

Going Mobile?

Speed is Fine, But UX Strategy is Final



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Going Mobile? Speed is Fine, But UX Strategy is Final

“Typically, the first foray into creating a mobile presence is a rushed affair . . . the development process does not allow companies to understand and appreciate the relevance and nuances of the mobile channel across three key aspects: business considerations, user engagement and technical capabilities.”

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“This starts the stumbling journey of discovering the overall mobile user experience strategy required to drive usage and monetization.”

With over 5.6 billion mobile phones for a 7 billion world population, it's fair to say that we are firmly into the mobile era.

The smart phone market is likely to climb to 37 percent of global handset sales in 2014 with emerging markets as the key growth engine, according to a new report from Pyramid Research.

According to an article by Eric Jackson in Forbes, “With each succeeding generation in the Internet, it seems the prior generation can't quite wrap its head around the subtle changes that the next generation brings.” The path taken by many companies who develop mobile applications and sites is, “If we put it out there, users will come.”

This starts the stumbling journey of discovering, a piece at a time, the overall mobile user experience strategy required to drive usage and monetization. It's like building a city block by block without a master plan.

Most companies go through the following six stages in their mobile journey:

1. Mobile Trigger
2. Rushed Development
3. Reality Check
4. Repair and Rescue Attempt
5. Enlightenment
6. Reset and Rebuild

Mobile Trigger

Most companies are aware that mobile is reaching critical mass. For some, mobile presence is seen as a “good-to-have;” for others, it's a matter of survival. Whether the trigger comes as a mandate from the CEO or as a wake-up call from the market, the lure of improving the current reach and/or opening up new opportunities via mobile is irresistible.

According to Forrester Research, Inc., mobile commerce is expected to reach \$31 billion by 2016. The ubiquity of mobile phones, improved infrastructure, advances in device utility, and overall market penetration are driving phenomenal growth.

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“Companies differ in their approach to mobile depending on age, industry, nature of web presence, and UX maturity level.”

eBay is eyeing \$8 billion in sales on mobile devices in 2012.

Google mobile ads are now over a \$1 billion business worldwide.

"We believe that the migration towards mobile ultimately leads to greater monetization. When you consider that 40% of our searches come from mobile apps, there is quite a bit of unmonetized mobile traffic that we expect to unlock in the near future." – Jeremy Stoppelman, Chief Executive of Yelp

"Mobile sales are meaningful enough for us to view this as a legitimate growth channel for Target." – Steve Eastman, President, Target.com

"In the last twelve months customers around the world ordered more than \$1 billion worth of products from Amazon using a mobile device." – Jeff Bezos, CEO, Amazon

Rushed Development

Companies differ in their approach to mobile depending on when they were born, the industry they are in, the nature of their web presence, and their UX maturity level. Typically, their first foray into creating a mobile presence is a rushed affair.

Broadly speaking, the development process applied to mobile sites and applications has four steps:

1. Identify business need
2. Develop and debug
3. Launch/Distribute
4. Maintain/Retail

This development process does not allow companies to understand and appreciate the relevance and nuances of the mobile channel across three key aspects: business considerations, user engagement and technical capabilities.

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“A mobile channel does not exist in isolation but needs to confluence with other channels in a seamless manner.”

Business Considerations

Organizations assume that designing and developing for a small screen size would be proportionally cheaper. This is not true as the design complexities around how users engage with their mobile channel are intricate, and can be even more so than other channels. The process and the amount of design effort required do not diminish based on size of the screen.

Another cause for increase in design and development cost is the multitude of mobile devices that are in the market. The variety of devices and fragmentation of operating systems presents quite a challenge and designers need to create multiple versions of the interface to cater to most if not all devices.

Not considering the “time to market” can be another fatal mistake. The time to market for your application could be considerable due to the publishing legalities creating a major barrier to entry. FreedomVOICE Systems, developer of the Newber iPhone app, learned this the hard way. After having not heard from Apple 165 days after submitting their application, they decided to abandon the project.

User Engagement

Users have a strong mental model of how they expect to be serviced. This mental model is built on their psyche, expectations, emotions, needs, prior experience, etc. The decision making for customers on which service they engage with and how they engage with it depends upon their mental model.

