

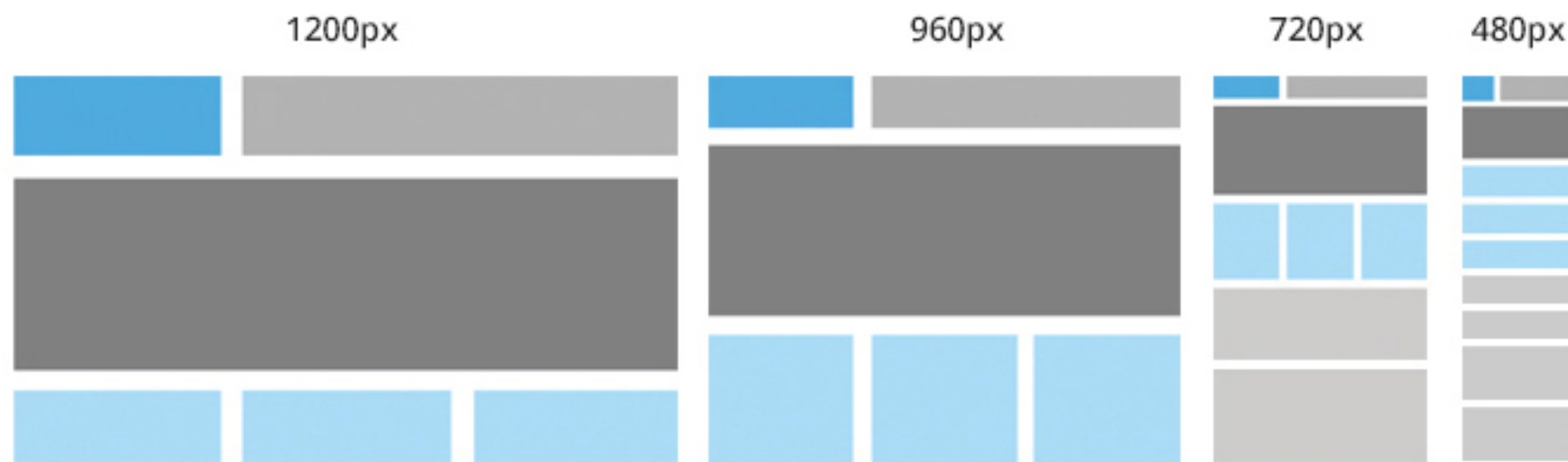
# Responsive Web Design

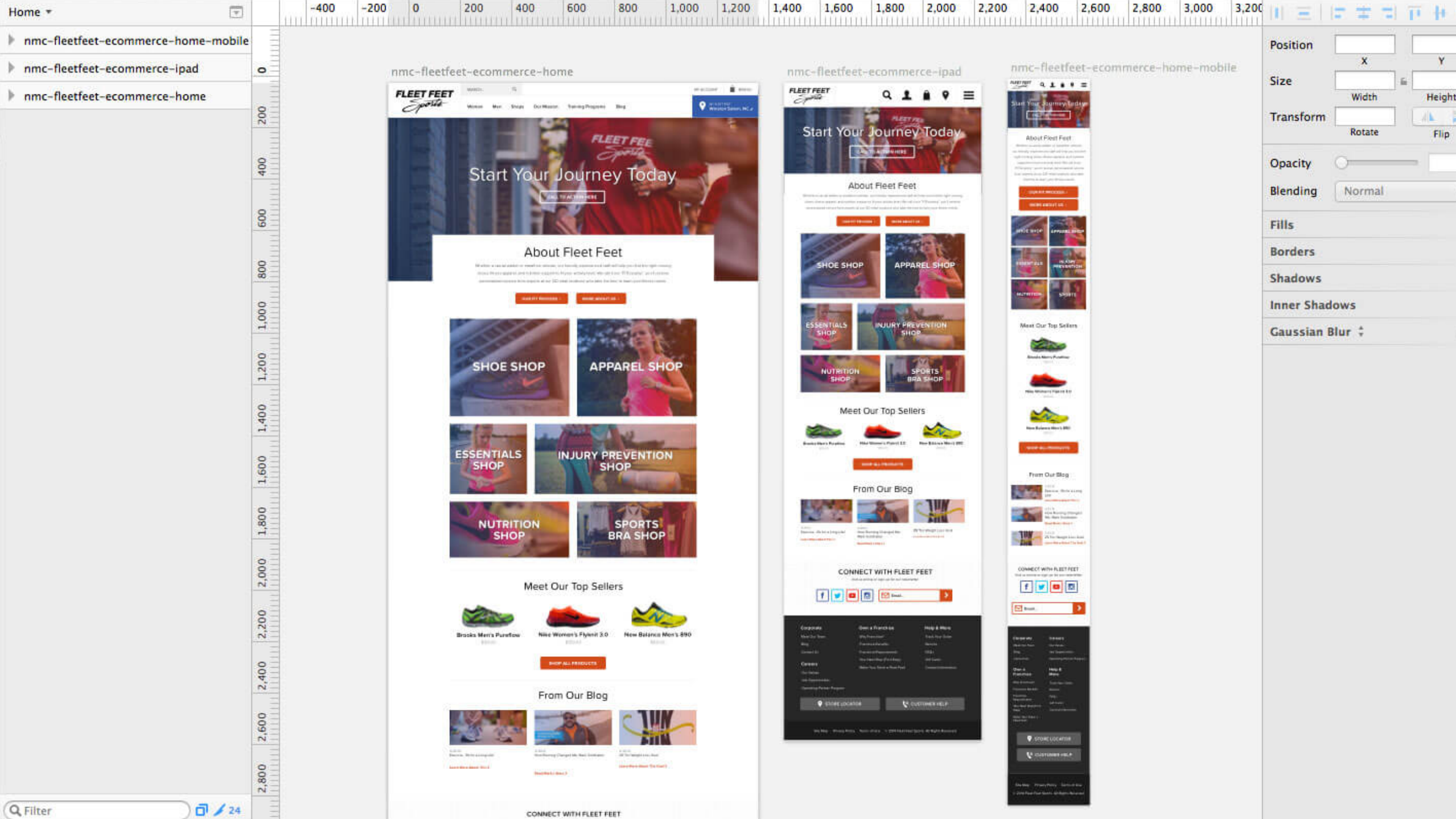
반응형 웹

# Responsive Web Design

Mobilizing Your Website with RWD Project Key Point Guide, HTML5, CSS3

데스크탑에서 모바일 기기까지 각각 다른 다양한 해상도의 디바이스에 맞춰 웹사이트의 레이아웃이 동적으로 변환되면서 텍스트, 이미지 및 UI가 최적화되어 보여지도록 하는 기법



