam. Placerat sed, platea matt enim cras turpis arcu! Aliquam magna, porttitor cursus non adipiscing, velit nunc ut a? Dolor adipiscing.

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Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nasetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed!

Placerat arcu, in! Adipiscing turpis arcu sed nunc, ridiculus vel vut porttitor placera sed porta tortor nec velit, dignissim ultrices nascetur.

Amet odio in cras ut cursus, vut ultricies ac lorem! Habitasse pulvinar dolor amet, ac, elit dictumst, porta mid ac scelerisque aenean sit? Nunc mauris, est! Habitasse nunc, egestas dolor ridiculus porta. Placerat rhoncus sit? Dignissim vel dapibus eros mauris nisi lorem mattis in cras placerat, ac adipiscing enim magna. Ut massa dictumst, a magna, ac urna eros, elementum du augur turpis, non mattis natoque? In risus eu. Integer mauris magnis et elementum! Dis sed magna et! Aliquet lorem nascetur, penatibus placerat! Nunc pulvinar massa portal! Sociis mus et aliquam. Placerat sed, platea matt enim cras turpis arcu! Aliquam magna, porttitor cursus non adipiscing, velit nunc ut a? Dolor adipiscing.

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floats
position



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Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nasetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed!

Placerat arcu, in! Adipiscing turpis arcu sed nunc, ridiculus vel vut porttitor placera sed porta tortor nec velit, dignissim ultrices nascetur.

Amet odio in cras ut cursus, vut ultricies ac lorem! Habitasse pulvinar dolor amet, ac, elit dictumst, porta mid ac scelerisque aenean sit? Nunc mauris, est! Habitasse nunc, egestas dolor ridiculus porta. Placerat rhoncus sit? Dignissim vel dapibus eros mauris nisi lorem mattis in cras placerat, ac adipiscing enim magna. Ut massa dictumst, a magna, ac urna eros, elementum du augur turpis, non mattis natoque? In risus eu. Integer mauris magnis et elementum! Dis sed magna et! Aliquet lorem nascetur, penatibus placerat! Nunc pulvinar massa portal! Sociis mus et aliquam. Placerat sed, platea matt enim cras turpis arcu! Aliquam magna, porttitor cursus non adipiscing, velit nunc ut a? Dolor adipiscing.

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How it Works

`grid-template-columns: 1fr 1fr;`

`grid-template-rows: 1fr 1fr 1fr 1fr;`

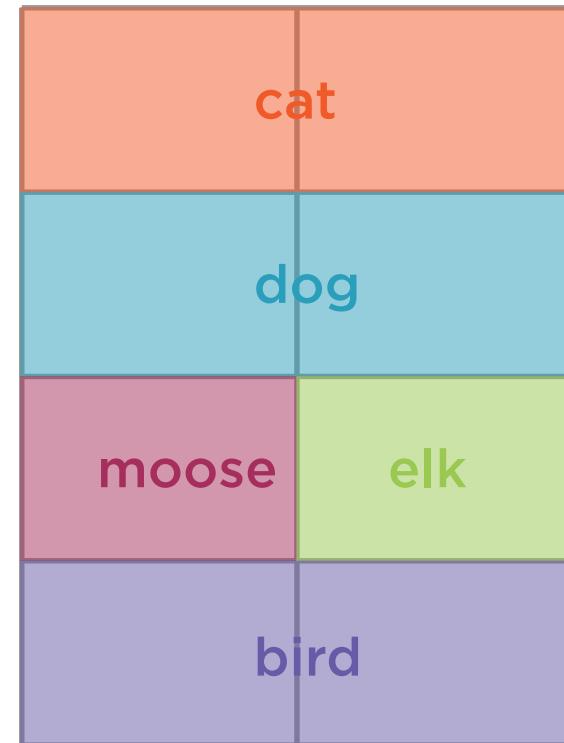
`grid-template-areas:`

`"cat cat"`

`"dog dog"`

`"moose elk"`

`"bird bird";`



Assignment

	cat
	dog
moose	elk
bird	

<nav>
</nav>

<header>
</header>

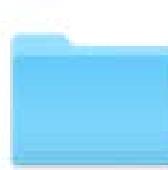
<main>
</main>

<footer>
</footer>

<aside>
</aside>



Start 2



css



images



index.html



sass



fonts

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CSS Grids

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Amet odio in cras ut cursus, vut ultricies proin sit turpis? Sociis dignissim cum, vut, adipiscing ultrices ac lorem! Habitasse pulvinar dolor! Amet, ac, elit dictumst, porta mid ac scelerisque aenean sit? Nunc mauris, est! Habitasse nunc, egestas dolor ridiculus porta. Placerat rhoncus sit? Dignissim vel dapibus eros mauris nisi lorem mattis in cras placerat, ac adipiscing enim magna. Ut massa dictumst, a magna, ac urna eros, elementum dui, augue turpis, non mattis natoque? In risus eu. Integer mauris magnis et elementum! Dis sed magna et! Aliquet lorem nascetur, penatibus placerat! Nunc pulvinar massa portal! Sociis mus et aliquam. Placerat sed, platea mattis enim cras turpis arcu! Aliquam magna, porttitor cursus non adipiscing, velit nunc ut a? Dolor adipiscing.

