

# Mobile Enterprise Strategies

by

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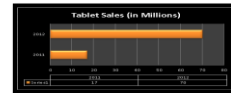
Heidi Prussing

## Problem Statement

A company's top management team including CEO, CFO, VP-for Global Sales and Marketing, VP-Technology, CIO is in the need to plan for their Mobile Enterprise Strategies to explore the new mobile technologies with business intelligence so that the company can stay innovative, competitive and possibly increase their capabilities, revenue/sales, and expand their global markets. The following report contains ideas and recommendations to assist them in their planning process.

## Introduction

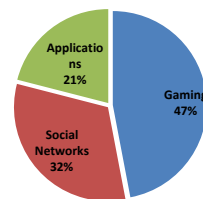
- 77% of the World's Population have a Mobile Phone
- 17 Billion text messages sent in 2000, compared to 8 trillion in 2011
- In 2011 48 Million People used their Phone for accessing Maps
- On average the average person checks the smartphone 120 times a day
- 30% of consumers communicate with brands via social networks.
- 5.4 Billion Mobile coupons we issued in 2011
- Tablet sales grow from 17 million in 2011 to 70 million in 2012



## Challenges

- Data Security
- Device Security
- Heterogeneous Platforms
- Uncertainty
- Unintended consequences
- Competition for Consumer's view time

App usage by consumers



# Opportunities

## Mobility is pervasive

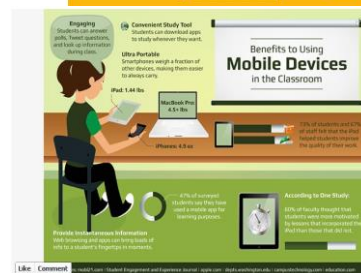
- one billion consumers will carry smartphones, with Apple Google, and [Microsoft](#) providing the software platforms for more than 90% of all devices. In addition, 350 million employees will use smartphones in their jobs.

## Spending is on the rise

- Forrester expects spending on [mobile](#) devices and apps to reach \$1.3 trillion by 2015 – representing 35% of the technology economy. More than half of business decision makers interviewed plan to increase their mobile apps budgets in 2012.

## Firm's Value Chain

- Sales and Marketing
- Inbound and Outbound Logistics
- Operations



## Current State of Enterprise Mobile Technologies

- Using VoIP to contact people around the world
- Holding virtual conferences
- Tracking projects
- Charging clients with online invoices
- Accessing office computer from any location
- Tracking appointments online
- ATnT office @ Hand

## Mobile Apps Currently being used in Industry

- [OmniFocus](#)
- [Twist](#)
- [SBA Gems](#)
- [ViewMyPaycheck](#)
- [Expensify](#)
- [Volute](#) (*Invoice*)
- [Zoho CRM](#) (*CRM- web based apps for small businesses*)

## Leaders of Mobile Enterprise Deployment

- Yahoo
- Mozilla
- SAP-AG (CRM)
- AT&T
- Universidad Católica San Antonio de Murcia
- Starbucks and McDonald
- Utility Trucks
- Ebay partnership with BestBuy, Shopkick
- Facebook
- SME using MDM (mobile device management software) to Manage Workers on the Go
- Garbage Trucks Company
- Police Cars
- Construction Company
- Netflix

## Future of Mobile Technology

- In the future touchscreens will become absolute as mobile devices recognize our voices and facial expressions.
- By 2013 more people will be accessing the web via smartphones than PC's
- Today 1 in 4 consumers have made a transaction via their mobile
- In 2013 its estimated that nearly 50 Billion Apps will be downloaded
- By 2015 over \$119 Billion will be spent on goods and services via the Mobile Phone
- Near Field Communications will turn mobiles into Point of sales notifies
- Vodafone estimates that by 2016 Mobile vouchering will be worth up to \$43 Billion Globally