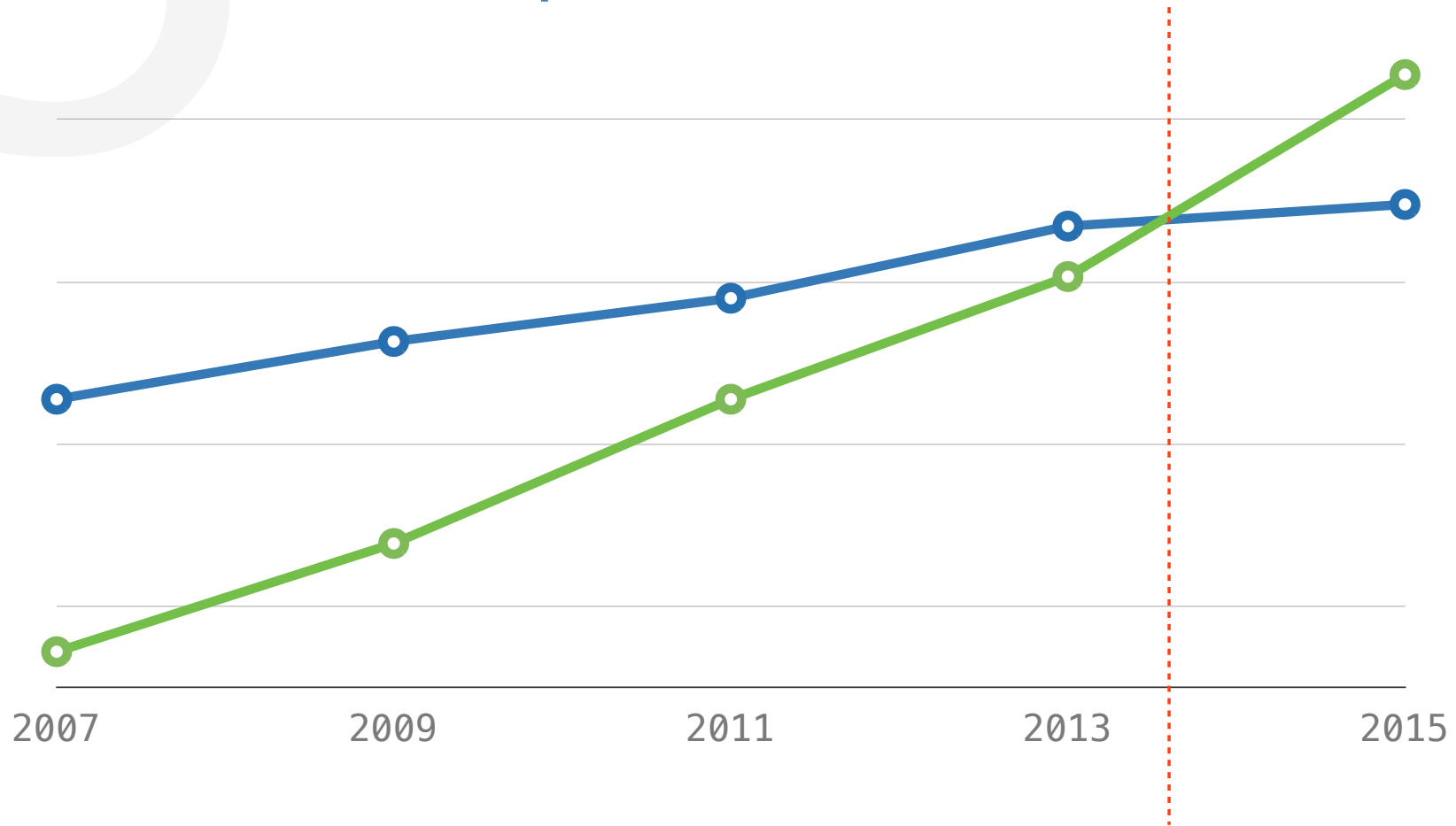


CURRENT

Desktop First



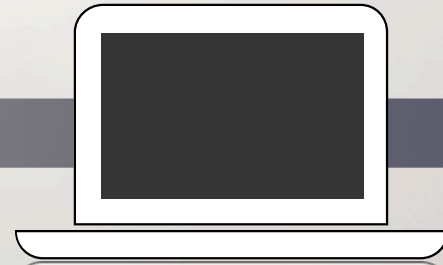
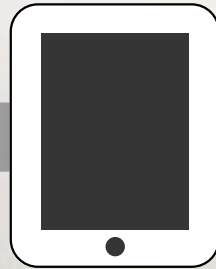
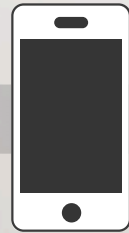
# Mobile vs Desktop