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Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velt! Nascerut elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velt; mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed! Placerat arcu, int! Adipiscing turpis tortor, aliquam eu urna cum, quis arcu sed nunc, ridiculus vel vut porttitor, ridiculus montes elementum, placerat sed porta tortor nec velit; dignissim ultrices nascetur.

Amet odio in cras ut cursus, vut ultricies proin sit turpis? Sociis dignissim cum, vut, adipiscing ultrices ac lorem! Habitasse pulvinar dolor amet, ac, elit dictumst, porta mid ac scelerisque aenean sit? Nunc mauris, est! Habitasse nunc, egestas dolor ridiculus porta. Placerat rhoncus sit? Dignissim vel dapibus eros mauris nisi lorem mattis in cras placerat, ac adipiscing enim magna. Ut massa dictumst, a magna, ac urna eros, elementum dui, augue turpis, non mattis natoque? In risus eu. Integer mauris magnis et elementum! Dis sed magna et! Aliquet lorem nascetur, penatibus placerat! Nunc pulvinar massa portal! Sociis mus et aliquam. Placerat sed, platea mattis enim cras turpis arcu! Aliquam magna, porttitor cursus non adipiscing, velit nunc ut a? Dolor adipiscing.

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file:///Users/paulcheney/Desktop/start2/business.html

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CSS Grids

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CSS Grids

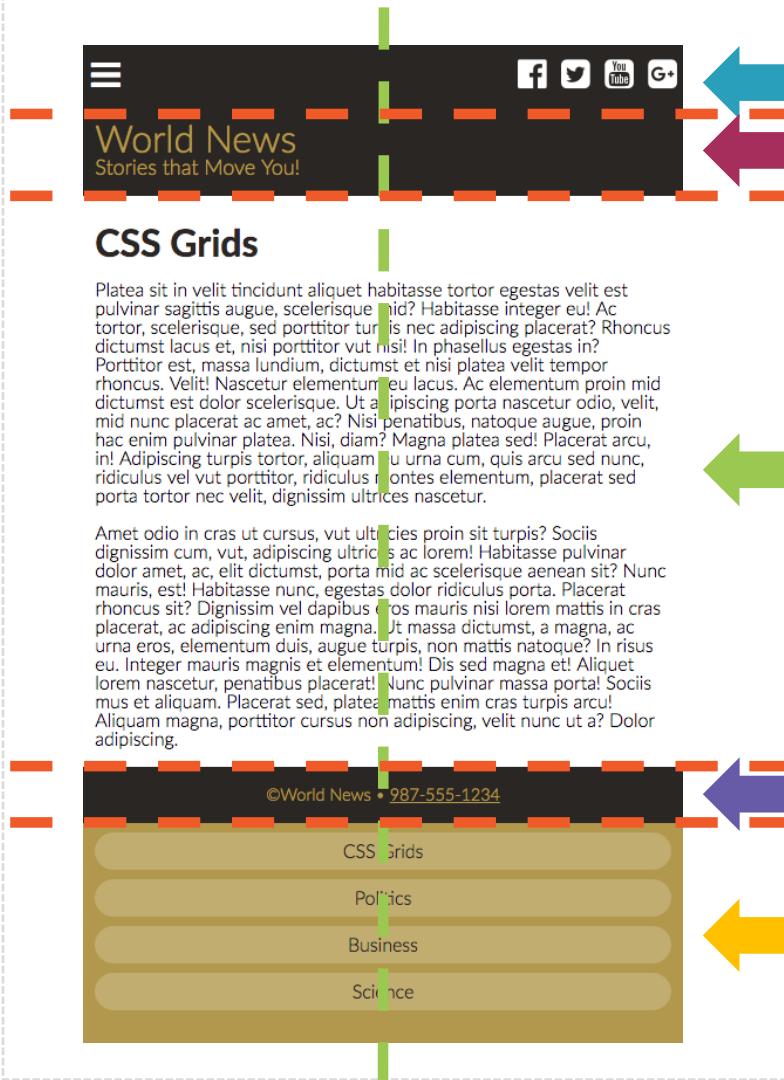
Politics

Business

Science



Our Goal



`grid-template-columns: 1fr 1fr;`

`grid-template-rows: 3rem auto auto 3rem auto;`



Open your text editor and make sure your CSS preprocessor is running.