## M-Commerce

- Its estimated that by 2015, the world's mobile [workforce](#) will grow to 1.3billion representing 37.2% of the total workforce.
- Retailers report a 75% better in-store shopper experience with ( MPMPOS OS ) Mobile [Point of Sale](#) Systems
- 67% of Shoppers cited a better in store experience with ( MPOS ) Mobile [Point of Sale Systems](#)
- 3 out of 4 Retailers have seen customers become more responsive to Mcommerce type Sale offers
- 75% of Retailers reported a rise in demand for a more personalized service when a Mcommerce Solution was employed.
- Its estimated that Ten million Businesses Globally that have started using Mcommerce Solutions
- Its estimated that 490 million People will use their [phone](#) to make mobile [payments](#) by the end of 2014
- [iPad](#) business deployment activation's has seen a rise of 40.8% – four times that of any other industry
- Its estimated that 20% of [Healthcare](#) providers are expected to adopt mobile technology within the next 12 months.
- Its estimated that 1 in 4 [Healthcare providers](#) who use electronic tablets within their practice.
- cite improving use of mobile technology a priority over next 12 months 2/3

## M2M communications

‘Telefonica’ predicts that future business will employ devices that communicate with each other from remote locations using the Internet, this is called **M2M** or **Machine-to-Machine** communications, and this will enable the automation of certain processes providing business with greater more efficient control over their assets [39].

## Telematics (Remotely controlled vehicles with no drivers)

- LTE enabled smart phone embedded cars by Verizon
- Google Car

## Recommendations

- CIOs need to be aware of [43]:
  - The Tools: The hardware and software required.
  - The Connectivity: The call and [data plans](#) and their associated costs and Management
  - The [security](#) of all of the data.
- CIOs need to rethink their roles, responsibilities, and skill sets within their IT organizations – much as they did with advent of the personal computer. One of the ways of accomplishing this is by establishment of a chief mobility officer, as well as the creation of a mobile architecture blueprint to manage mobile technology investments.

## Recommendations

- A dedicated communications director to market technology opportunities
- Measurement of mobile engagement, rather than return on [investment](#)
- A multiyear focus and coordination among mobile projects

The report concludes that an effective mobile strategy can lead to improved customer satisfaction, lower service costs through customer self-service, increased business productivity, lower internal costs, and significant new revenue sources.

## References

- "Marissa Mayer Gives All Yahoo Employees an iPhone 5 (or Nokia Lumia 920 / Android Phone)." *VentureBeat*, n.d. <http://venturebeat.com/2012/09/16/marissa-mayer-gives-all-yahoo-employees-an-iphone-5-or-nokia-lumia-920-android-phone/>.
- "How the Mobile Phone is changing the way we purchase," *technology-in-business.net*. [Online]. Available: <http://www.stumbleupon.com/su/2xecD1/www.technology-in-business.net/mobile-business/how-the-mobile-phone-is-changing-the-way-we-purchase/>. [Accessed: 24-Sep-2012].
- ITU World Telecommunication/ICT Indicators database
- IDC Worldwide Quarterly PC Tracker, January 12, 2011
- Gartner
- "Mobile Data Security | Apperian." [Online]. Available: <http://www.apperian.com/webinar-yes-you-can-have-federal-grade-mobile-data-security-too/>. [Accessed: 24-Sep-2012].
- IBM - Technical Workshop Mobile Enterprise - Italy." [Online]. Available: <http://www-01.ibm.com/software/it/events/mobilenetenterprise/>. [Accessed: 24-Sep-2012].
- Michael Brenner. (2012, August 21). *How Mobility Will Change Your Customer Relationships*. Retrieved from Business Innovation from SAP: <http://blogs.sap.com/innovation/mobile-applications/how-mobility-will-change-your-customer-relationships-014379>
- "Does Your Business Need an App?," *SteamFeed*. [Online]. Available: <http://www.steamfeed.com/does-your-business-need-an-app/>. [Accessed: 24-Sep-2012].
- "Best Apps for small and medium sized Business," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/links-to-other-various-online-business-tech-resources/best-apps-for-small-and-medium-sized-business/>. [Accessed: 24-Sep-2012].