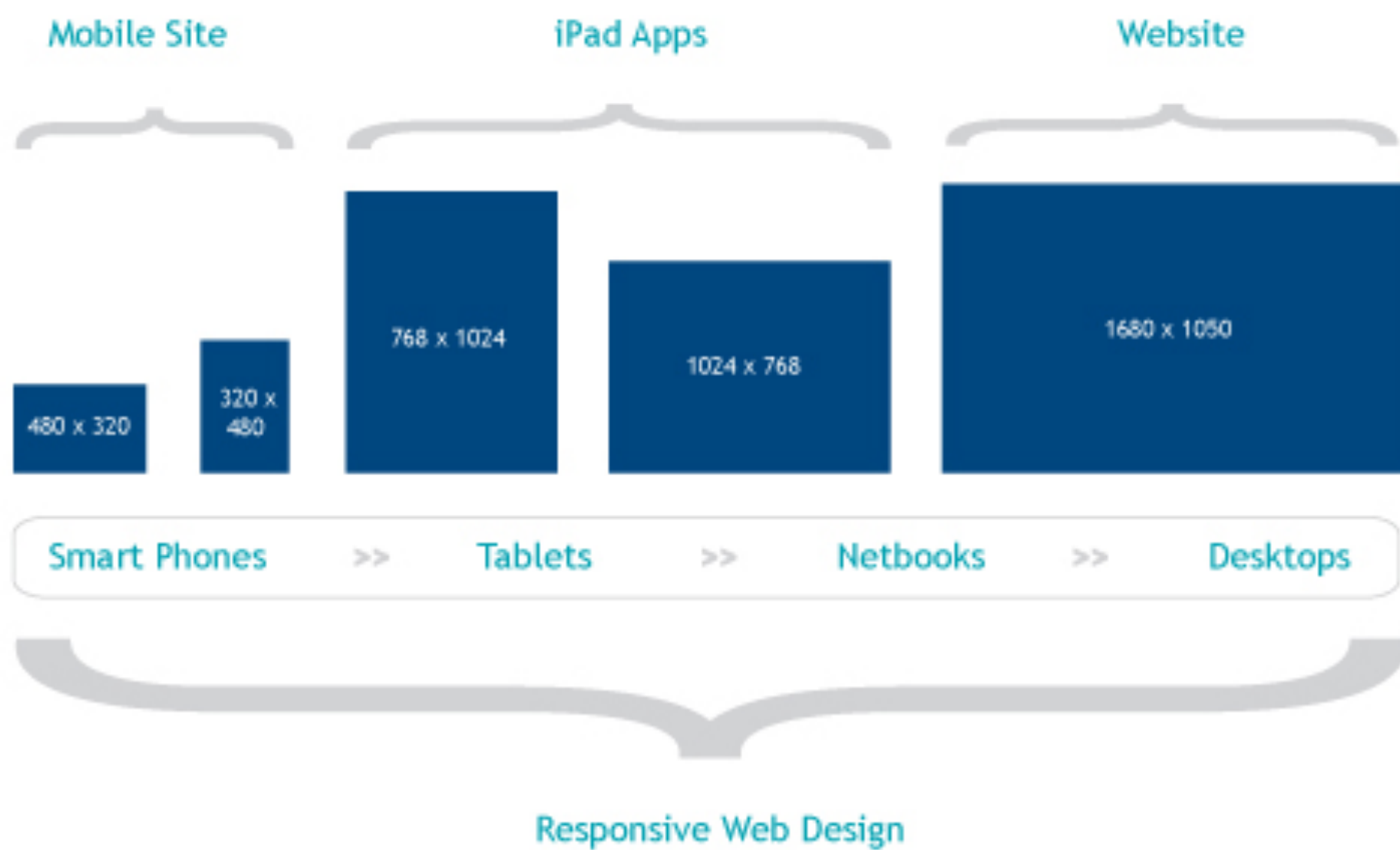




NEXT

# Mobile First

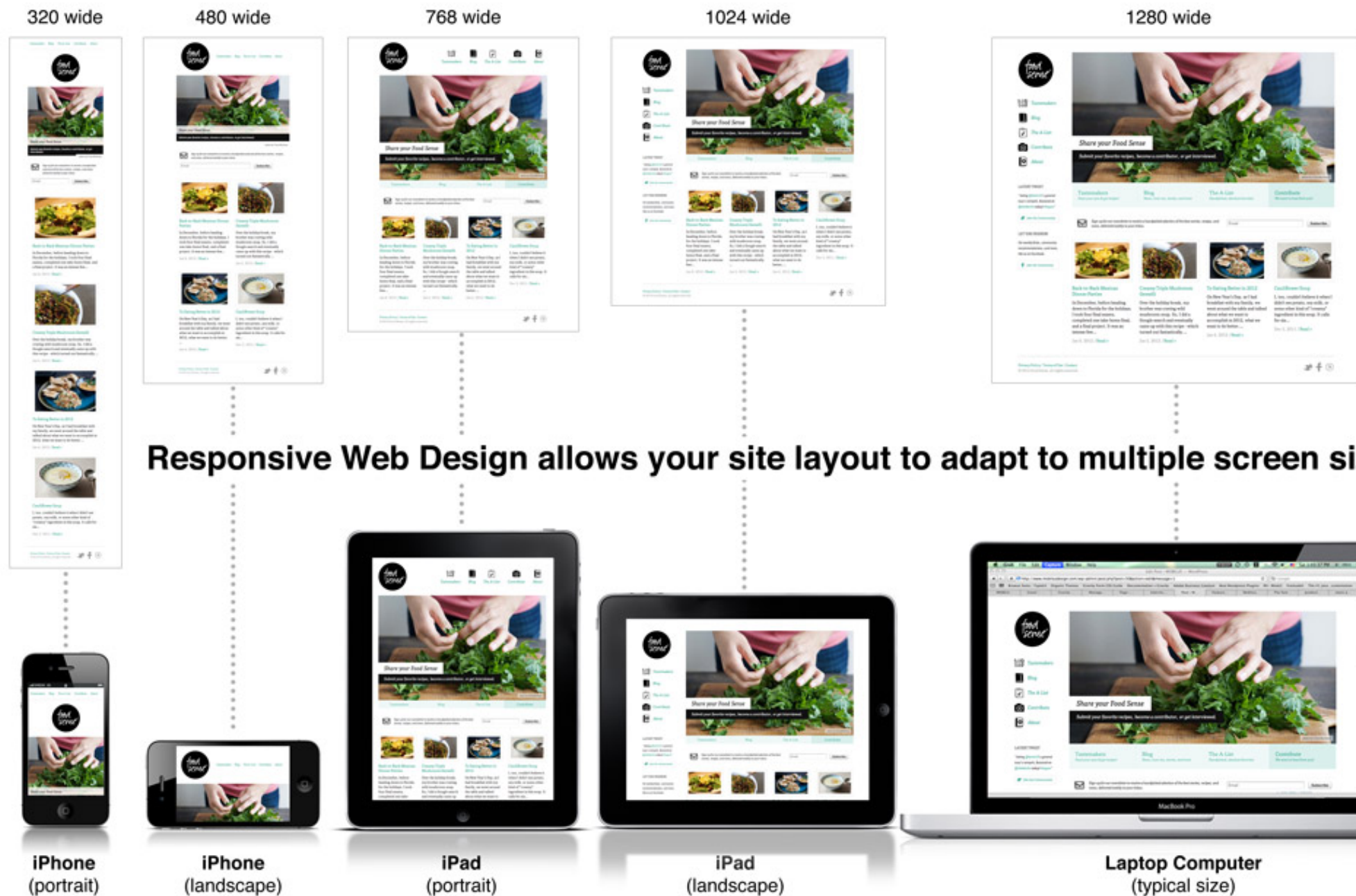


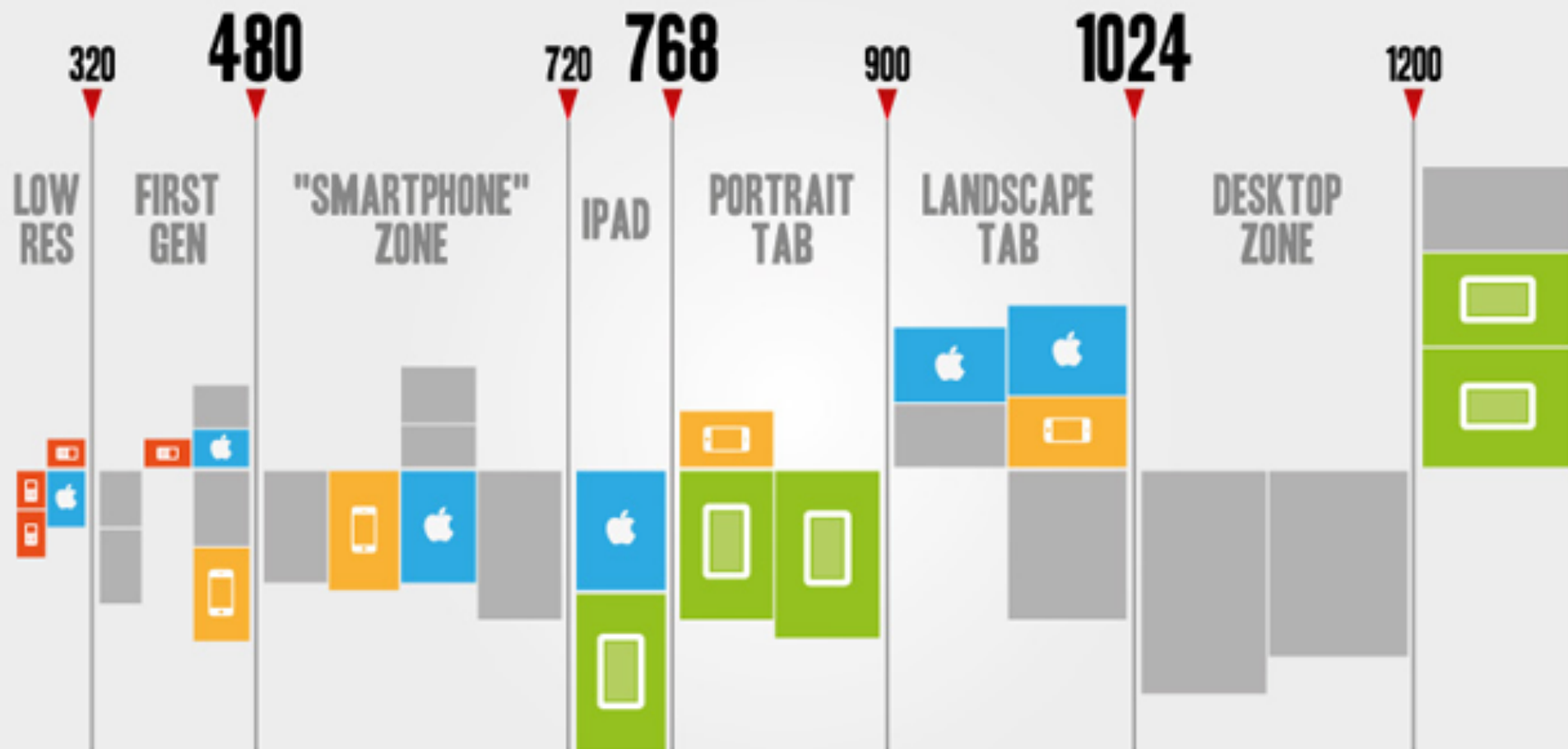












- 3 **major breaks** : 480 / 768 / 1024
- 3 **minor breaks** : 320 / 720 / 900
- Desktop limit is around 1024px

<http://www.troy.labs.daum.net>

모바일 기기 크기파악

<https://mediaqueri.es/>

반응형 웹페이지 제작 예시 페이지

Phones 4-5"  
Phones 5-7"

Tablets  
Hybrid Tablet/Desktops

Desktops

Small  
320-475px

Medium  
480-639px

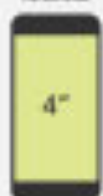
Large  
640-923px

X-Large  
1024-1365px

XX-Large  
1366-1920px

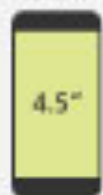
XXX-Large  
1920-2559px

iPhone 5c, 5s  
320x568



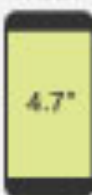
4"

Nokia Lumia 1020  
384x640



4.5"

iPhone 6  
375x667



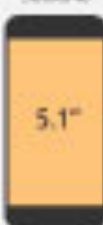
4.7"

Nokia Lumia 830  
360x640



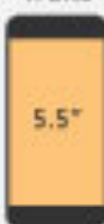
5"

Samsung Galaxy S5  
360x640



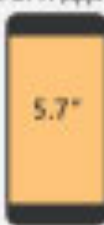
5.1"

iPhone 6 Plus  
414x736



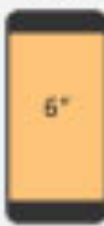
5.5"

Samsung Galaxy Note 4  
424x768 (approx)



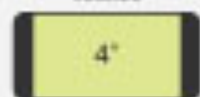
5.7"

Nokia Lumia 1520  
360x640