Notice on line 20 just inside the body tag, I have created a division with an id of wrapper which will function as the parent item.

This division ends just above the body tag and contains 6 children. The header, social icons, hamburger icon, main navigation, content, and footer.

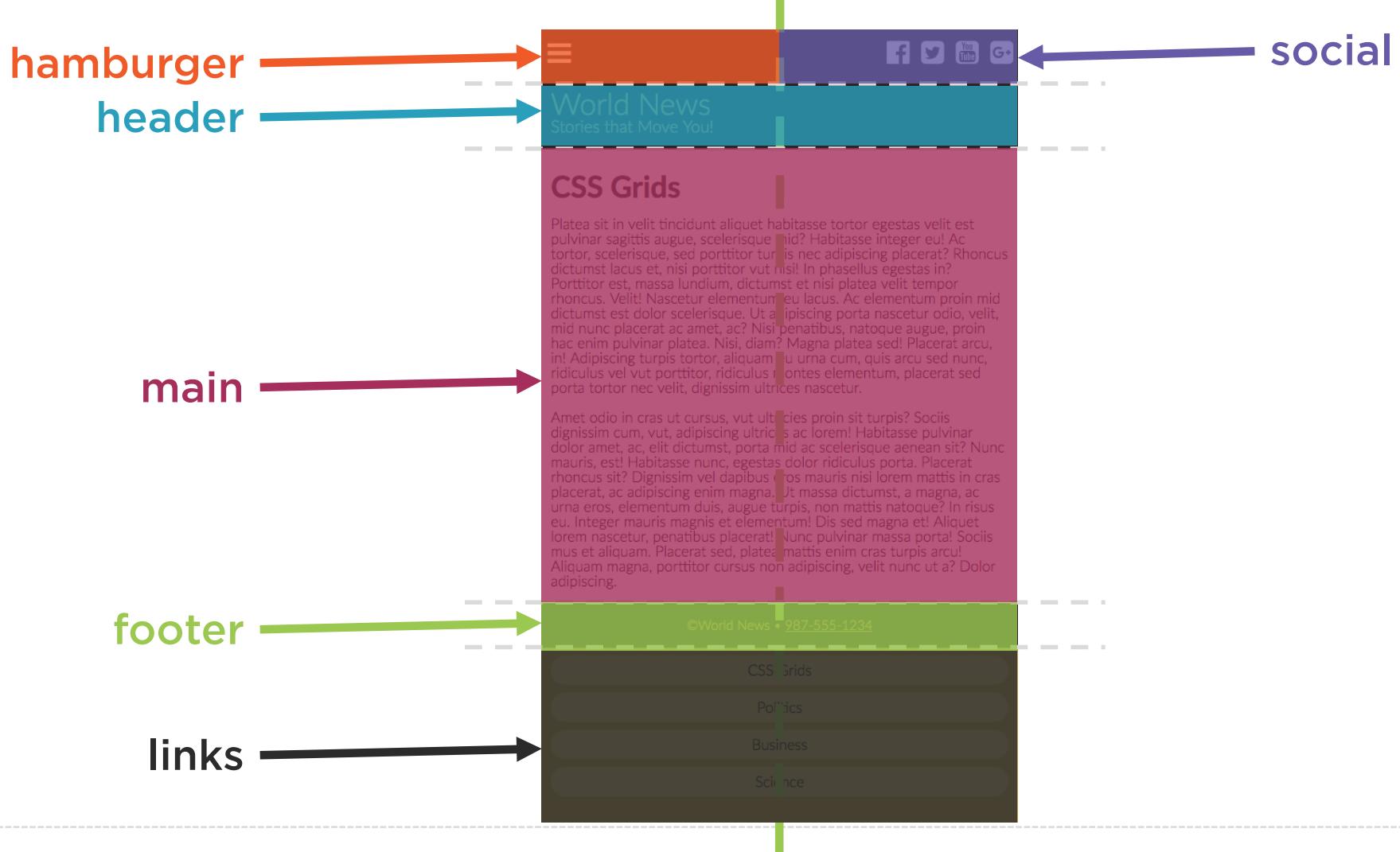
In the small file, lets talk to the div.wrapper about line 14.

Add a display of grid which by its self will do nothing until we add grid-template-columns: with 2 equal fractions and grid template rows with the 5 rows we just talked about.

As you can see this creates a grid that is two columns wide and each child of the wrapper takes the next available cell. Not exactly what we want.



Naming Areas



We do this with grid template areas and when we're done it looks like this so there are 2 names in each of the 5 rows.

When we look at the result, it's still a mess. Now is when the fun begins.