# References

- Tofel, Kevin C. "One Line of HTML Can Wipe or Reset Samsung Smartphones." *GigaOM*, September 25, 2012. <http://gigaom.com/mobile/one-line-of-html-can-wipe-or-reset-samsung-smartphones/>.
- *How tablets & smartphones are affecting business - Sky Business News - John Golden*. 2012.
- "Mobile Will Grab TV Advertising's Crown | TechCrunch." *TechCrunch*, n.d. <http://techcrunch.com/2012/09/25/mobile-will-grab-tv-advertisings-crown/>.
- "50% of Facebook Fans Prefer Brand Pages to Company Websites [INFOGRAPHIC]", n.d. <http://blog.hubspot.com/blog/tabid/6307/bid/33629/50-of-Facebook-Fans-Prefer-Brand-Pages-to-Company-Websites-INFOGRAPHIC.aspx>.
- "7 Short Stories About the Mobile Networks." *Cellular-news*, n.d. <http://www.cellular-news.com/story/56436.php?source=rss>.
- "Email Marketing," *securepaynet.net*. [Online]. Available: [http://www.stumbleupon.com/su/112023518/www.securepaynet.net/business/email-marketing.aspx?ci=42405&prog\\_id=477606](http://www.stumbleupon.com/su/112023518/www.securepaynet.net/business/email-marketing.aspx?ci=42405&prog_id=477606). [Accessed: 24-Sep-2012].
- 17. Tode, C. (2012, September 24). Walmart dominates mobile retail check-ins: report. Retrieved from Mobile Commerce Daily: <http://www.mobilecommercedaily.com/walmart-dominates-mobile-retail-check-ins-report>
- 18. "You Won't Expect to Find Tablets in These 4 Workplaces." *Mashable*, n.d. <http://mashable.com/2012/09/24/tablets-unusual-workplaces/>.
- 19. "Verizon's Push for the LTE Connected Car," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/verizons-push-for-the-lte-connected-car/>. [Accessed: 24-Sep-2012].
- 20. "Car Locator," *windowsphone.com*. [Online]. Available: <http://www.windowsphone.com/en-us/store/app/car-locator/fe53df6e-f101-e011-9264-00237de2db9e>. [Accessed: 24-Sep-2012].