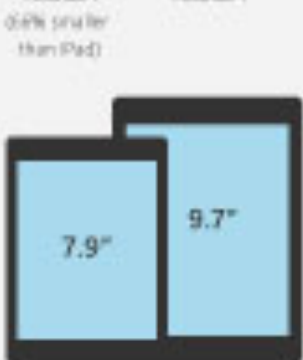
6"

iPhone 5c, 5s  
568x320



4"

iPad Mini  
768x1024  
0.6% smaller than iPad



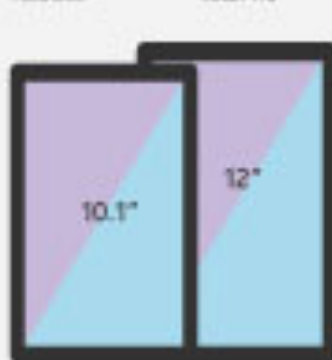
7.9"

iPad  
768x1024



9.7"

Surface  
768x1024



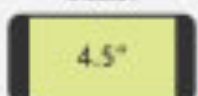
10.1"

Surface Pro 3  
960x1440



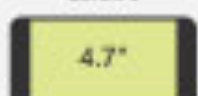
12"

Nokia Lumia 1020  
640x384



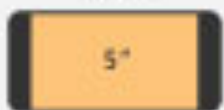
4.5"

iPhone 6  
667x375



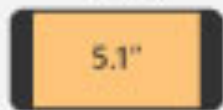
4.7"

Nokia Lumia 830  
640x360



5"

Samsung Galaxy S5  
640x360



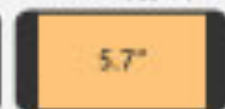
5.1"

iPhone 6 Plus  
736x414



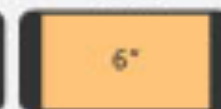
5.5"

Samsung Galaxy Note 4  
744x424 (approx)



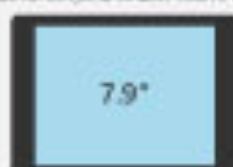
5.7"

Nokia Lumia 1520  
640x360



6"

iPad Mini  
824x516 (30% smaller than iPad)



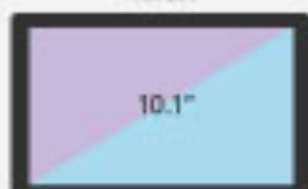
7.9"

iPad  
824x516



9.7"

Surface Pro  
768x1024



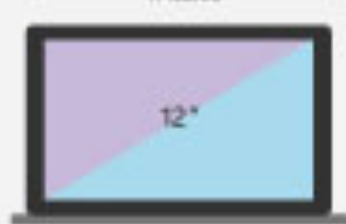
10.1"

12" MacBook Pro Retina  
1280x800



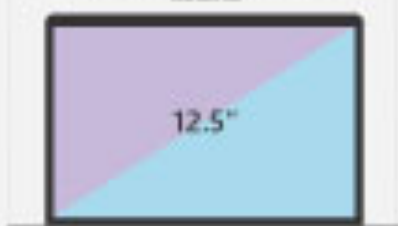
13"

Surface Pro 3  
1440x960



12"

ThinkPad X240 Ultrabook Laptop  
1366x768



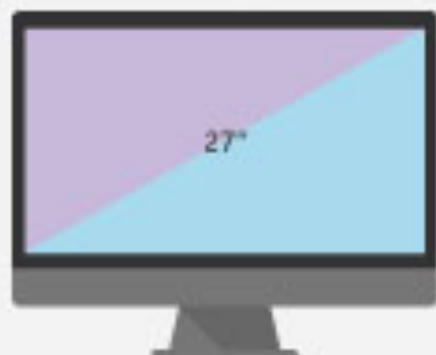
12.5"

