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Social Media and Mobile for Measurable Results in E-Commerce

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Abstract

Social Media and mobile commerce changes the way organizations do business; Social networking has become popular and raised a controversial question on its profitability and future influences. This paper is to provide a general snapshot of social networking and mobile, summarize the benefits and limitations of social commerce and describe mobile social commerce. It also focus on understanding the relationship between m-commerce and e-commerce, discuss the current advantages and disadvantages of ecommerce and m-commerce, identify different m-commerce applications, study of security issues in online marketing and their effect on security and privacy issues. This paper is targeted towards business and IT leaders considering social media and mobile application in some or all of their business applications.

1. Introduction

New social networking and social media technologies are widely supposed to offer business and governmental organizations a powerful means to improve their communications, processes and ultimately performance. Popular business and technology journals are especially optimistic about the positive impacts that these technologies will have on the organizations that adopt them. Addressed the potential risks and challenges of the use of social networking and social media platforms by organizations. This paper gives a survey of social media and mobile-commerce, different areas, applications of m-commerce and opportunities. Also advantages and disadvantages of m-commerce, focus on challenges and risks of conducting social commerce, security and privacy issues. This Paper is organized as follows: section two demonstrates the social media and m-commerce background; section three discusses areas, application of m-commerce and opportunities. Section four highlights social media advantages and disadvantages. While benefits of social media and m-commerce in the fifth section, section sixth demonstrate challenges and risks of conducting social commerce, section seventh discusses security and privacy issues, finally conclusion and future work are in the last section.

2. Background and Related Work

2.1. Related Work

Considering the nature of work, it would be difficult to group the literature under any specific disciplines. Further evidence of this can be seen from the fact that m-commerce and social commerce articles are scattered across various fields in disciplines such as

business, management, marketing, engineering, information technology (IT), and information systems (IS). In literature review, some researchers provide the main concepts and definition like Kaplan and Haenlein (2010) define Social Media as a group of Internet-based applications that allows the creation and exchange of User-Generated Content. Social media enables the interactions among people and the creation, sharing, and exchange of information and ideas. It can take many different forms, including Internet forums, weblogs, social blogs, micro blogging, wikis, podcasts, pictures, video, rating and reviews, social bookmarking and Social Networks. (Ahlqvist, Bäck, Et Al., 2008)

Other researches focus on the growth of m-commerce and social commerce, the use of SNs has reached an enormous scale. In general terms, every minute 100,000 tweets are sent and around 684,478 pieces of content are shared on Facebook. Other statistics show that approximately 48 hours of video are uploaded to YouTube and 3,600 photos are shared on Instagram every minute. (James, 2012) The number of people using social network has been increasing every year. In 2008, in the U.S., 24% of the population had a personal profile in any Social Network. In 2012, this number increased dramatically to 56% (Edison Research, 2012). Not only the number of users but also the average time spent on Social Networks have been rising, representing, nowadays, 25% of the total time that a regular user spends online. People have been spending more time online, especially in Social Networks, than in 'offline' activities. In fact, Facebook outperformed Google as the most frequently visited website of the week in the U.S. in March 2010. (Dougherty, 2010) According to Fortune 500 Social Media Statistics (Barnes E Andonian, 2011), 58% of Fortune 500 companies have an active corporate Facebook account while 62% have an active corporate Twitter account. Regarding advertising on Social Media during the pre-sale phase, despite 33% of users find ads on Social Networks more annoying than other online ads there is still an opportunity to be exploit. Approximately 26% of users are more likely to pay attention to an ad that has been posted by one of their Social Network acquaintances and 17% of them feel more connected to brand seen on Social Networking websites. (The Nielsen Company, 2012) Worldwide advertisement spending on SNs is therefore expected to grow from US\$ 5.2 billion in 2011 to US\$ 11.9 billion in 2014 (Dwyer, Hiltz Passerini, 2007) and SC sales are expected to climb from \$9.2 billion in 2012 to \$30 billion in 2015 Social Media can directly influence the purchasing phase, a survey made by Booz & Company (2011) with consumers who spend at least one hour a month on Social Networking sites and who have bought at least one product online in the last year shows that 27% of the respondents would be willing to purchase physical goods through SNs while the remaining 73% would not purchase due to concerns related to security and privacy - two areas that many big Social Networking sites are already working to improve. (Eecke Truyens, 2010).

