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Accommodating Mobile Friendliness

This day in age there is a huge following for mobile devices such as cell phones and tablets. Small in size, they still grant a huge convenience when it comes to doing things on the web. Whether one needs to look up a menu for a restaurant, buy something through an online store, or just read a news article, it can be done! Many of these sites have a mobile version – they're slightly simplified, but in the right ways so that it cooperates with the smaller device being used. If a site has too much activity going on and doesn't have a mobile version, users will be turned off from using their service and will go elsewhere… this is *not* good for the image of a website or company! Google has developed an algorithm that helps to rank the mobile-friendliness of a site, in order to encourage developers to go mobile, and to give praise to those who are already mobile. This paper will act to analyze how this algorithm works.

[1] Google released the Mobile-Friendly algorithm on April 21st, 2015 in order to help users get the best mobile content when performing a search. They have developed a test that is run to rank how mobile friendly a webpage, and this score will account into how easily your webpage shows up in search results on mobile devices. In the past, Google had used this test to display labels under a website stating that it was mobile-friendly, but it didn't use it for sorting. This was helpful because it allows users to sort through results on their own without having to load the pages and find out for themselves if it works well on their mobile devices, but this newly implemented algorithm does the work for you!

[2] This algorithm is run by Googlebot, an analysis tool that will check to see if your website follows some simple mobile rules. One thing it will check is to see if you are using viewports; when a webpage is loaded, it will scale the page to fit the screen (convenient on a desktop, bad on a cell phone) whereas a viewport can specify the width and scaling factors to accommodate mobile devices. Googlebot will also check to see how legible the text is on a site; obviously, if text is too small, a fair demographic of users will have a difficult time seeing what's on the site. Googlebot will check to see if your site uses plugins; a lot of mobile devices don't support plugins and will cause a plethora of problems on your site. Googlebot will check to see if web content fits within the viewports being used; this is important because users should not be forced to scroll horizontally on mobile sites! And lastly, Googlebot will check to make sure that links, buttons, and other interactive objects are spaced and large enough so users don't have a hard time tapping them.

[2] The mathematics behind this formula are not too complicated. Basically, before analyzing, Googlebot will interpret your website to have a mobile score of 100. It will then determine the rule impact score which describes how poor the categories above are. If you did not follow a rule above, it will add to the impact score more and if you followed a rule perfectly, it won't add to the impact in that category. Once all the categories are analyzed, the rule impact score is subtracted from 100 – if the score is 80 or above, that will be the rank of the webpage and it will be considered passing. If it's lower than that, it will be scaled in a different way and considered failed.

Based on these observations, website developers can learn from these rules and adapt their website designs to accommodate them, and a lot of them can be managed nicely through

the website code. The best way to make a huge improvement on a website design is to heavily focus on how the viewports work throughout the site (if they're even in the site!). The reason for this is that viewports are a prime component of two of the rules taken into account for a website's mobile friendliness score. If they aren't there or don't adapt to different sized devices nicely, points are lost; if there's too much content that the user has to scroll horizontally to see all the data, points are lost. By making one improvement, it takes care of two rules! Additionally, viewports are typically considered a beginner's topic for web development, so it's not even a necessarily difficult concept to grasp.

That's just one example of how the mobile friendliness of a website can be improved. Of course, the other rules can be focused on too, such as cleaning up plugins, text legibility and spacing, etc. but this one is the best improvement that can be made. The theory behind ranking is that websites are basically competing with one another to climb to the top ranks of search results. It would be most advantageous for a designer to implement the improvement that has the largest impact, which can easily be seen to be viewport implementation. Of course, if the website already has that cleaned up, another category can be focused on.

It's important that websites are mobile friendly because there is a huge increase in mobile device processing in the past few years. Google's algorithm has made two useful contributions; provided users with a better mobile experience by providing them with better web services, and encouraging web developers to incorporate mobile design. If a web service can incorporate a mobile design, it speaks on levels that it's a well rounded, organized service that can be trust-worthy in possibly other aspects, and will overall get better activity.

[1] https://support.google.com/adsense/answer/6196932?hl=en

[2] https://moz.com/ugc/cracking-the-google-mobile-friendly-test-how-to-score-100