LG Flatron E2350V  
1920x1080



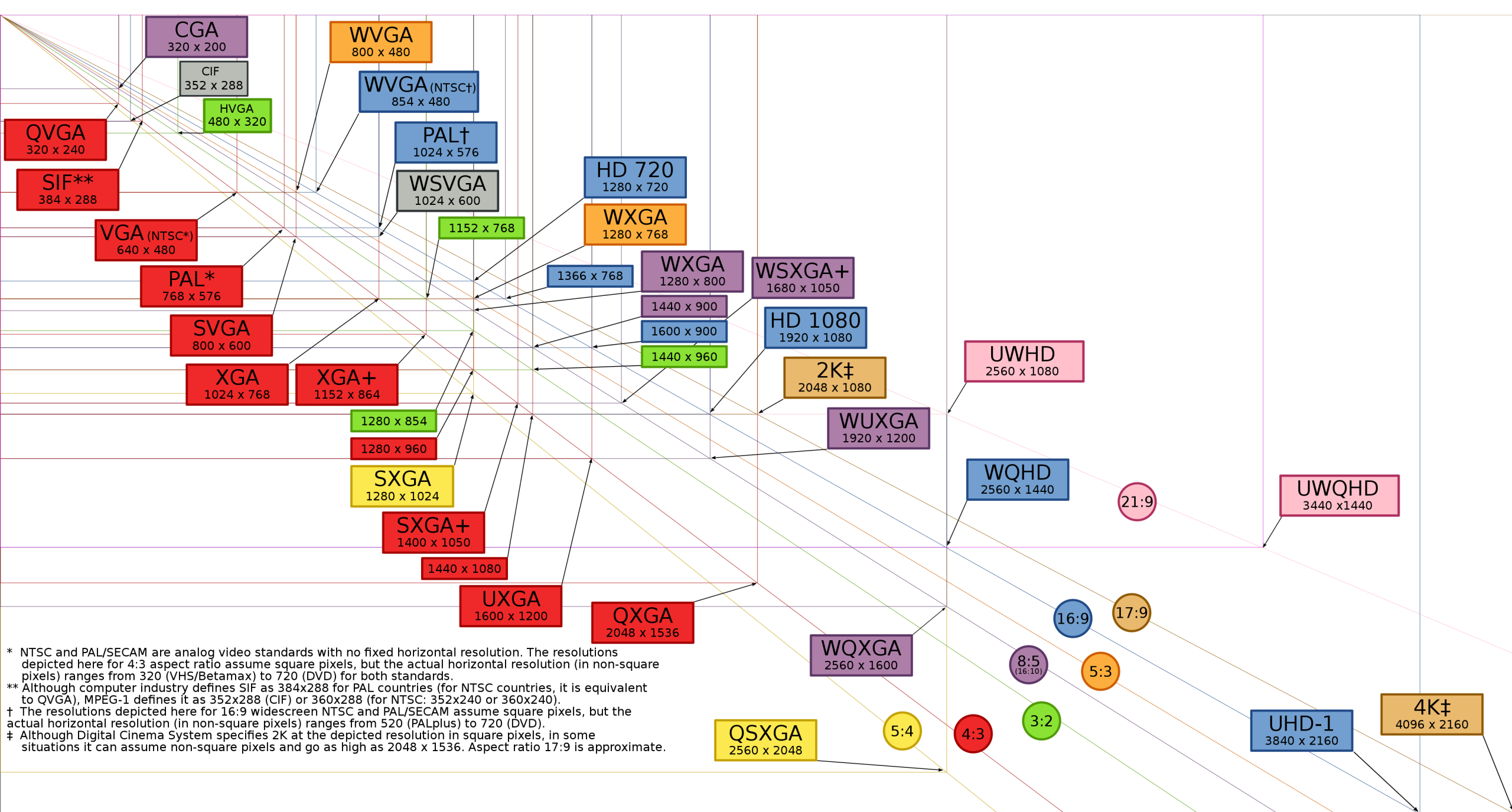
23"

XXX-Large  
2560px and +



27"

HP Z1 G2  
2560x1440





# Getting started

An overview of Bootstrap, how to download and use, basic templates and examples, and more.



Become an engineer - join MakerSquare's 12-week immersive JavaScript classes.

ads via Carbon

## Download

Bootstrap (currently v3.3.5) has a few easy ways to quickly get started, each one appealing to a different skill level and use case. Read through to see what suits your particular needs.

### Bootstrap

Compiled and minified CSS, JavaScript, and fonts. No docs or original source files are included.

Download Bootstrap

### Source code

Source Less, JavaScript, and font files, along with our docs. Requires a Less compiler and some setup.

Download source

### Sass

Bootstrap ported from Less to Sass for easy inclusion in Rails, Compass, or Sass-only projects.

Download Sass

## Bootstrap CDN

The folks over at [MaxCDN](#) graciously provide CDN support for Bootstrap's CSS and JavaScript. Just use these Bootstrap CDN links.

```
<!-- Latest compiled and minified CSS -->
<link rel="stylesheet"
href="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.5/css/bootstrap.min.css">

<!-- Optional theme -->
<link rel="stylesheet" href="https://maxcdn.bootstrapcdn.com/bootstrap/3.3.5/css/bootstrap-
theme.min.css">
```