Often, companies don't invest in understanding the customer's mental model. There are no user research or validation steps in the development process. As a result, companies end up developing a mobile site or app without understanding the user's stated and unstated needs and without any serious consideration for why, when, where and how the user will actually use it.

Also, users exist in a complex ecosystem containing multiple channels, players, relationships, scenarios, needs and opportunities. A mobile channel does not exist in isolation for customers, but needs to confluence with other channels in a seamless manner. Companies tend not to delve into the ecosystemic approach of tying channels together. Channels are developed separately by different design agencies and often are owned by different verticals. Users don't care about how the company is structured internally, and this approach leads to a fragmented experience.

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“Confusion arises between the choices of using an application or a browser based footprint.”

Technical Capabilities

Mobile phone technology presents many opportunities and poses many challenges. Companies struggle with the lack of understanding of how to leverage this medium. Predominantly the confusion arises between the choices of using an application or a browser based footprint.

Applications have the advantage of full access to the myriad of native hardware available in the mobile device. They also have access to other OS API which are not typically available to a browser-based footprint. Camera, GPS, Accelerometer, Gyro, vibration motor, magnetic sensor and other hardware present opportunities for very creative applications that can engage the customers in innovative ways. Besides hardware and native API capabilities, applications provide better performance speeds, visual fidelity and better control over presentation and content.

Companies that attempt to employ mobile phone hardware in their applications don't base their designs on the user's scenario of use but on what is popular or what is being done by competitors. This leads to the application using hardware which does not augment the user experience. Creating applications which your customers don't need can be expensive when you could create a cheaper and more relevant version using browser technologies.



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“Users don’t care whether the footprint is an application or a website, as long as it provides a fluid experience.”

Also, mobile browser technologies are fast-changing and are increasingly closing the gap between applications and web footprints. With the advent of HTML 5, smarter web footprints with local caching are possible and challenge the need for applications. Applications may soon provide a marginal advantage over web footprints.

Web applications now provide the ability to easily push your services to users, mimicking the fluidity of interactions, visual fidelity and ease-of-access of applications. Users don’t care whether the footprint is an application or a website as long as it provides a fluid experience.

Companies are not fully cognizant of the advantages of cost, reach and development management for web footprints. Understanding the right footprint and relevant technology capabilities can help in choosing the right solution to service your customers.

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“Oversupply has devalued apps, and it’s becoming very difficult to make money on them.”

Reality Check

Post-launch, companies usually end up with one of the following three results:

- **Mobile Brochureware:** A static and uninteresting representation of a company (often a direct translation of existing promotional materials) that does not take advantage of the mobile’s interactive and dynamic capabilities
- **Web Clone:** A replication of the web version that does not offer any experience improvement or enrichment
- **Mobile Overkill:** A mobile alternative that tries to do too much, overloading the site or app with content and features leading to disastrous consequences such as an unclear USP, cluttered layout and confusing navigation

Low usage numbers and market penetration makes companies realize that just focusing on getting their mobile site and apps to the users quickly does not lead to success.

Reality Check #1: Companies are struggling with app discovery. With one million apps and counting, app stores have become a battleground for user attention.

Reality Check #2: Oversupply has devalued apps and it’s becoming very difficult to make money on them. The average paid app needs about 25,000 downloads per day to reach the top 50 in the Apple App Store or the Google Play market.

Reality Check #3: If users have to put effort into figuring out how to use a site or an app, they are probably not going to bother trying unless the content is really compelling. According to a Harris Interactive study on app usability, “The majority of users download apps based on recommendations and good UX, rather than on the brand name, company or organization that released it.”

Reality Check #4: Putting too much functionality into an app makes it a mile wide and an inch deep. Such apps end up being mediocre at a bunch of things rather than doing one thing really well.

Reality Check #5: A mobile site or an app is not a mobile UX strategy. Lack of a consistent and seamless user experience across devices/channels has a big impact on market penetration.