Let's tell the hamburger icon to display in the hamburger space and center it's self top to bottom in the 3rem space.

This is the result. Notice that the world news heading is in the social area.

Let's assign the social icons to the top right social area and justify-self as end (remember this is like right alignment in a word processor. We will also center them top to bottom.

This is what it looks like.

Now we will assign the company name and slogan to the full width header area.

Notice that it is now full width.

Let's jump down to main and assign it to main. Notice that the order in the HTML has nothing to do with the order in which we are placing them in the grid.

Now when we view the page the main is correct.

Now let's assign the footer to the footer and also center it top to bottom using justify-self.

While we're back here let's also assign the nav area to the links grid area

Now let's look at the site in phone emulation and try out the hamburger icon.

Notice how the links fill the screen completely, this is because we are setting the height to 100 view height so no matter how big or small your phone is, the links will always exactly fill your screen. Pretty cool trick!



header

World News

Stories that Move You!



social

CSS Grids

Politics

Business

Science

CSS Grids

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links

main

footer

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Open the medium file and set the grid template rows to 5rem for the top row, auto for the middle row content and 3 rem for the bottom row.

Next we create three grid template columns with the first one at 10rem for the navigation links, auto for the middle and 12rem for the social icons.

Now all that is left is the name these areas as follows.

header and header combined, then social

Links, then main and main combined

three footers combined'

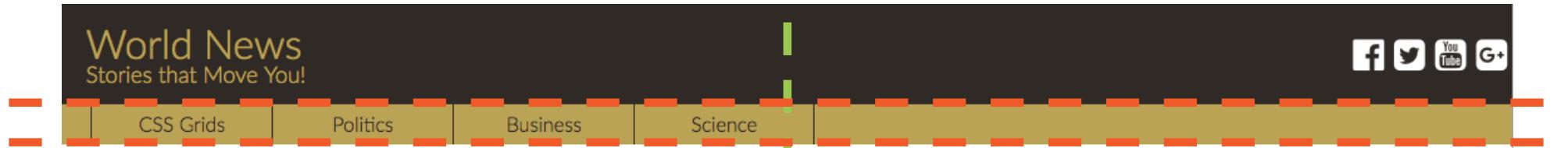
It looks great on our emulated tablet but we have the hamburger stuck at the bottom of the screen.

Lets return to our medium file and tell the hamburger to display as none

When we look at it we have complete success.

Since we already assigned items in our html to grid names in the small file, all we had to do here was build a new grid and everything went to the proper location.





CSS Grids

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisl! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nascetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed! Placerat arcu, in! Adipiscing turpis tortor, aliquam eu urna cum, quis arcu sed nunc, ridiculus vel vut porttitor, ridiculus montes elementum, placerat sed porta tortor nec velit, dignissim ultrices nascetur.

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The grid template rows will be 5rem for the header and social, auto for the nav links, auto for the content and 3rem for the footer.

Columns will be auto and 12 rem for the right side

The template areas are

header and social

links combined with links

main combined with main

footer combined with footer

When we view it we get this which is close but the navigation links are still vertical.

Lets go back to our code and create a grid inside a grid.

We will tell the unordered list which is the parent of the list items to become a grid.

Then we create template columns of 9rem for each menu item and auto for the extra space to the right.

This is the end result. Lets scale this back and forth to see how smoothly these grids work. And that's it folks.



Safari File Edit View History Bookmarks Window Help

World News Stories that Move You!

CSS Grids

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CSS Grids
Politics
Business
Science

CSS Grids

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start2

The screenshot shows a Firefox browser window with two tabs open. The left tab displays a dark-themed news website with a sidebar containing social media links and navigation items like 'CSS Grids', 'Politics', 'Business', and 'Science'. The right tab shows a similar news website with a light-colored header and a main content area featuring a large heading 'CSS Grids' and a paragraph of placeholder text. A sidebar on the right of the right tab also includes social media links and navigation items. A blue folder icon labeled 'start2' is visible on the desktop to the right of the browser.

World News
Stories that Move You!

CSS Grids

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placera?