Some researches focus on the influences of social

commerce, Social Media influences customers before, during and after the purchasing action (Ickler, Schülke, et al., 2009). Companies have been presenting their brands and products on SNs to leverage their popularity. (Heidemann, Klier Probst, 2012). In fact, social ads can be more effective than traditional advertisement. According to a survey conducted by Nielsen (2012), after seeing social ads on Facebook 15% of users shared the ad, 26% liked the ad and 14% purchased the product. In addition, 90% of consumers trust peer recommendations, compared to only 14% who trust companies' recommendation. In this way, online Word-of-Mouth (WOM) has become a powerful tool to bring brand awareness and profit to the companies (Bazaar Voice, 2012). Social Media influences consumers' decisions as consumers are more likely to make buying decisions based on what they read and see in social platforms. Besides, it is no longer enough to have standard product descriptions with static text and descriptions, shoppers are expecting an interactive and more social experience online. (IBM, 2009)

Finally, some researches focus on technologies tools to mine and analyze social media data, several techniques and efficient algorithms are proposed for discovering patterns from m-commerce and social commerce data, (Tseng et al.), first studied the problem of mining associated services in mobile web environments. It is mainly used to understand the behavior of mobile users. The patterns are mined based on two kinds of hierarchies, the location and service hierarchies. (Y. Zheng et al.), proposed a method for mining the interesting locations and travel sequences in a given geospatial region, J. Pei et al, proposed a method, namely WAP-Mine, for discovering the web access patterns from web logs by using a tree-based data structure without candidate generation. (Tseng et al.), modelled an efficient mobile behavior prediction system. When users moves between the stores in the mobile network, their location and services are stored in a mobile transaction database. It has an offline mechanism for mining and online engine for mobile behavior prediction. (Eric Hsueh-Chan Lu Et al.), proposed a framework called MCE framework for mining and prediction of mobile users' movements and purchasing transactions. Its goal is to predict the behavior of individual users. The mobile network database maintains detailed store information which includes the location. The mobile users' moves between the stores and purchase the items, and all these information are stored in mobile transaction database. [14]

2.2. History of Mobile-Commerce

M-commerce, stands for mobile-commerce, takes traditional e-commerce models and powers emerging new wireless technologies to permit mobile access to the Web. Wireless Web technology will be used to enable the extension of existing Web business models to service the mobile work force and customer of the future. Wireless networks utilize newly available bandwidth and communication protocols to connect mobile users to the Internet. The key technologies here are cell phone-based 3G,

Wi-Fi, and Bluetooth. The introduction of the iPhone in June 2007 and the 3G version in July 2008 has brought about a resurgence of interest in 3G technologies and their potential role in e-commerce. The standards implementing Wi-Fi were first introduced in 1997. Two new wireless technologies that may have an impact are Ultra wideband, which will be able to transfer large files such as movies over short distances, and Zigbee, which, like Bluetooth, will connect devices to each other but at a longer range and with lower power requirements. With the introduction of the iPhone and other phones with similar capabilities, this has begun to change on September 2008 Internet Retailer survey found that almost 7% of Web retailers now have an m-commerce site (Brohan, 2008). The server-side hardware and software platform is in place, and the basic bandwidth is ready. As with all areas of e-commerce, the challenge for businesses will be finding ways to use m-commerce to make money while serving customer needs. Currently, demand is highest for digital content such as customized ringtones, games, and wallpaper. With the introduction of the iPhone, mobile search applications are likely to become more popular. Consumer applications are also beginning to appear in high-volume personal transaction areas. [4]

2.3. Essential Characteristics of Social Media and M-Commerce

Many aspects and definitions should be clear enough for better understanding of social media and mobile commerce

Social computing is computing systems that contain social communications and behavior. It is performed with a set of tools that includes blogs, wikis, social network services, and other social software, and social marketplaces as Amazon. [5]

The Social Web "is a set of social relations that links people through the Web." The social web is quickly change work, entertainment, learning, and human interactions. [5]

F-Commerce

A major force in the social web revolution is Facebook with its over one billion registered members. In 2013, Facebook is considered the "king" of social networks and the implementer of many commercial innovations, known as f-commerce. [5]