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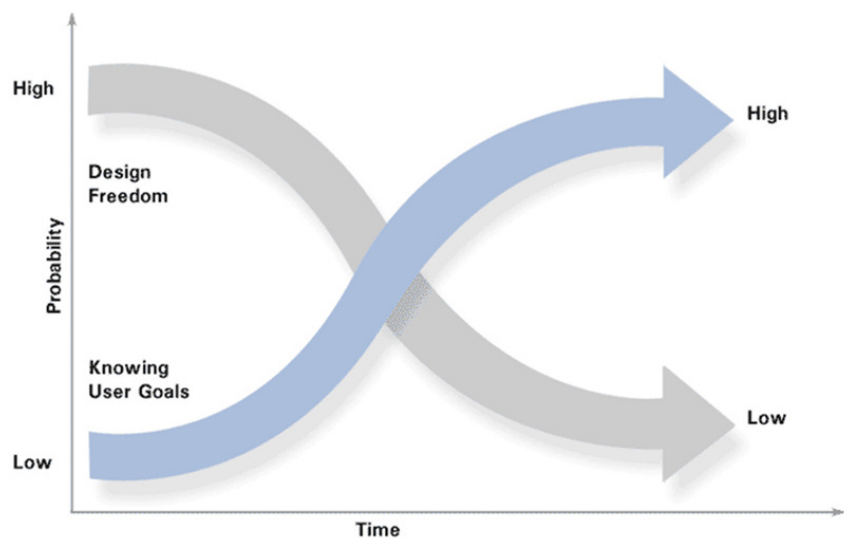
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Repair and Rescue Attempt

Most companies react to poor user reviews and low adoption by trying to make some quick, tactical UX fixes to the mobile site or app. This does not work for two reasons:

(1) The freedom to make any meaningful changes drops or declines substantially post development/launch because structurally the design is already locked in.

“The freedom to make any meaningful changes declines once the design is already locked in.”



It's important to get smart early in the process

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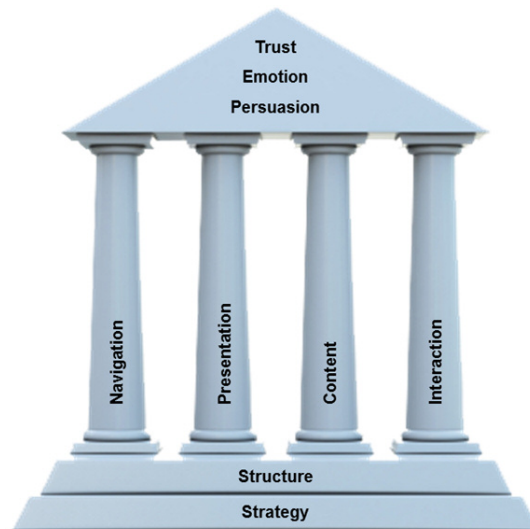


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(2) Making only surface level changes to the look and feel does not add much value either because substantial UX improvement can only be made by reassessing the underlying strategy and structure, addressing key issues across the navigation, presentation, content and interaction layers, and building the right persuasion flow on top.

“Many companies will go through several Repair and Rescue cycles, only to get incremental UX improvement and cost overruns before realizing that they need to step back and see the big picture.”

UX is not Skin Deep



Many companies will go through several “Repair and Rescue” cycles, only to get incremental UX improvement and cost overruns before realizing that they need to step back and see the big picture.

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Enlightenment

"A new medium is never an addition to an old one, nor does it leave the old one in peace. It never ceases to oppress the older media until it finds new shapes and positions for them." – Marshall McLuhan

The following are some important UX considerations that have emerged as key ingredients for mobile success and become the basis for competition:

“The mobile footprint is about micro-tasking, and content consumption behavior is very different.”

Less is more / Find a niche / Narrow your focus

Do not try to be all things to everyone (Concierge, Coach, and Court Jester). Do as few things as possible and do them really well. The mobile footprint is about micro-tasking, and content consumption behavior is very different.



Usability is no longer enough

Dr. Eric Schaffer said four years ago that the next wave of the information age will be about designing for persuasion, emotion, and trust (PET design™). We believe that time has come. You still need good usability because if people can't find something they can't be persuaded by it, but usability is no longer the key differentiator it has been.

