Before You Design Your Mobile App

We'll cover the following

- Mobile Only
- Mobile First
- Mobile Friendly Responsive
- What Approach Should You Choose For Your Business?
- Real Life Examples

If you are in the initial planning & design phase of your service or already have a web-based service up and running & are wondering whether you should have a mobile app for your service. It's always a good idea to do a thorough market research in your niche before you get down to writing a mobile app for your service.

I know I just said that mobile devices have the market penetration & are bringing-in the majority of the traffic & all, but there is no one size fits all strategy for approaching the market for businesses. One quick example I would want to give you here is I own a technology website & almost 80% of my visitors are from the desktop. My business does not have a mobile app & it's doing just fine.

So, there are several things to consider before we are in a position to take this decision - if we really need an app for our business. Yeah!! it may be a *good to have* but is it a necessity? As writing a mobile app has significant costs associated with it to the point you may have to set up a dedicated mobile team for your business.

If you are feeling courageous & thinking of writing a mobile app all by yourself let me tell you this, it has a steep learning curve. And saying with experience, you will start with a feeling like "well, I know the backend development. How tricky would writing a mobile app be?" & along the way, you

would be like "Oh man!! I never thought getting my business on mobile would involve so much work. Will this ever end?".

Hand-held devices are battery-powered; the resources (*CPU*, *Storage*, *RAM*, *Data*) & user's patience are limited. It requires a completely different approach when writing mobile apps as opposed to when writing web applications that would run on the cloud. Big guns like *Facebook*, *Instagram* & others do a lot of R&D & strategizing when developing their apps.

We'll talk all about that but before let's be clear on terms like *mobile-only, mobile-first, mobile-friendly*. What do they really mean?

Mobile Only

Mobile-only means that the business operates just via mobile. It may have a mobile website or an app on the play store or both. Generally, it's the apps that the businesses move forward with when going mobile-only & that drives the majority of the traffic.

Mobile websites run on mobile browsers and are primarily built for engaging traffic coming in from the google search. And then from there, the users are routed to the respective apps. *TikTok, Pokemon Go* are examples of mobile-only businesses.

Mobile First

Mobile-first means the user interface of the service is designed with an idea that the majority of the users of the business will use its services via its mobile client. The desktop-based website interface is secondary. The mobile interface is the interface that a business would want to show to its customers first as opposed to showing its desktop interface.

A mobile-first website will contain everything that a user would need to fully experience a service and to interact with all of its features. In case of a mobile-first approach, it's possible for the desktop interface to contain fewer features.

When the designers start to design the interface, they would first design the mobile interface and then based on that, interfaces for other platforms like desktop, tablet etc. would be built. In a mobile-first approach, a business typically goes to the market with an app or a browser-based mobile website.

Muntra com India's loading onling fashion retail business is a good example

of this. It started with both a desktop website and a mobile app. Majority of

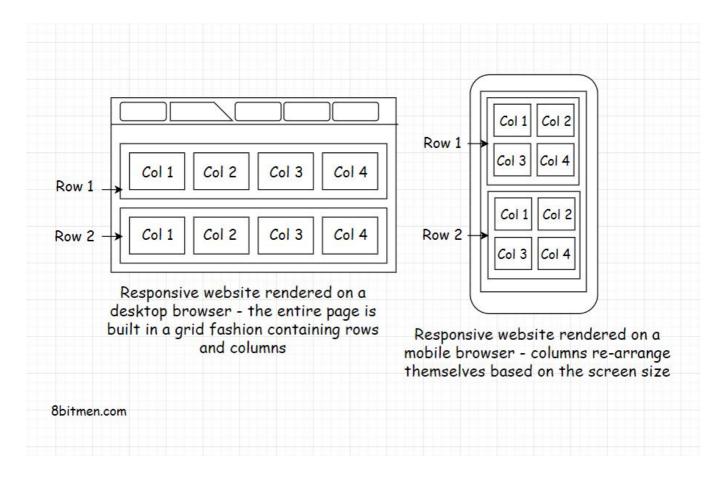
the revenue was being generated from the mobile app over 70% with over 90% traffic. So, it started focusing more on the mobile app and eventually killed its desktop website.

But over the time because of the customer demand, that the business should be on both the platforms, Myntra re-opened its desktop website but is still a mobile-first business.

Mobile Friendly – Responsive

Mobile-friendly as the name implies are websites that are friendly for mobile but are originally built to render on desktop browsers. They are popularly known as responsive websites. They have a grid-based design & adapt themselves based on the screen size of the device. We can also call these websites as web-first or desktop-first.

Generally, a responsive web page is divided into rows and columns containing grids. And as the screen size gets smaller those grids re-arrange themselves based on the screen size.



So, with this approach, we don't have to do anything extra for mobile. Just develop a desktop-based responsive website and it will automatically render

for all the screen sizes.