Social media

can be defined as online text, image, audio, and video content offered on Web 2.0 platforms and tools, that people use for social interactions and conversations, mainly to share opinions, experiences, insights, and perceptions via text, photos and videos such as YouTube and Twitter [5]

Social Commerce: Definitions and Evolution

As it is a new field that involves several academic and professional disciplines, there is no agreed upon definition or description of the content and boundaries of the social commerce field. [5]

Social commerce (SC): or social business

It can be defined as" e-commerce activities delivered via social media" another definition for Social commerce "is a combination of e-commerce, e-marketing" [5]

Enterprise 2.0

The second major component of social commerce is Enterprise 2.0, which is used by an increasing number of companies to conduct several social media and commerce activities inside the enterprises it defined as "the use of social software platforms within companies, or between companies and their partners or customers" McAfee (2010). It also defines the use of social media technologies and Web 2.0 tools within an organization is called Enterprise 2.0, or social enterprise as Fair Trade USA. It is based on social media activities, such as publishing, sharing, collaborating, and creating knowledge. The major practical applications are in network recruitment, idea generation social via crowdsourcing, and collaboration via blogs, wikis, and other tools.

Social media marketing (SMM):

It is defined as "the application of marketing communication and other marketing tools with social media". An example of great social media marketing The little snack cookie that could, Oreo has a very playful Twitter account that highlights new products including collaborations responds to users comments, and deftly incorporates puns, pickup lines and one-liners into their feed. They also use pictures and short, 6-second Vine videos to get people talking. By interacting with fans and never taking themselves too seriously, Oreo has developed a rabid following from celebrities, customers and other companies.

Social networking

A social network service emphases on the building and verifying of online social networks for communities of people who share interests and activities, or who are interested in exploring the interests and activities of others, and which necessitates the use of software. [7] Academia.edu is one of social networking site for academics/researchers.

Social Commerce

Social commerce emerged from the integration of several fields which are shown in Figure 1. For example, a major origin to social commerce was the development of web 2.0 technologies which is a major contributor to social media, which is the major driver of social commerce. Turban et al (2016). Social commerce can be defined as "A perfect marriage between "social media" and "e-commerce" which involves leveraging social media and social interactions to help promote the buying and selling of products and services online." Help organization to assist you, the business owner in understanding why it makes commercial sense to find out where your customers are congregating online and provide them the opportunity to connect with your brand to make purchases, provide feedback and to recommend your products or services to others in their social graph. [9]



Figure 1. The major roots of social commerce.

Mobile Social Networks

Mobile commerce is spreading at lightning speed in social networks and social commerce applications. [5] Instagram, Facebook, Tumblr, Twitter and LinkedIn are the most used social networks on mobile

Mobile social networking

Refers to social networking where members chat and connect with one another using cellphones or other mobile devices. There are two basic types of mobile social network infrastructures. The first type includes companies that partner with wireless carriers to connect with their communities via the default start pages on cellphone browsers. The second type of infrastructure includes companies that do not have such carrier relationships and consequently must rely on other methods to accommodate users. [5]

2.4. M-Commerce VS E-Commerce

M-Commerce is a part of e-commerce which is done through mobile phones. It allows the person to do the transaction through mobile phones. It gives each and every person a choice to shop from anywhere. It is a way by which companies and sellers come closer to the end user. Though there are many similarities, there are many differences between m-commerce and e-commerce as Internet connectivity is always needed in e-commerce but mcommerce does not have such boundaries, Video conferencing can also be done through m-commerce but it is not possible in e-commerce, Electricity is also one of the factor of necessity which is not one in m-commerce, Mcommerce is costlier than e-commerce, also M-commerce is much easier than e-commerce, Providing wider reach, Reducing transaction cost, also Streamline business processes, Competitive pricing and Reducing time to order.

3. Areas, Application of M-Commerce and Opportunities

3.1. Areas

In the current commerce industry, mobile commerce or M-Commerce has been entered in finance, services, retails, and telecommunication and information technology services. In these sectors, M-Commerce is not only being widely accepted but also it is being more used as a popular way of business/ commerce as Finance Sectors, Telecommunication Sectors, Service / Retail sectors and Information Sector.