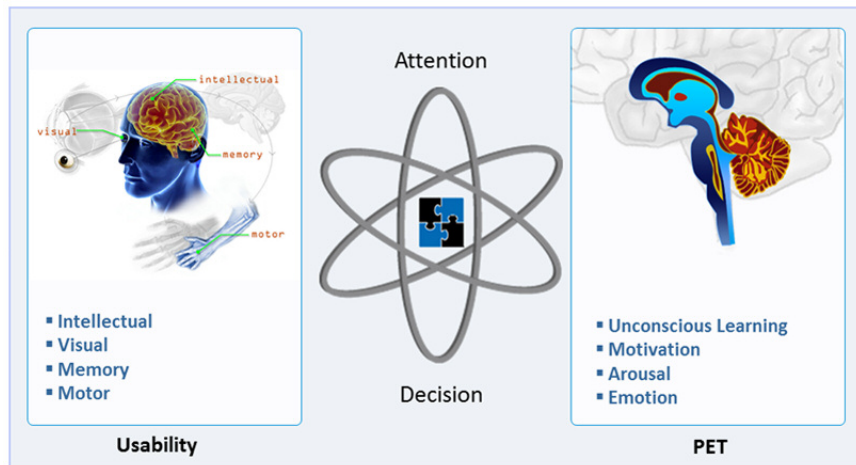
It's often not enough to design a site or app that is easy to navigate, understand, and transact on. Just because people can do something doesn't ensure that they will. The future of design is about creating engagement and commitment to meet measurable business goals. However, understanding subtle emotional triggers requires a rigorous set of new techniques, the results of which can even conflict with classic usability best practices.

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“Companies that can masterfully integrate hardware + software + services into unique user experiences will stay ahead of the competition and set the rules for the market.”



Mobile is not just about the phone

Focus on the overall cross-channel experience to drive user loyalty, cross sales and engagement. According to VisionMobile, the new meaning of convergence is the experience of roaming seamlessly across many types of devices. The real mobile battle is not being fought just on the smartphone but across four screens (PC, Smartphone, Tablet and SmartTV).

It's no longer about smartphones

Key ecosystems are expanding across 4 screens



The magic lies in the ecosystem

Companies such as Apple and Amazon that can masterfully integrate hardware + software + services into unique user experiences will stay ahead of the competition and set the rules for the market.

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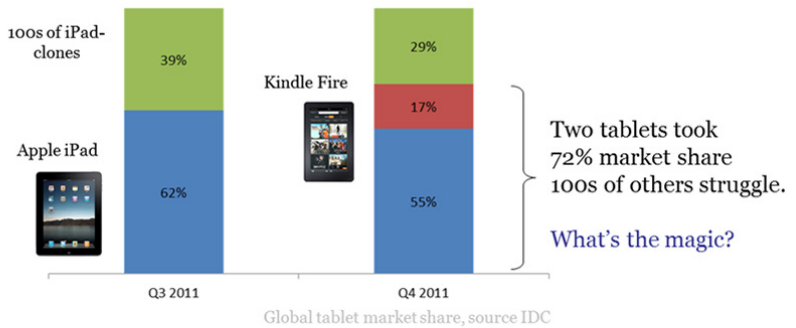
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Reset and Rebuild

User centered design methodology provides a robust framework for approaching mobile work the right way.

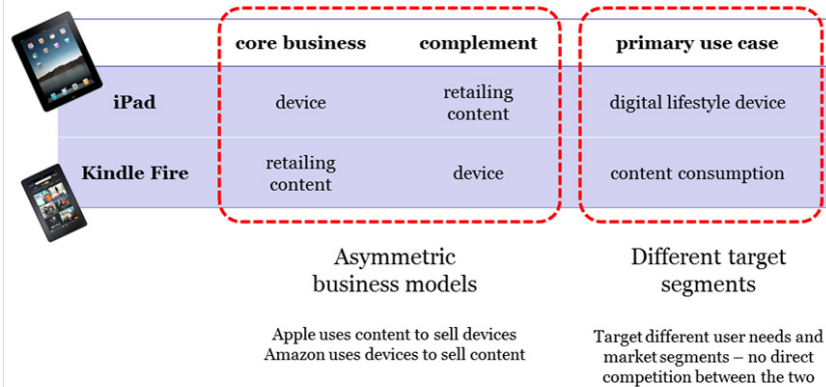
“User centered design methodology provides a robust framework for approaching mobile work the right way.”

How did the Kindle stand out?