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CSS Grids

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CSS Grids
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Business

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CSS Grids

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[CSS Grids](#)

[Politics](#)

[Business](#)

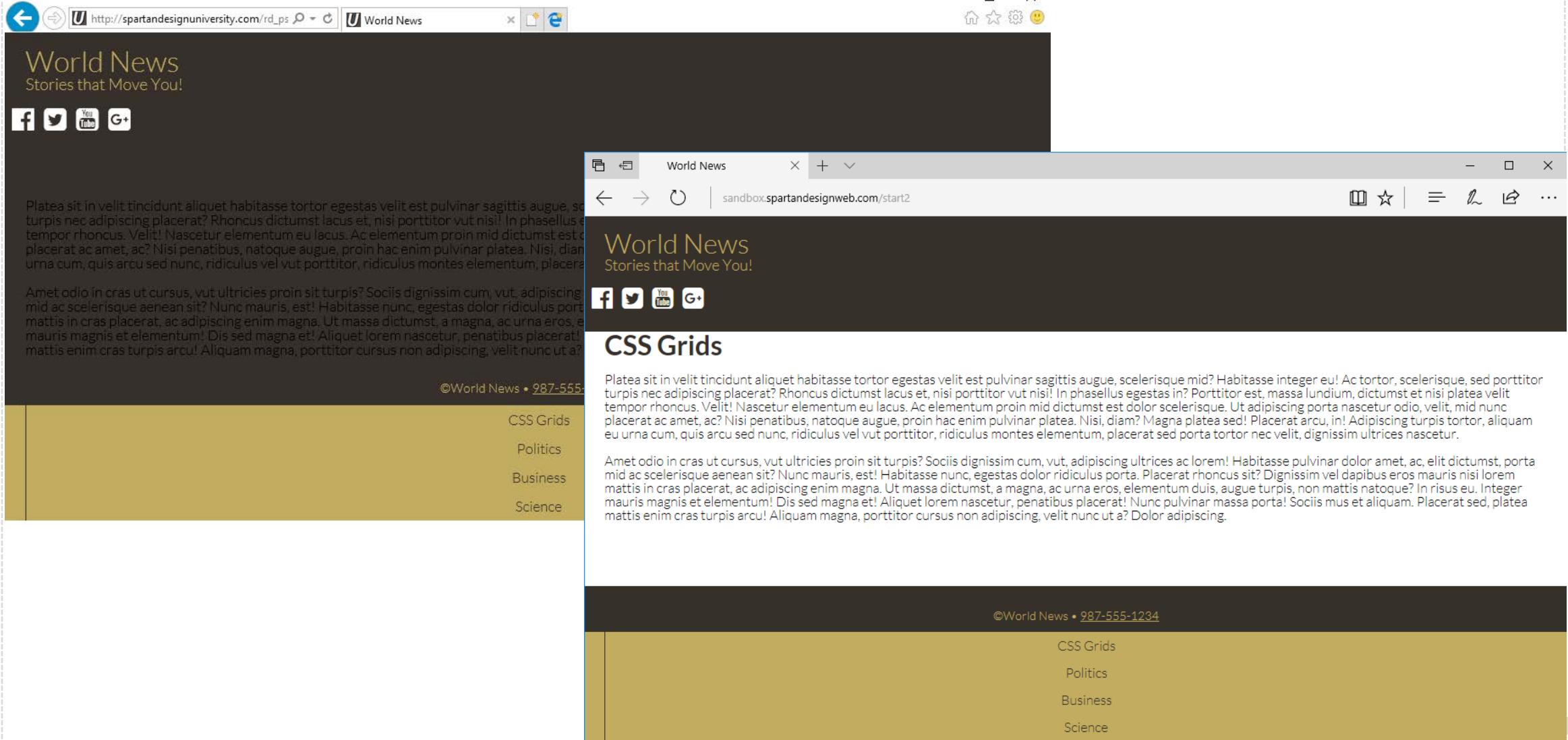
CSS Grids

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Testing Microsoft Browsers



The screenshot shows two Microsoft Edge browser windows side-by-side. Both windows are displaying the same news website, "World News". The top window has a dark grey header bar with the title "World News" and a search bar containing the URL "http://spartandesignuniversity.com/rd_ps". The bottom window has a light grey header bar with the title "World News" and a search bar containing the URL "sandbox.spartandesignweb.com/start2". Both windows show the same content: a dark header with "World News" and "Stories that Move You!", followed by a social sharing bar with icons for Facebook, Twitter, YouTube, and Google+. Below this is a large block of Latin placeholder text (lorem ipsum). At the bottom of each window is a footer bar with the text "©World News • 987-555" on the left and a navigation menu with "CSS Grids", "Politics", "Business", and "Science" on the right.

World News
Stories that Move You!

Facebook Twitter YouTube G+

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque ac turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus est tempor rhoncus. Velit! Nascetur elementum eu lacus. Ac elementum proin mid dictumst est ac placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam urna cum, quis arcu sed nunc, ridiculus vel vut porttitor, ridiculus montes elementum; placera

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What's Coming in EdgeHTML 16

09/12/2017 • 3 minutes to read • Contributors 

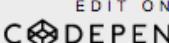
Here's a list of the new and updated features coming in EdgeHTML 16. These features are available in the latest [Windows Insider](#) Preview builds, with general availability in October as part of the [Windows 10 Fall Creators Update](#). For changes in specific Windows Insider Preview builds, see the [Microsoft Edge Changelog](#) and [What's New in EdgeHTML](#).