# References

21. Courbanou, D. (2012, September 19). *SAP Delivers Custom Mobility App Design Center*. Retrieved from Channel Nomics, The Business of Technology: <http://channelnomics.com/2012/09/19/sap-mobile-first-mobility-design-center/>
22. "iPads in the Classroom: Asset or Distraction?" *Online Colleges*. [Online]. Available: <http://www.onlinecolleges.net/2012/09/24/ipads-in-the-classroom-asset-or-distraction/>. [Accessed: 24-Sep-2012].
23. "How Business can benefit from new emerging Technologies," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/how-business-can-benefit-from-new-emerging-technologies/>. [Accessed: 24-Sep-2012].
24. *AT&T Office@Hand*. (n.d.). Retrieved September 26, 2012, from <http://www.wireless.att.com/businesscenter/business-programs/small/solutions/office-at-hand/>
25. "How Business can benefit from new emerging Technologies," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/how-business-can-benefit-from-new-emerging-technologies/>. [Accessed: 24-Sep-2012].
25. "Best Apps for small and medium sized Business," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/links-to-other-various-online-business-tech-resources/best-apps-for-small-and-medium-sized-business/>. [Accessed: 24-Sep-2012].
26. "Best Invoicing apps for Small Business," *technology-in-business.net*. [Online]. Available: <http://www.stumbleupon.com/su/Ad6HAP/www.technology-in-business.net/links-to-other-various-online-business-tech-resources/best-invoicing-apps-for-small-business/>. [Accessed: 24-Sep-2012].
27. "Here is The Plan Marissa Mayer Just Announced To Yahoo Employees." *Business Insider*, n.d. <http://www.businessinsider.com/here-is-the-plan-marissa-mayer-just-announced-to-yahoo-employees-2012-9>.
28. John Reynolds. "Mozilla Hires ex-LG Marketer to Lead Mobile Launch." *Marketingmagazine.co.uk*, September 25, 2012. <http://www.brandrepublic.com/news/1151527/mozilla-hires-ex-lg-marketer-lead-mobile-launch/7DCMP+ILC+SEARCH>.
29. "SAP apuesta por la movilidad en nube." [Online]. Available: <http://entertech.wordpress.com/2012/09/18/sap-apuesta-por-la-movilidad-en-nube/>. [Accessed: 24-Sep-2012].
30. "Spanish university to roll out NFC services across entire campus - NFC World," *NFC World*. [Online]. Available: <http://www.nfcworld.com/2012/09/24/318048/spanish-university-to-roll-out-nfc-services-across-entire-campus/>. [Accessed: 24-Sep-2012].
31. Rima Kats. "Are Mobile Payments the Demise of Credit Cards?" *Mobile Commerce Daily*, August 24, 2012. <http://www.mobilecommercedaily.com/are-mobile-payments-the-demise-of-credit-cards>.
32. "Facebook Mobile Payments Via Carrier Billing (And Bango) Live in U.S., UK And Germany | TechCrunch." *TechCrunch*. [Online]. Available: <http://techcrunch.com/2012/09/24/facebook-mobile-payments-via-carrier-billing-and-bango-now-live-in-u-s-uk-and-germany/>. [Accessed: 24-Sep-2012].
33. "How Businesses Use MDM to Manage Workers on the Go," *BizTech Magazine*. [Online]. Available: <http://www.biztechmagazine.com/article/2012/08/how-businesses-use-mdm-manage-workers-go>. [Accessed: 24-Sep-2012].
34. "You Won't Expect to Find Tablets in These 4 Workplaces." *Mashable*, n.d. <http://mashable.com/2012/09/24/tablets-unusual-workplaces/>.
35. Kim, Ryan. "Netflix and Good Technology Like NFC for Building Access." *GigaOM*, September 24, 2012. <http://gigaom.com/2012/09/24/netflix-and-good-technology-like-nfc-for-building-access/>.
36. "eBay's RedLaser Takes On Shopkick; Adds Geofencing And Deals With Best Buy To Barcode Scanning App | TechCrunch." *TechCrunch*, n.d. <http://techcrunch.com/2012/09/17/ebays-redlaser-takes-on-shopkick-adds-geofencing-and-deals-with-best-buy-to-barcode-scanning-app/>.
37. "How the Mobile Phone is changing the way we purchase," *technology-in-business.net*. [Online]. Available: <http://www.stumbleupon.com/su/2xecD1/www.technology-in-business.net/mobile-business/how-the-mobile-phone-is-changing-the-way-we-purchase/>. [Accessed: 24-Sep-2012].
38. "The Rise of MCommerce in Business," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/mobile-business/the-rise-of-mcommerce-in-business/>. [Accessed: 24-Sep-2012].
39. "The future of business & M2M or Machine-to-Machine: communications," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-technology-videos/4279/>. [Accessed: 24-Sep-2012].
40. "Verizon's Push for the LTE Connected Car," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/verizons-push-for-the-lte-connected-car/>. [Accessed: 24-Sep-2012].
41. "Google's self-driving car | SmartPlanet." [Online]. Available: <http://www.smartplanet.com/blog/thinking-tech/googles-self-driving-car/5445>. [Accessed: 24-Sep-2012].
42. "2011 Mobile Payments Outlook | KPMG | GLOBAL," 11-Jul-2011. [Online]. Available: <http://www.kpmg.com/global/en/issuesandinsights/articlespublications/mobile-payments/pages/default.aspx>. [Accessed: 24-Sep-2012].
43. "What every CIO needs to know about managing a Mobile Workforce," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-technology-videos/what-every-cio-needs-to-know-about-managing-a-mobile-workforce/>. [Accessed: 24-Sep-2012].

