

Applications

Rebecca Kraemer

Director of IT & Consulting, Small Dog Electronics, Inc.

Why Apps?

- ◆ Provides a new way for customers to interact with a business.
- ◆ Allows companies to deploy mobile devices to save \$\$\$ and increase flexibility.
- ◆ Extremely convenient.
- ◆ It's cool.



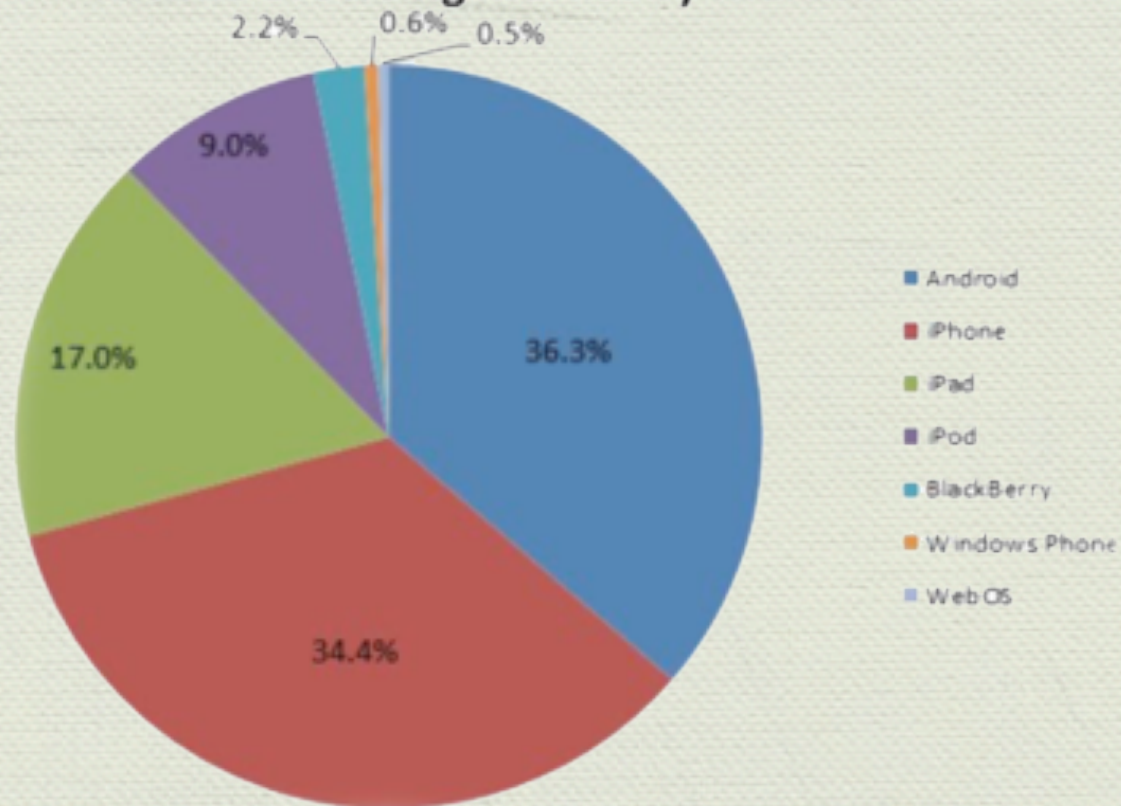
Who Should Build Them?

	In-House	Local Consultant	Outsourced
Cost	?	\$\$	\$\$\$
Upgrades	Fastest	Faster	Slower
Outcome	Eventually Great	Great	Depends

Which Platforms?