This may sound convenient but there is a little hitch. We may not have 100% control over how the responsive website renders on different devices. Some elements of the page may get hidden or may not render in a way that we would like. To tackle this, we can write *CSS-media queries* but still, it won't be as good as a mobile-first built website. This is why businesses prefer to go ahead with the mobile-first strategy if the majority of the traffic comes-in from the mobile.

What Approach Should You Choose For Your Business?

When picking on the right strategy to approach the market, we need to inform ourselves well on things like:

- How are the users of the existing businesses, if there are any, in the same niche, accessing their websites?
- Do these businesses have an app on the popular app stores or are they operating just via their websites? If they have an app, how many downloads do they have? What are their primary traffic & social discovery (how users find the service) sources?
- What is the revenue generation platform wise? Sometimes it's hard to get that kind of info if the business doesn't declare it publicly. However, we can look into the traffic on their app and the website and kind of assume (though it's not always true) that the platform getting the maximum traffic will generate most of the revenue. For all this business analytics information there are a plethora of freemium tools with browser extensions and services available online. Just Google.

Besides these key points, the type of service being offered to the users plays a decisive role in creating a strategy for approaching the market. It makes it really easy to figure out if we need to move ahead with or without a mobile app. For instance, let's say, we intend to bootstrap a service in the health niche, a service that would enable the users to track their eating habits, also suggest them of the healthy alternatives available. The service would also have some of the social features for user engagement & retention.

What do you think would be the best strategy to approach the market in this use case? Do we need a mobile app? Or just a web-based website would suffice?

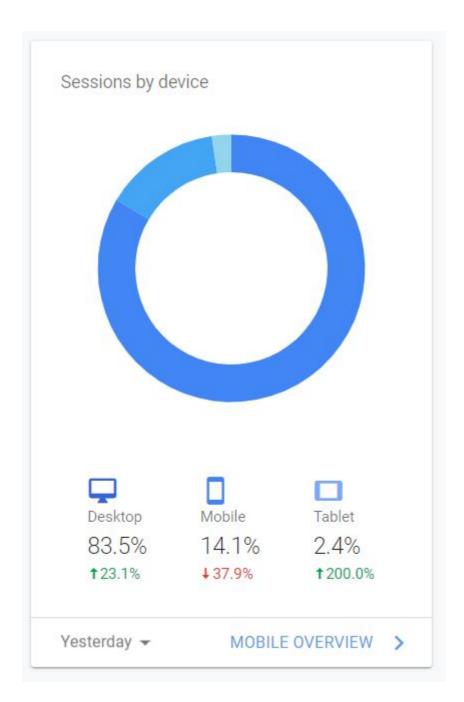
To track the meals throughout the day, it would be inconvenient for the user to open his laptop or rush to his desktop everytime he wants to input or check the calories of the food he just ate. On the other hand, if we offer the end user all the services via an app that he could install on his mobile, he can easily track all the meals throughout the day anywhere he enjoys his meals be it at the home, the office cafeteria or when stuck in traffic. It's an obvious fact that a mobile-first approach will work best for our use case.

We can also have a web-based interface, it would be a *good to have*, though not a necessity in the initial stages of starting up. Also, from a technical standpoint, there are technology offerings like *Firebase* that enable us to write an app without investing too much time in setting up the backend infrastructure. More on that in the upcoming lessons.

Real Life Examples

Myntra.com was making 30% of the revenue from its desktop site still they took the decision to ditch the web version of the business for the mobile version. The reason being dedicated platform teams have costs. Focusing on a single platform is both peaceful & economical at the same time.

Speaking of my technology website, the maximum visitors, almost 80%, are from the desktop. Here is the Google analytics image for the traffic on my website.



So, naturally, a mobile-first approach isn't for me. A mobile-friendly approach is ideal for my use case hence my website has a responsive user interface. However, say if I was selling something on my website & most of the sales would be happening via the mobile client regardless of the fact that the maximum traffic was coming in from the desktop. I may have to think about writing a mobile app for my business, for one simple reason, money. It would then make perfect sense for me to have a strong presence on both the platforms.

Here is one more example with regards to this.

Pixel Federation, a browser & app-based gaming company based out of Slovakia, launched a game called Seaport in *2015*. The team started with the desktop browser version of the game integrated with Facebook, that's how I

discovered the game. In 2017 they launched an app that got over 8.1 Million downloads.

The app launch helped the game earn over 7.6 Million $\mathfrak C$. The game has approx. 305K Daily active users $\mathfrak E$ out of them only 50K are desktop users but those 50K users bring in almost one-third of the game revenue.

So, I think you got the point. Research in your niche is important before you start writing any sort of code.

Moving ahead, In the next lesson, let's talk about the responsive user interface.