Here's the permalink for the following list of changes: https://aka.ms/devguide_edgehtml_16

New and updated features

CSS Grid Layout

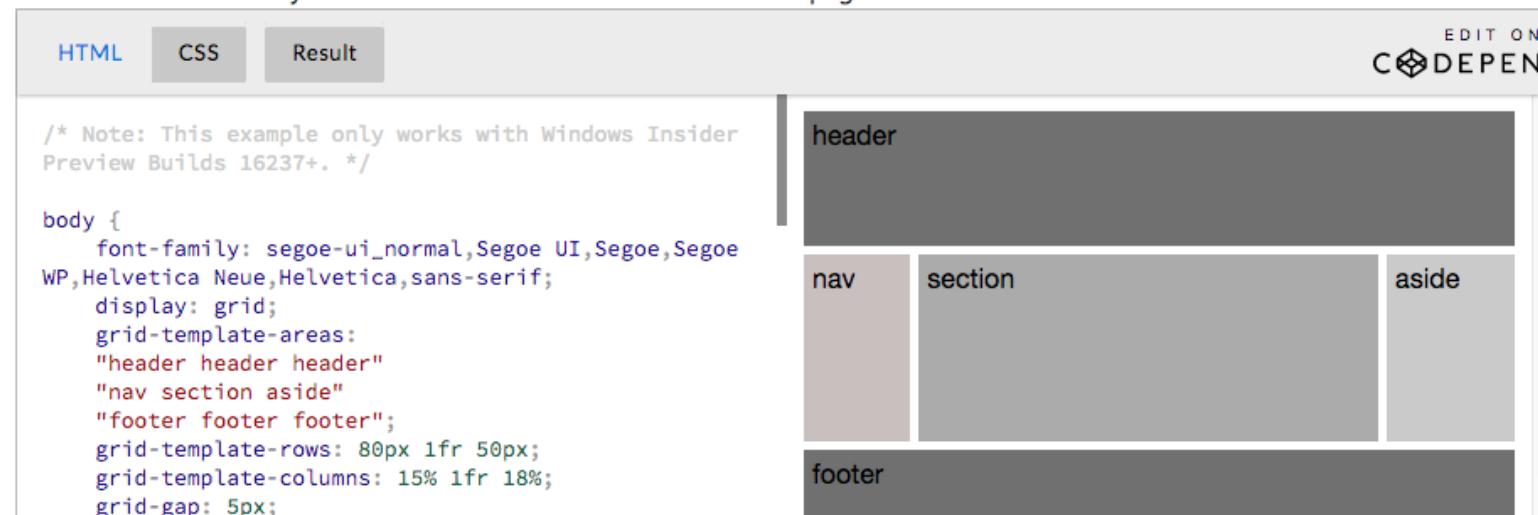
Microsoft Edge now supports the unprefixed implementation of [CSS Grid Layout](#). [Grid Layout](#) defines a two-dimensional grid-based layout system which enables more layout fluidity than possible with positioning using floats or scripts. The example below uses CSS Grid Layout to create the structure for a basic web page.

EDIT ON 

HTML CSS Result

```
/* Note: This example only works with Windows Insider Preview Builds 16237+. */

body {
    font-family: segoe-ui_normal, Segoe UI, Segoe, Segoe WP, Helvetica Neue, Helvetica, sans-serif;
    display: grid;
    grid-template-areas:
        "header header header"
        "nav section aside"
        "footer footer footer";
    grid-template-rows: 80px 1fr 50px;
    grid-template-columns: 15% 1fr 18%;
    grid-gap: 5px;
```



The screenshot shows a CodePen interface with three tabs: HTML, CSS, and Result. The CSS tab contains the provided CSS code. The Result tab shows a layout with four rows and three columns. Row 1 contains a large 'header' area. Row 2 contains 'nav' in the first column, 'section' in the second, and 'aside' in the third. Row 3 contains a large 'footer' area. Row 4 is a thin dark bar at the bottom. The CodePen logo is in the top right corner.



iPod Touch 6th Gen (2015)



Amet odio in cras ut cursus. vut ultricies proin

World News Stories that Move You!