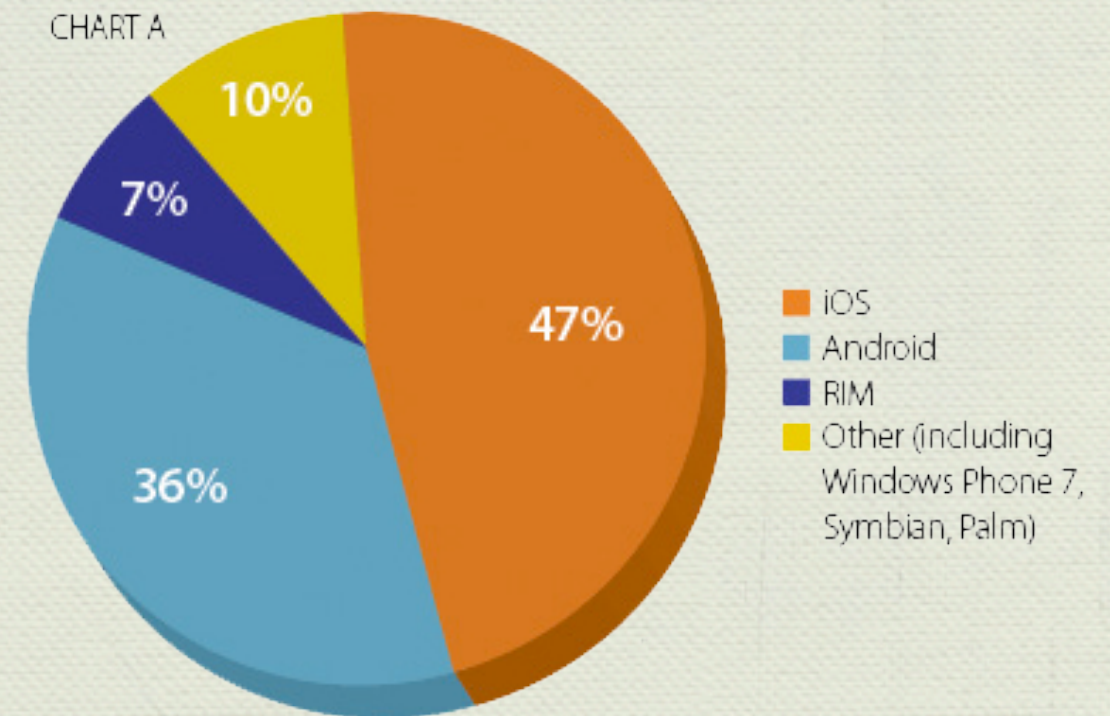
Mobile Browsing Market by Market Share



Application Platform Mix

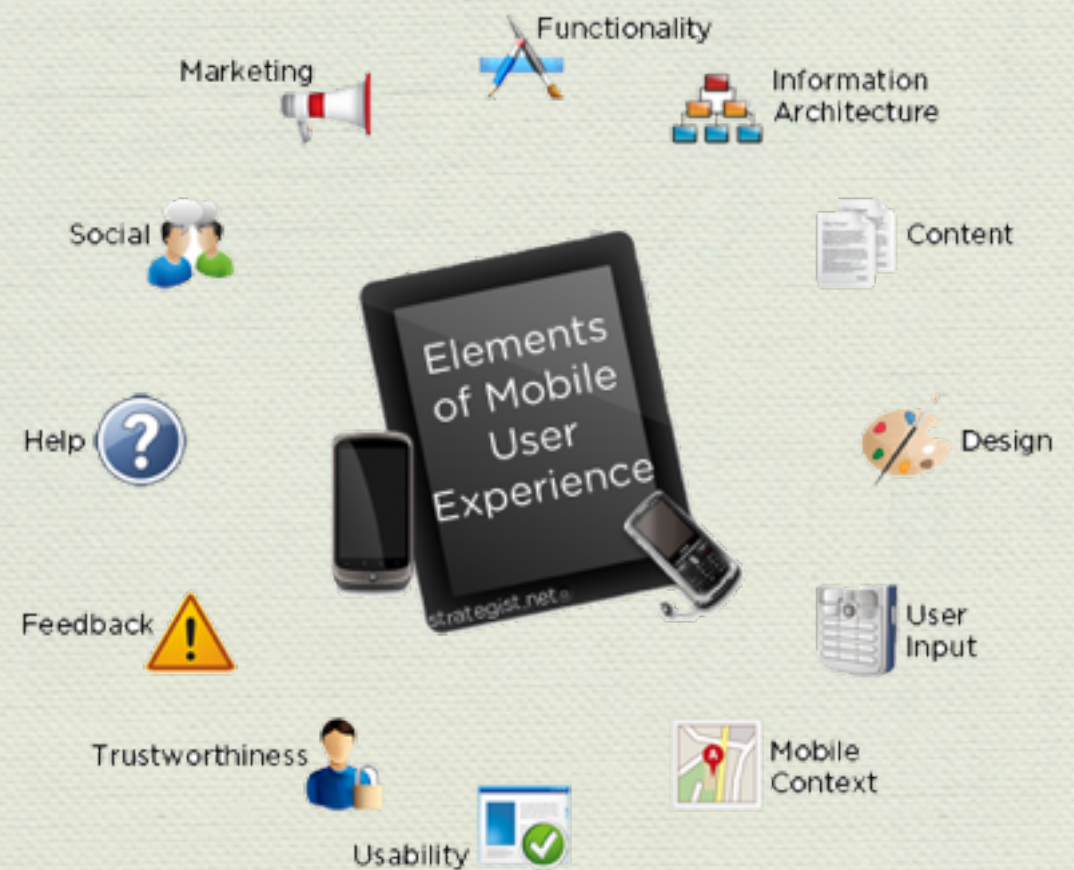
Ranked by Revenue

CHART A



Apps: User Experience

- ◆ Always think about the end user
- ◆ Keep your goals in mind
- ◆ KISS
- ◆ Apps should be simple, beautiful and functional
- ◆ Keep it seamless by leveraging the hardware



Apps: Web Apps

- ❖ Easy to make with the basics: HTML5, CSS + Javascript
- ❖ Easy to make universal
- ❖ Easy to update
- ❖ Web-based; runs in a web browser
- ❖ Can't leverage hardware
- ❖ Not specific to devices



Apps: Native Apps

- ◆ Better performance over web apps
- ◆ Can leverage hardware features
- ◆ Generally a better user experience
- ◆ May take more time to build if you want to support multiple platforms
- ◆ Takes time to be approved by appropriate app stores
- ◆ Updates can take longer