... based on asymmetric business models

But target different use cases and segments



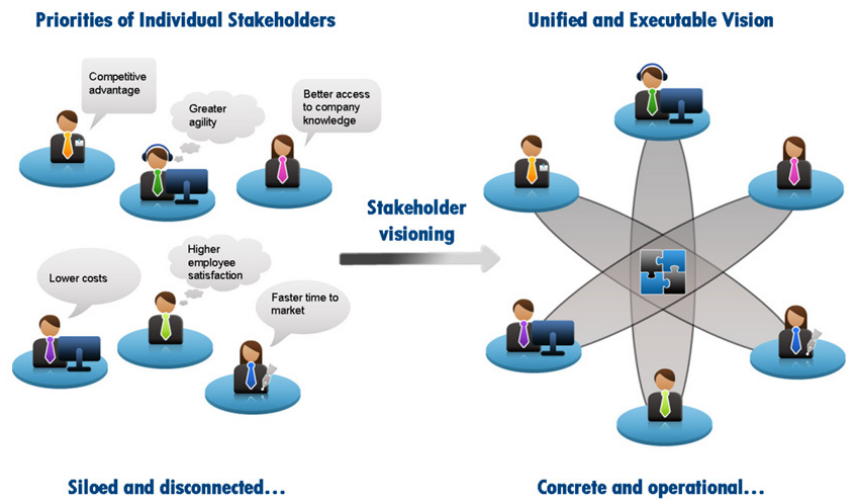
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Executive intent

Capturing the individual priorities across stakeholders and creating an integrated vision for the mobile channels is important. Documenting business objectives, target users, and critical success factors is essential to informing the process. This helps lay the foundation for what to expect from the mobile channel, as well as how it is expected to perform in relation to other channels and processes.



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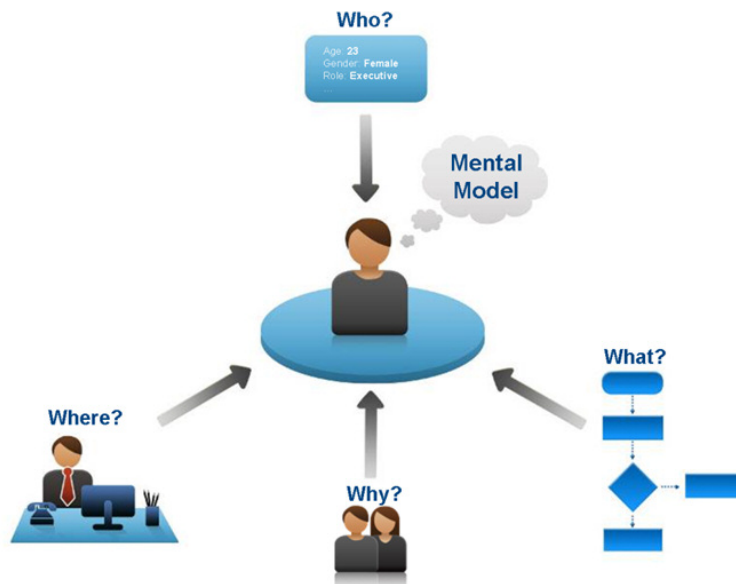


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User Research and Testing

“Fundamentally, ‘mobile’ refers to the user and not the device or the application.” – Barbara Ballard in Designing the Mobile User Experience

Gathering data directly from users (using 1-on-1 interviews, not surveys and focus groups) about their stated and unstated needs, and testing during the early, intermediate, and later stages of development help ensure that the user interface is intuitive and has a natural flow.