# References

21. Courbanou, D. [2012, September 19]. *SAP Delivers Custom Mobility App Design Center*. Retrieved from Channel Nomics, The Business of Technology: <http://channelnomics.com/2012/09/19/sap-mobile-first-mobility-design-center/>
22. "iPads in the Classroom: Asset or Distraction?" *Online Colleges*. [Online]. Available: <http://www.onlinecolleges.net/2012/09/24/ipads-in-the-classroom-asset-or-distraction/>. [Accessed: 24-Sep-2012].
23. "How Business can benefit from new emerging Technologies," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/how-business-can-benefit-from-new-emerging-technologies/>. [Accessed: 24-Sep-2012].
24. *AT&T Office@Hand*. (n.d.). Retrieved September 26, 2012, from <http://www.wireless.att.com/businesscenter/business-programs/small/solutions/office-at-hand/>
25. "How Business can benefit from new emerging Technologies," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/how-business-can-benefit-from-new-emerging-technologies/>. [Accessed: 24-Sep-2012].
25. "Best Apps for small and medium sized Business," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/links-to-other-various-online-business-tech-resources/best-apps-for-small-and-medium-sized-business/>. [Accessed: 24-Sep-2012].
26. "Best Invoicing apps for Small Business," *technology-in-business.net*. [Online]. Available: <http://www.stumbleupon.com/su/AdGHAP/www.technology-in-business.net/links-to-other-various-online-business-tech-resources/best-invoicing-apps-for-small-business/>. [Accessed: 24-Sep-2012].
27. "Here Is The Plan Marissa Mayer Just Announced To Yahoo Employees." *Business Insider*, n.d. <http://www.businessinsider.com/here-is-the-plan-marissa-mayer-just-announced-to-yahoo-employees-2012-9>.
28. John Reynolds. "Mozilla Hires ex-LG Marketer to Lead Mobile Launch." *Marketingmagazine.co.uk*, September 25, 2012. <http://www.brandrepublic.com/news/1151527/Mozilla-hires-ex-LG-marketer-lead-mobile-launch/7DCMP-ILC-SEARCH>.
29. "SAP apuesta por la movilidad en nube." [Online]. Available: <http://enteratech.wordpress.com/2012/09/18/sap-apuesta-por-la-movilidad-en-nube/>. [Accessed: 24-Sep-2012].
30. "Spanish university to roll out NFC services across entire campus - NFC World," *NFC World*. [Online]. Available: <http://www.nfcworld.com/2012/09/24/318048/spanish-university-to-roll-out-nfc-services-across-entire-campus/>. [Accessed: 24-Sep-2012].
31. Rima Kats. "Are Mobile Payments the Demise of Credit Cards?" *Mobile Commerce Daily*, August 24, 2012. <http://www.mobilecommercedaily.com/are-mobile-payments-the-demise-of-credit-cards>.
32. "Facebook Mobile Payments Via Carrier Billing (And Bang) Live in U.S., UK And Germany | TechCrunch," *TechCrunch*. [Online]. Available: <http://techcrunch.com/2012/09/24/facebook-mobile-payments-via-carrier-billing-and-bango-now-live-in-u-s-uk-and-germany/>. [Accessed: 24-Sep-2012].
33. "How Businesses Use MDM to Manage Workers on the Go," *BizTech Magazine*. [Online]. Available: <http://www.bitechmagazine.com/article/2012/08/how-businesses-use-mdm-manage-workers-go>. [Accessed: 24-Sep-2012].
34. "You Won't Expect to Find Tablets in These 4 Workplaces." *Mashable*, n.d. <http://mashable.com/2012/09/24/tablets-unusual-workplaces>.
35. Kim, Ryan. "Netflix and Good Technology Like NFC for Building Access." *GigaOM*, September 24, 2012. <http://gigaom.com/2012/09/24/netflix-and-good-technology-like-nfc-for-building-access/>.
36. "eBay's RedLaser Takes On Shopkick; Adds Geofencing And Deals With Best Buy To Barcode Scanning App | TechCrunch," *TechCrunch*, n.d. <http://techcrunch.com/2012/09/17/ebays-redlaser-takes-on-shopkick-adds-geofencing-and-deals-with-best-buy-to-barcode-scanning-app/>.
37. "How the Mobile Phone is changing the way we purchase," *technology-in-business.net*. [Online]. Available: <http://www.stumbleupon.com/su/2xecD1/www.technology-in-business.net/mobile-business/how-the-mobile-phone-is-changing-the-way-we-purchase/>. [Accessed: 24-Sep-2012].
38. "The rise of MCommerce in Business," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/mobile-business/the-rise-of-mcommerce-in-business/>. [Accessed: 24-Sep-2012].
39. "The future of business & M2M or Machine-to-Machine communications," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-technology-videos/4279/>. [Accessed: 24-Sep-2012].
40. "Verizon's Push for the LTE Connected Car," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-articles/verizons-push-for-the-lte-connected-car/>. [Accessed: 24-Sep-2012].
41. "Google's self-driving car | SmartPlanet." [Online]. Available: <http://www.smartplanet.com/blog/thinking-tech/googles-self-driving-car/5445>. [Accessed: 24-Sep-2012].
42. "2011 Mobile Payments Outlook | KPMG | GLOBAL," 11-Jul-2011. [Online]. Available: <http://www.kpmg.com/global/en/issuesandinsights/articlespublications/mobile-payments/pages/default.aspx>. [Accessed: 24-Sep-2012].
43. "What every CIO needs to know about managing a Mobile Workforce," *Technology-in-Business.net*. [Online]. Available: <http://www.technology-in-business.net/featured-technology-videos/what-every-cio-needs-to-know-about-managing-a-mobile-workforce/>. [Accessed: 24-Sep-2012].