Apps: App Compilers

- ◆ Products like PhoneGap and Sencha allow you to upload HTML5, CSS & javascript and will compile a native app for multiple iOS platforms.
- ◆ Easy to quickly create universal apps
- ◆ Can leverage benefits of native apps
- ◆ Not as dynamic as creating apps for custom iOS platforms
- ◆ May also consider repackaging apps like Blackberry's Runtime for Android



Phone**Gap**



Sencha

Apps: Test Your App

- ◆ Unit Testing
- ◆ Functional Testing
- ◆ Tools like TestFlight and Hockey App
- ◆ Ad Hoc Distribution



Apps: Promote Your App

- ◆ Get a high rating
- ◆ Use a catchy name with keywords
- ◆ Submit your app to review sites
- ◆ Buy in-app ads
- ◆ Promote to your current customer base
- ◆ Consider a free version
- ◆ Leverage social media



🍏 iOS: Development

- ❖ Objective-C, C, C++ or JavaScript
- ❖ Must use sandboxing
- ❖ Must sign apps



🍏 iOS: Development

- ◆ Developer Program

 - ◆ \$99 / yr

 - ◆ Custom B2B App Distribution

 - ◆ App Store or Ad Hoc Distribution

 - ◆ Pre-release Versions of iOS SDK

 - ◆ Code-level Technical Support



🍏 iOS: App Store



- ◆ Have to play by Apple's rules
- ◆ Set your own price & get 70% of revenue
- ◆ Serve ads from iAd Network & collect 70% of ad revenue
- ◆ Reach millions of customers
- ◆ Volume Purchase Program - Educational and Enterprise

🍏 iOS: Development

- ◆ Enterprise Program

- ◆ \$299 / yr

- ◆ In-house Distribution

- ◆ Pre-release Versions of iOS SDK

- ◆ Code-level Technical Support

- ◆ Must have valid Dun & Bradstreet Number (DUNS)



iOS: In-House

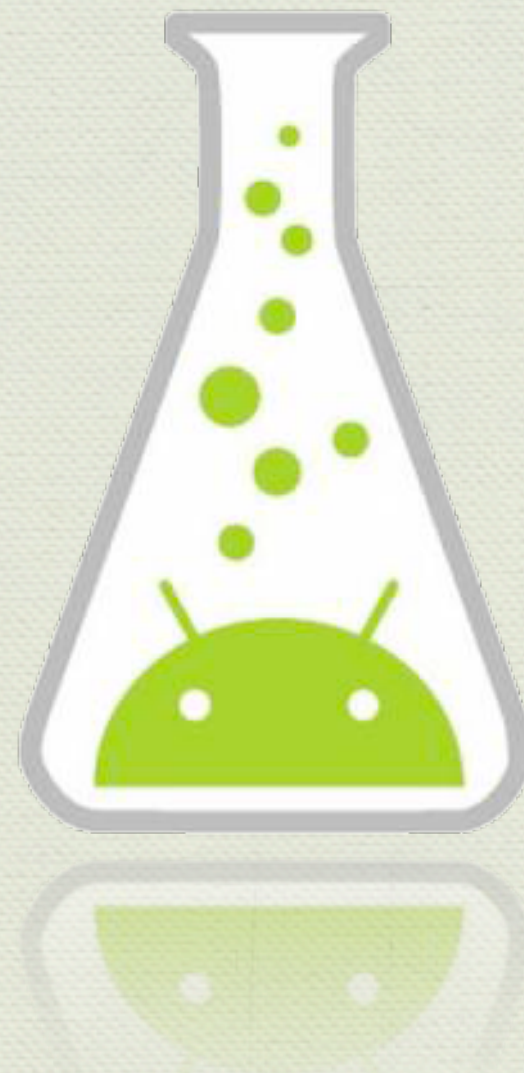
- ◆ Apps distributed internally *only*, not on the App Store.
- ◆ Can push via MDM
- ◆ Can host on internal or SaaS site and link employees to it
- ◆ Can use internal app store via MDM





Development

- ◆ FREE to develop apps
- ◆ Apps written in Java
- ◆ Supports compiling and packaging existing code written in C or C++
- ◆ Uses sandboxing, but different than Apple
- ◆ Must sign apps





Distribution

- ◆ Google Play
- ◆ Other app marketplaces: GetJar, AppBrain, SlideME, etc.
- ◆ Email
- ◆ Through a website





Security

Malware Threats to Android Platform



~50% Data Theft Trojans

25% SMS Trojans

18% Backdoor Threats

2% Trojan Spy

To Recap

- ◆ Any app is possible, use your imagination!
- ◆ Know your audience when choosing your platform.
- ◆ Secure, test & polish.
- ◆ Choose your distribution channels.
- ◆ Promote!

Links

- ◆ Apple Developers <https://developer.apple.com>
- ◆ Android Developers <http://developer.android.com/>
- ◆ Sencha <http://www.sencha.com>
- ◆ PhoneGap <http://www.phonegap.com>
- ◆ TestFlight <https://testflightapp.com/sdk/>
- ◆ HockeyApp <http://www.hockeyapp.net>