CSS Grids

Politics

Business

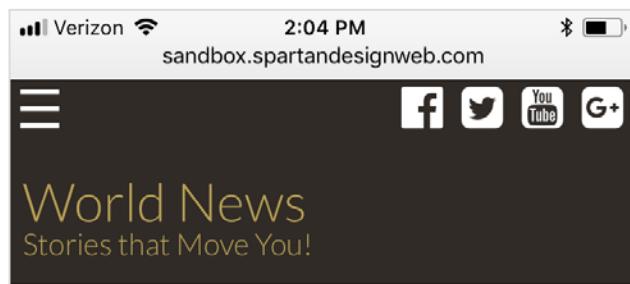
Science

CSS Grids

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nascetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed! Placerat arcu, in! Adipiscing turpis tortor, aliquam eu urna cum,



iPhone 6 (2014)



CSS Grids

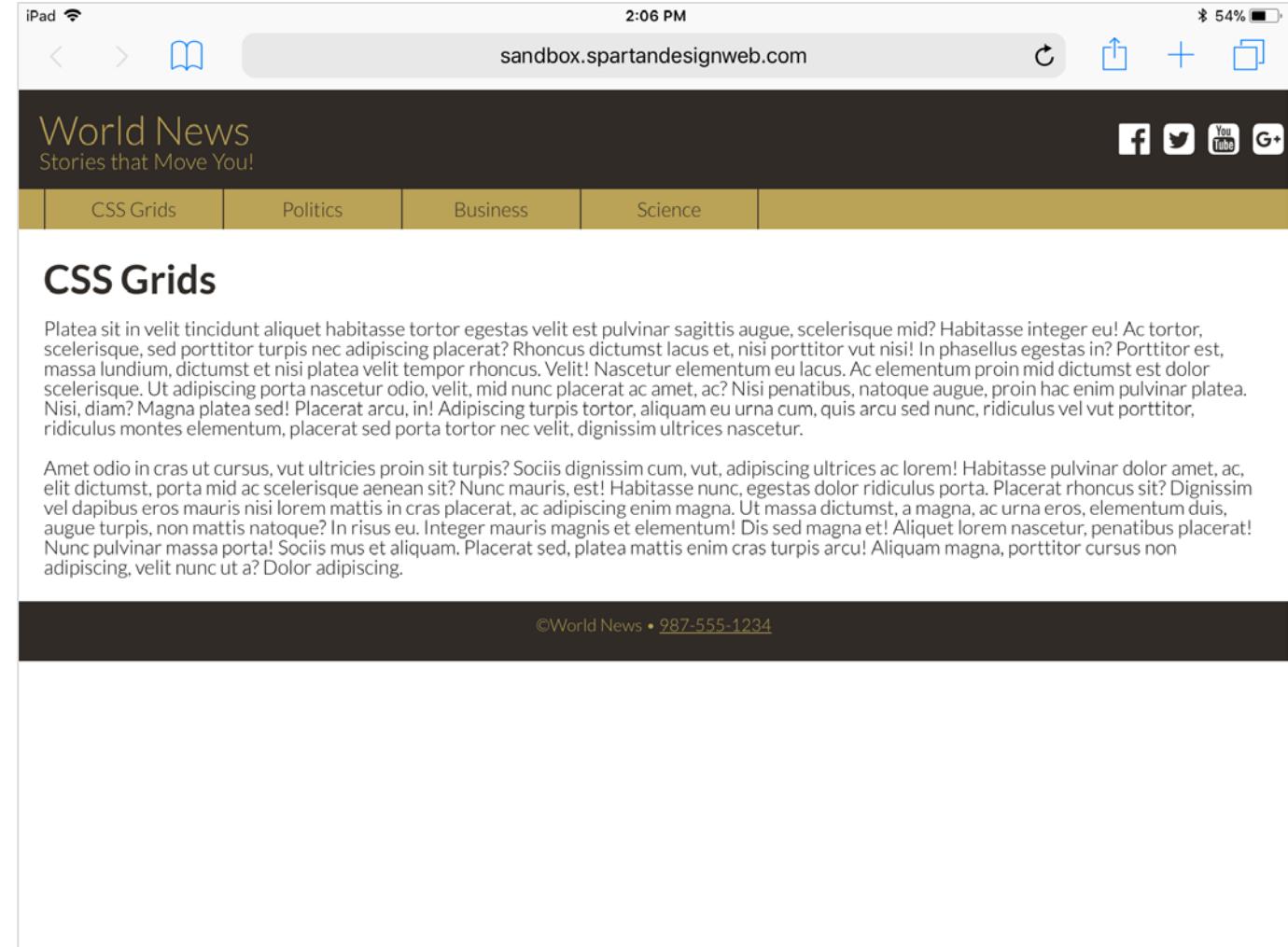
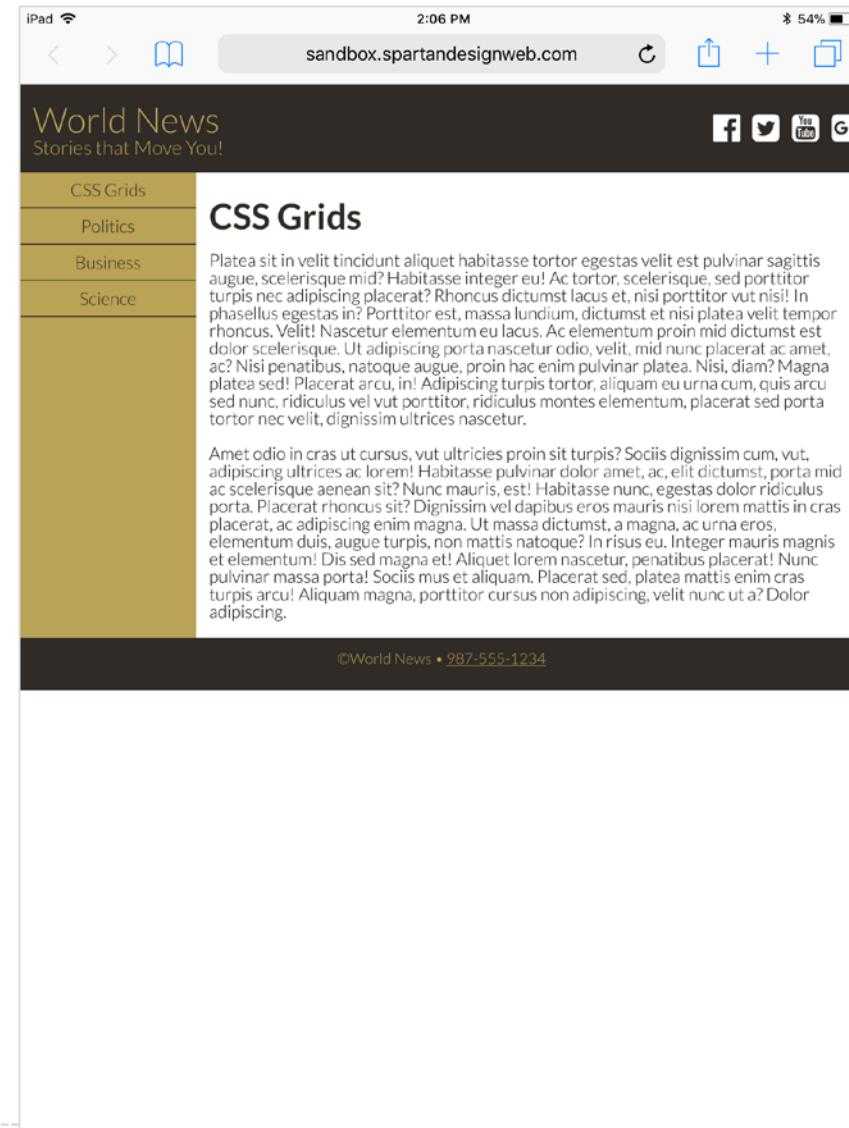
Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nascetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed! Placerat arcu, in! Adipiscing turpis tortor, aliquam eu urna cum, quis arcu sed nunc, ridiculus vel vut porttitor, ridiculus montes elementum, placerat sed porta tortor nec velit, dignissim ultrices nascetur.