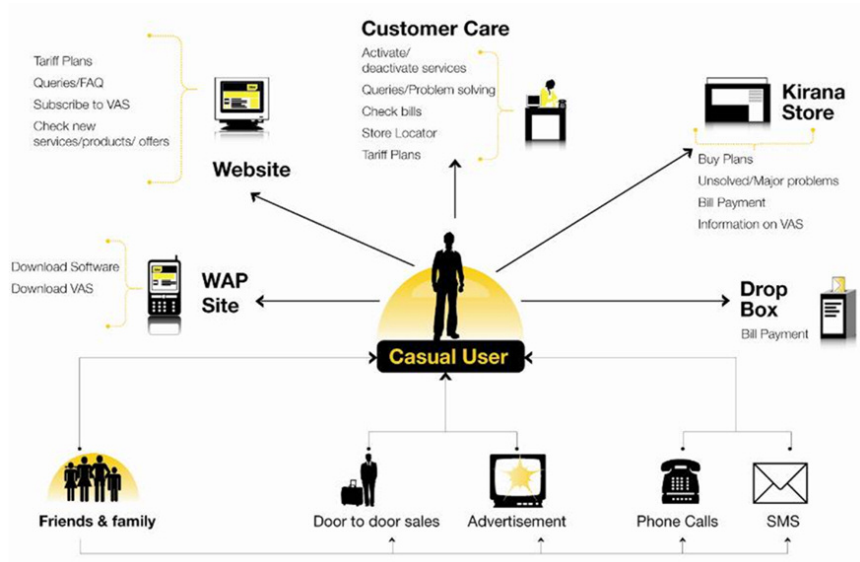
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Determine roles for each channel

Using an in-depth understanding of the customer's mental model and the ecosystem they exist in, we can start to map the role of different channels to the customer. This helps clearly define functionality and behavior specific to each channel.



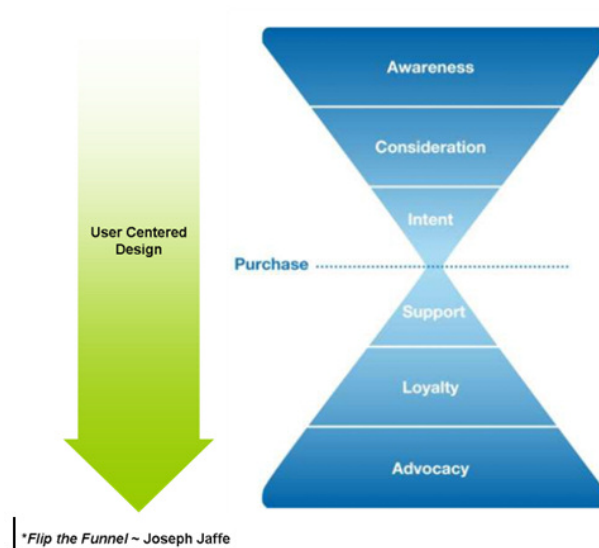
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Determine role of mobile within service flow

In order to clearly define the role of mobile in the customer's ecosystem, we also have to think about how and which parts of the service flow the mobile channels support. Mobile devices can play important roles in building customer awareness, consideration, intent, support, loyalty and advocacy.



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Determine mobile devices to focus on

There is a menagerie of mobile devices in the market. There are also a few mobile operating systems which have a variety of versions in the market being used by your customers. Sounds overwhelming? The good news is that you do not have to design for all mobile devices. Focus your design acumen and energies on devices used by the core personas that you care about.



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Define device groups

Define device groups which merit a distinct user experience owing to their screen size, interaction modality or the expected user behavior. This has great bearing on how you would design for each of the groups and how you would write the code to support the relationship between them.

Feature Phones
128, 160, 176, 220, 240



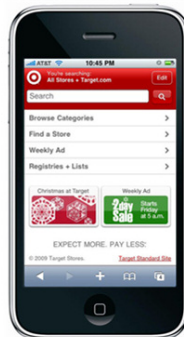
Smart phones
320, 480



Choose the right footprint

Determine the appropriateness of using an application versus browser footprint based on the required user experience.