Copy

Download

What's included

Compiling CSS and JavaScript

Basic template

Examples

Tools

Community

Disabling responsiveness

Migrating from 2.x to 3.0

Browser and device support

Third party support

Accessibility

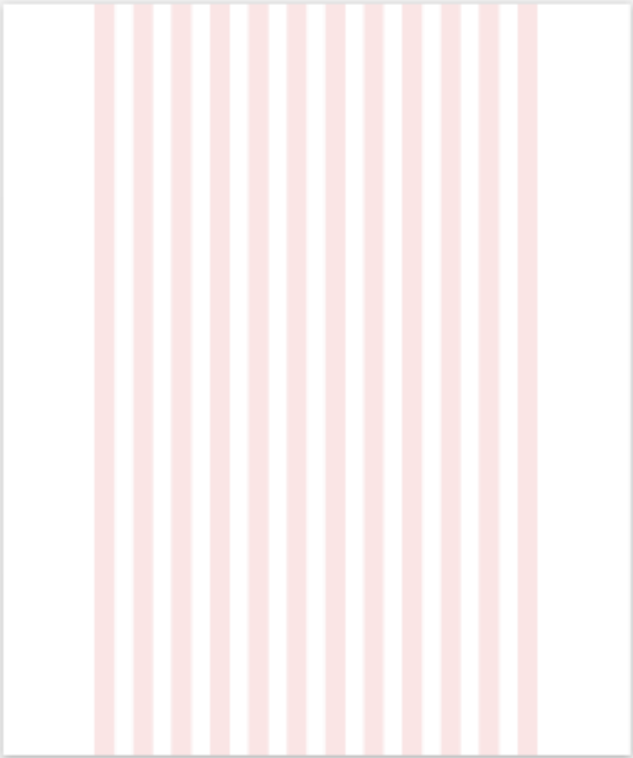
License FAQs

Translations

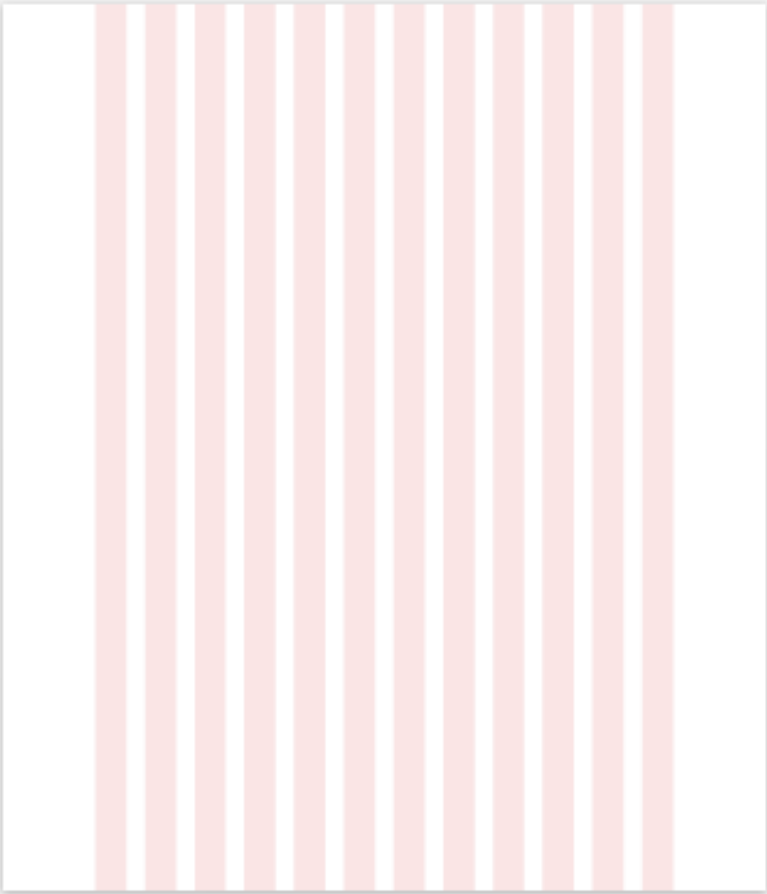
Back to top



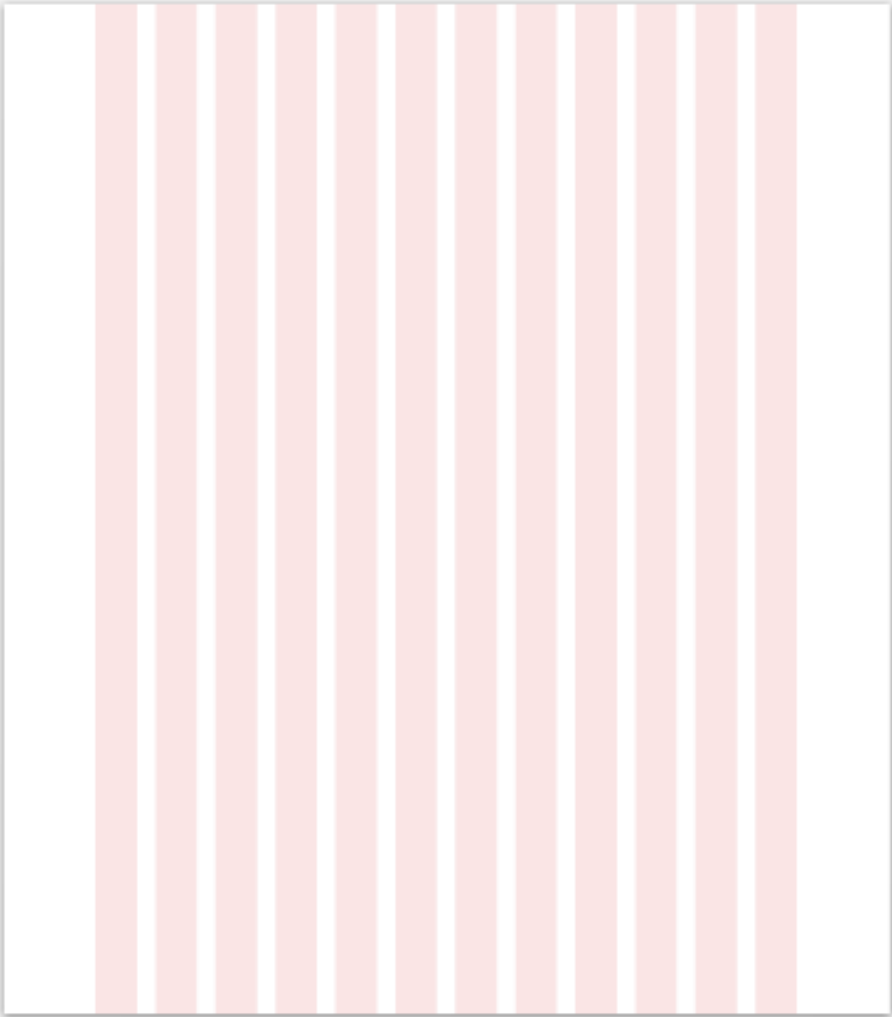
Small Devices ( < 768px )