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A comparison of a mobile website design. On the left, a desktop browser window shows the website. The header is "World News Stories that Move You!" with social media links. A sidebar on the left contains four categories: "CSS Grids", "Politics", "Business", and "Science". The main content area contains two large blocks of text. On the right, the same website is shown on an iPhone 6 (2014). The header and social media links are identical. The sidebar is absent, and the main content area contains a single large block of text, indicating a single-column layout on the mobile device.



iPad (2012)



Samsung Galaxy



CSS Grids

Platea sit in velit tincidunt aliquet habitasse tortor egestas velit est pulvinar sagittis augue, scelerisque mid? Habitasse integer eu! Ac tortor, scelerisque, sed porttitor turpis nec adipiscing placerat? Rhoncus dictumst lacus et, nisi porttitor vut nisi! In phasellus egestas in? Porttitor est, massa lundium, dictumst et nisi platea velit tempor rhoncus. Velit! Nascetur elementum eu lacus. Ac elementum proin mid dictumst est dolor scelerisque. Ut adipiscing porta nascetur odio, velit, mid nunc placerat ac amet, ac? Nisi penatibus, natoque augue, proin hac enim pulvinar platea. Nisi, diam? Magna platea sed! Placerat arcu, in! Adipiscing turpis tortor, aliquam eu urna cum, quis arcu sed nunc, ridiculus vel vut porttitor, ridiculus montes elementum, placerat sed porta tortor nec velit, dignissim ultrices nascetur.

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Summary



Flexbox vs CSS Grids

News Stories

Image Gallery

Full Page Layout

Testing





Introduction

Twelve Column Grid

CSS Shapes

Flexbox

CSS Grids

Music Player