Mobile Optimized Websites



Applications



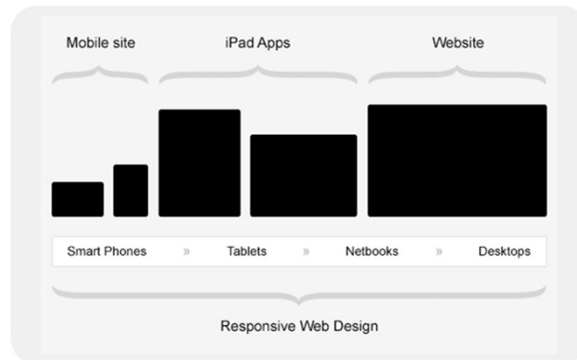
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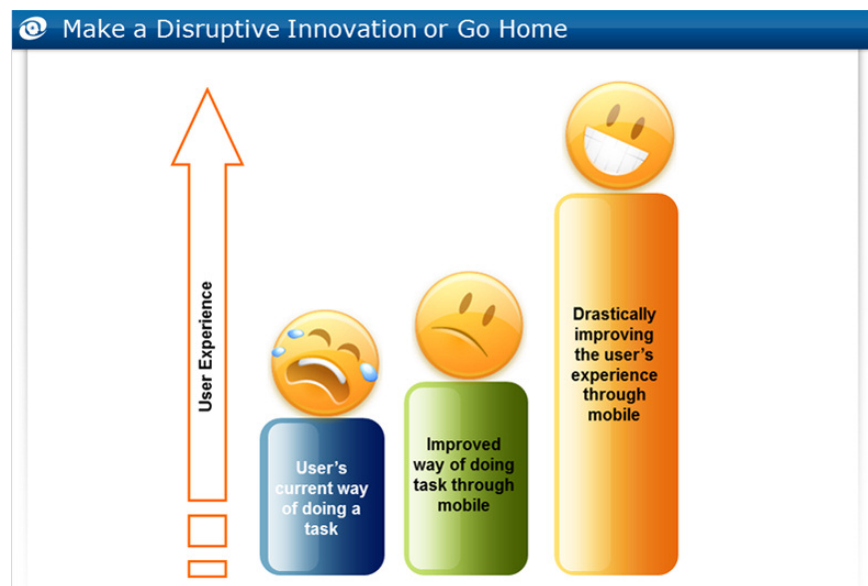
Cross channel design

Based on the device groups and the chosen mobile footprint you need to determine how your design would scale across, considering the information architecture, navigation mechanisms, layout, target size, etc.



Conclusion

It's fair to say that there is no shortcut to mobile heaven and it takes a whole lot more than just passion, good intentions and speed to achieve the desired usage and monetization. Even internet giants such as Yahoo! and Facebook are still coming to terms with the mobile context and struggling to find a foothold. The key ingredients that are defining the rules of the game today show that the path to success lies in being strategic, scientific, and systematic, and you don't just differentiate based on good user experience – you live and die by it.



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Dr. Eric Schaffer in a recent white paper “What Every CEO Should Know about Creating an Effective UX Practice” says that the global best practice is not to depend on user experience consultants. You need to have a strong, mature, and sustainable practice in user experience engineering inside your organization. There is no magic pill that makes a successful user experience design practice. Companies need to:

- Assign an executive champion and full time manager of customer centricity
- Find a vendor who can help guide the process and has a suite of intellectual property so that you don't have to reinvent methods, training, standards, etc.
- Develop a UX strategy roadmap
- Put in place the infrastructure (methods, standards, knowledge management, etc.)
- Set up the organizational structure and staffing (with training and certification)

References

Mobile Cambrian Era - Here We Come
The Mobile Era is Here
Mobile Megatrends 2012
Here's Why Google and Facebook Might Completely Disappear in the Next 5 Years
The Mobile Corporate Website
2012 B2B E-Commerce Survey: Results and Trends (PDF)
It's Time to Get Moving with Mobile
The Most Common Mistakes Made in Mobile App Development
A Mobile App Is Not a Mobile Strategy
Newber for iPhone Tabled Due to Zero Communication from Apple (PDF)
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About Saurabh



Saurabh Gupta, MS, CUA
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As Managing Director, Saurabh Gupta manages HFI's India operations. He is an alumnus of the National Institute of Design, Ahmedabad, and has worked in the usability and user experience field since 2003. Saurabh has scoped consulting engagements and mentored and managed project teams that include usability specialists, graphic artists and programmers. Saurabh has led numerous projects including digital strategy visioning, product ideation, usability evaluation reports, user interface structures, and usability testing. His team consults with several Fortune 500 clients as well as cutting-edge start-ups worldwide. He is also a lead instructor and teaches HFI's user centered analysis and design training courses in India and abroad.

About Amber



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Amber Krishan leads project teams across digital strategy, usability evaluation, user interface structure design, and usability testing engagements. He has consulted with numerous domestic and international clients. He is also a lead instructor and teaches HFI's desktop and mobile UI design courses internationally. Amber has a post graduate degree in Design & Technology from Parsons School of Design, New York, and a bachelor degree in product design from National Institute of design, Ahmedabad.

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