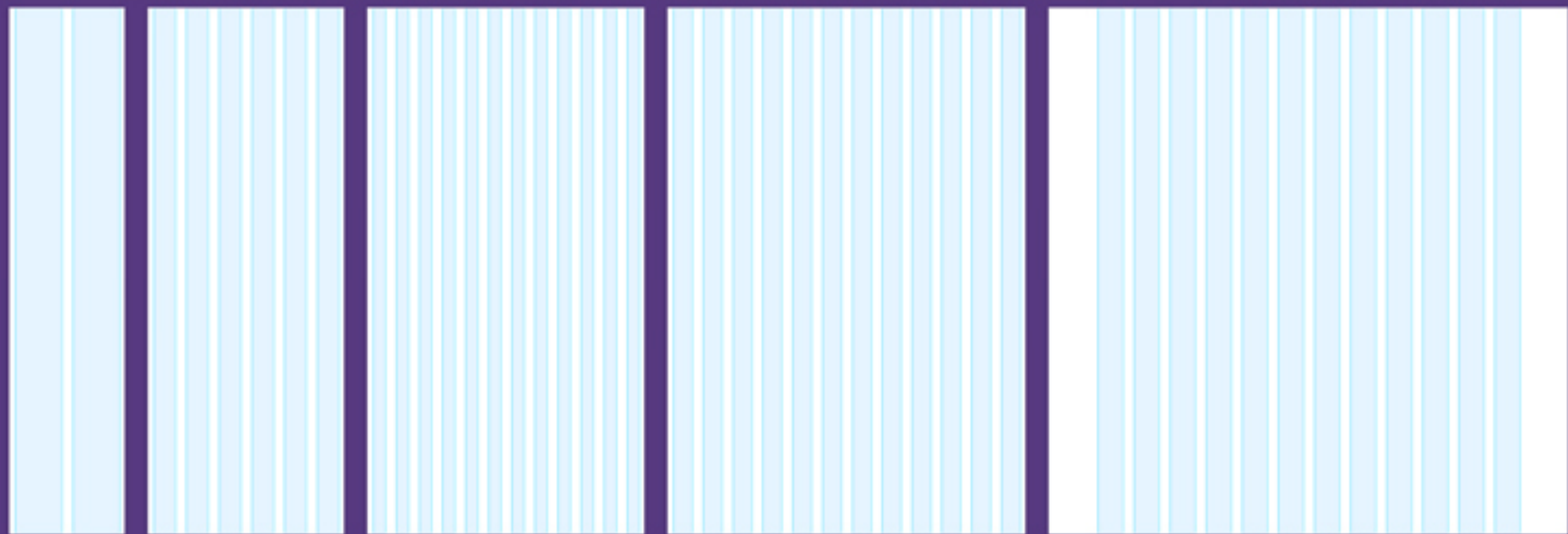


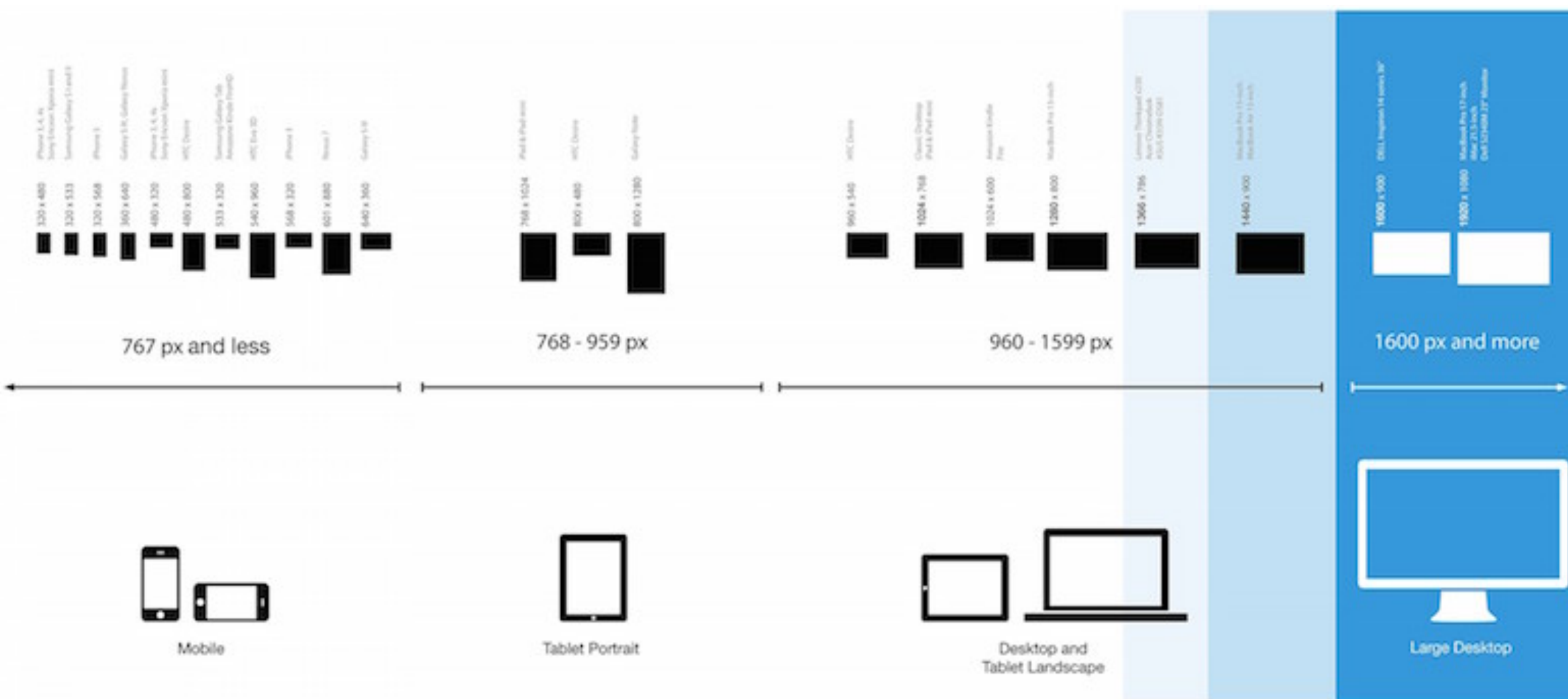
Medium Devices ( ≥ 970px )

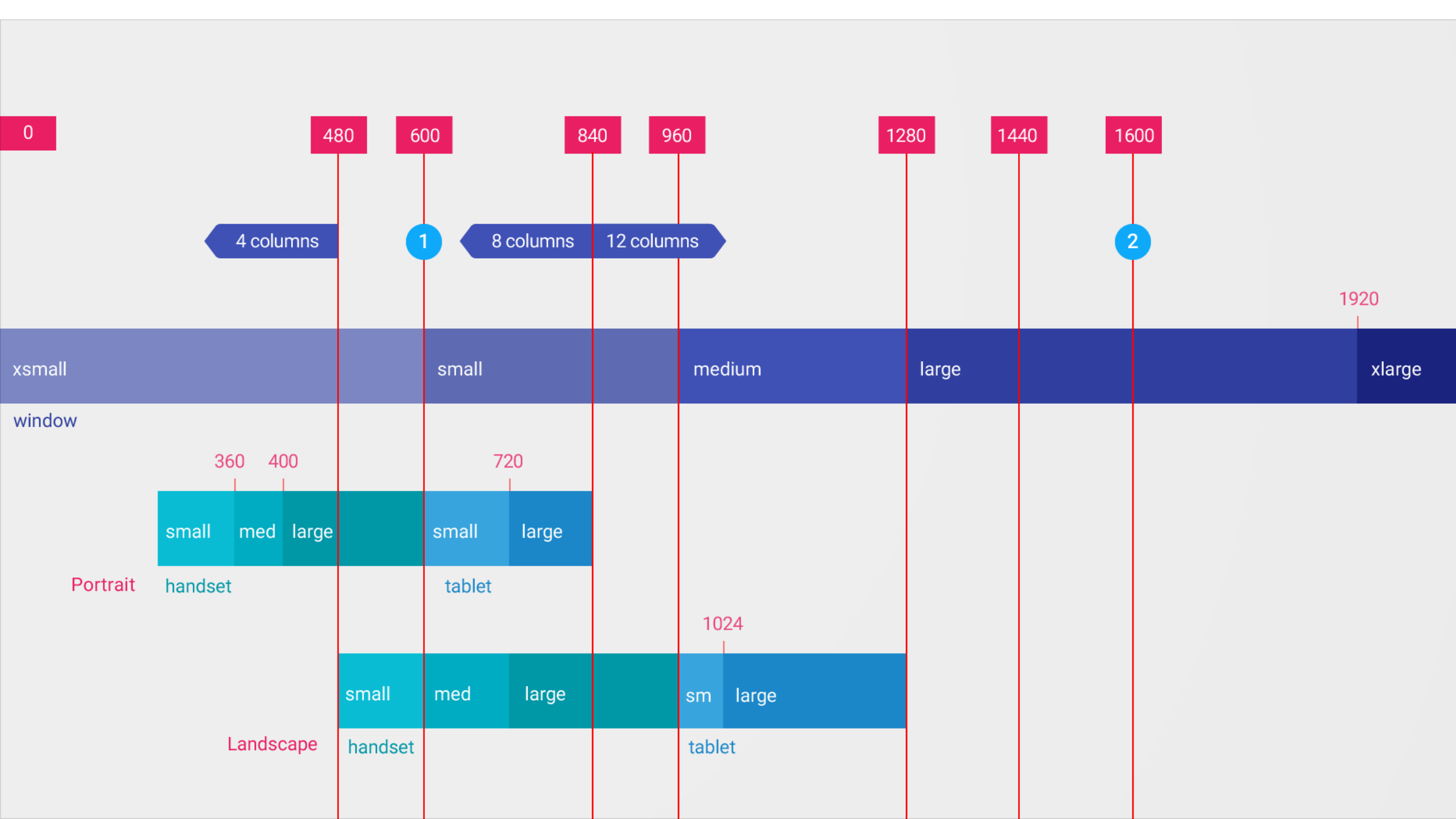


Large Devices ( ≥ 1200px )

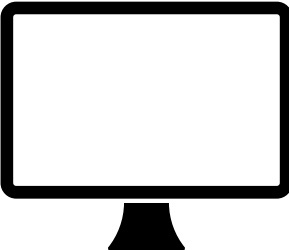
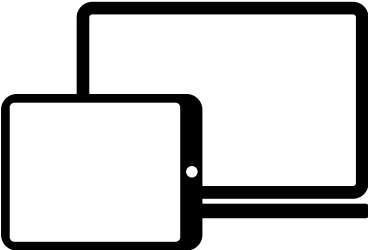
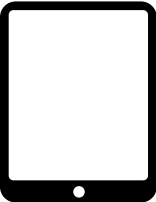
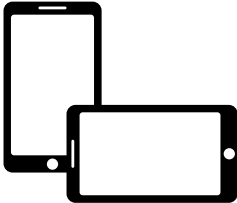




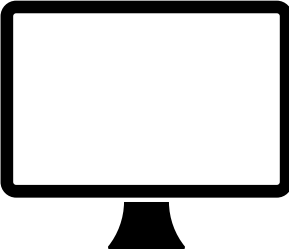
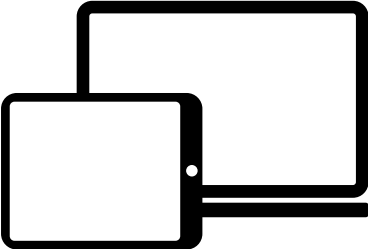
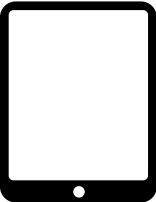
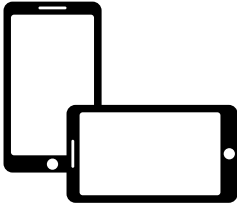




320      480      600      640      768      1024      1280      1366      1600      1920



320      480      600      640      768      1024      1280      1366      1600      1920

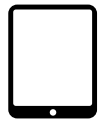




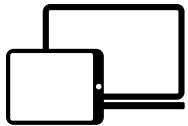
# CSS



```
/* ~ 640 : mobile(v,h,android-V) */  
@media screen and (max-width: 640px) { }
```



```
/* 641 ~ (1024) : tablet(v,h,pc-min) */  
@media screen and (min-width: 641px) { }
```



```
/* 1025 ~ (1366) : PC(19~), labtop */  
@media screen and (min-width: 1025px) { }
```



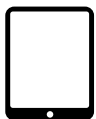
```
/* 1366 ~ full : fullpage(pc full) */  
@media screen and (min-width: 1367px) { }
```

# Javascript(jQuery)

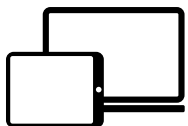
```
var $w = $(window).width();
```



```
if($w <= 640){  
    // ~ 640 기능 구하기
```



```
} else if( ($w > 640) && ($w <= 1024) ){  
    // 641 ~ 1024 기능 구하기
```



```
} else if( ($w > 1025) && ($w <= 1366) ){  
    // 1025 ~ 1366 기능 구하기
```



```
} else {  
    // 1366 ~ 기능 구하기
```

```
}
```

## Javascript(jQuery)2

// 스마트폰,태블릿 등 모바일기기의 경우  
스크롤사용시 상단 컨트롤 및 메뉴창이 세로화면이 원활한 화면을 볼수 없기에  
가로화면만 변동되도록 처리한다.

```
var $w = $(window).width();
```

```
// 브라우저의 사이즈 변경시  
$(window).on('resize', function(){
```

```
// 변경된 가로값을 판단하여서  
    var nowW = $(window).width();  
// 가로값이 일치하지 않을경우 새로고침  
    if(nowW !== $w ) {    location.reload();    }  
});
```

```
var $w = $(window).width();

if($w <= 640){
    // ~ 640 기능 구하기

} else if( ($w > 640) && ($w <= 1024) ){
    // 641 ~ 1024 기능 구하기

} else if( ($w > 1025) && ($w <= 1366) ){
    // 1025 ~ 1366 기능 구하기

} else {
    // 1366 ~ 기능 구하기

}
```

```
var $w = $(window).width();

// 브라우저의 사이즈 변경시
$(window).on('resize', function(){

// 변경된 가로값을 판단하여서
    var nowW = $(window).width();
    // 가로값이 일치하지 않을경우 새로고침

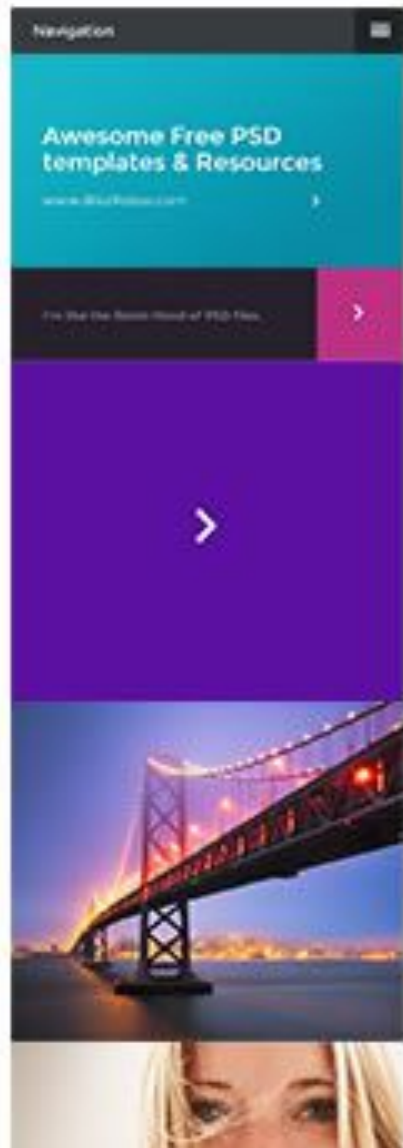
    if(nowW !== $w ) {
        location.reload();
    }

});
```

Desktop with 2 Rows



Desktop with 3 Rows



Desktop with 4 Rows



Desktop with 5 Rows