3.2. Applications

There are many applications that use m-commerce which cover different business areas such as Mobile ticketing, Mobile vouchers, coupons and loyalty cards, Content purchase and delivery, Location-based services, Information services, Mobile banking, Mobile brokerage and Mobile marketing and advertising.

3.3. Opportunities

Many good opportunities for improve profitability and effectiveness by incorporating social networking. First of all, by finding the reality of decreasing trust from traditional paid messages, the trust from social networking is crucial for advertisement. People are provided a number of high quality and personalized reviews of a product from trusted sources to convince them to buy. This can improve profitability, effectiveness and efficiency of advertising. Also, by incorporating social networking and other technologies such as recommendation system, E-enterprises can reach useful data for predictions of market trends, customer behaviors and so forth. It also can help the company establish its competitive advantage differentiating from others.



Figure 2. The most relevant example of a SC platform [15].

The data presented in Figure 2 according to study provided by [15], it is emerged that the most SC implementation is Amazon, followed by eBay and Groupon, then Taobao and Overstock Auctions while This Next, Wists and Wal-Mart. With regards to Amazon, the analyzed articles provide several reasons to support the idea that it is the most relevant example of a SC platform. Firstly, Amazon sells tens of millions of books, CDs, and DVDs to more than 17 million customers, according to its website.

Secondly, the Economist has recently ranked it as the most visited US website. Finally, it was one of the pioneers in implementing social features in e-commerce platforms.

4. Benefits of Social Media and M-Commerce

Experts stressed that among the potential organizational benefits of using SN and SM are: creating new efficiencies within the enterprise, focusing more on people, speeding up innovation as well as creating new services that did not previously exist, improving services and products, and delivering better and more efficient public services in the case of government use of the technologies. There were several conversations about the motivations and reasons for organizations to invest in the technologies. It was noted that companies need to understand the marketplace before taking any decisions. Any plan to use a SN or SM technology ought to address a real business or societal problem and not be pursued just because it's fashionable. Participants discussed the extent to which organizational use of SN and SM technologies is simply about enhancing advertising and marketing there appeared to be agreement that these technologies have a clear role to play in better understanding customer preferences. The age of mobile shopping is here to stay, consumers can access millions of products at the palm of their hands and retailers can increase their reach and overall sales in spite of all of this there are many bad sites which eat up customers'' money. There is no guarantee of product quality. Mechanical failures can cause unpredictable effects on the total processes. There are many hackers who look for opportunities, and thus an ecommerce site, service, payment gateways; all are always prone to attack.

First benefits in terms of employees as Speedier access to organizational knowledge, Speedier access to internal expertise, Greater collaboration opportunities – Enterprise 2.0 may deliver value by helping close colleagues work better, but some argue that the platforms should instead be configured and governed so that greater interpersonal ties can be nurtured with co-workers with whom employees are not already collaborating, Also Reduced internal communication costs, Improved training processes and Improved recruitment of new employees. [2]

Second Benefits in terms of customer engagement as more effective branding, stronger brand loyalty and improved marketing, including stronger customer dialog. Also Ability

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to mine and analyze customer data more effectively, Ability to personalize marketing activities based on customer interests, improved customer service and support, Better product development also Increased customer satisfaction and reduced marketing costs. [2]

Third Benefits to external partners as suppliers and other business partners as Speedier access to external knowledge and improved information sharing, reduced external communication costs also improved collaboration and innovation opportunities and Exploiting new marketing opportunities. [2] Fourth Benefits to Customers as Customers are exposed to special deals for large savings, Purchases are better matched with specific needs, wants, tastes, and wishes of customers, this increases satisfaction and reduces product choice decision time also It is easy for customers to use the technology, Social commerce fits the mobile device lifestyle well, Increased trust is developed in vendors, customers can get better customer service from vendors, customers can meet new friends and socialize online. [5]

Fifth Benefits to Retailers as Vendors gets free Word-ofmouth marketing, Increased website traffic, which increase revenue and sales also Increased sales as collaborative filtering and narrowly.[5]

Finally, Benefits to other types of Enterprises as Reduce costs via innovative methods such as using the collective intelligence of employees and business partners Foster better external relationships; for example, with partners and channel distribution members also Increase collaboration and improve communication within the enterprise and with business partners Foster better internal relationships by increasing employee productivity and satisfaction it also Provide free advice to small enterprises by other enterprises and experts, Understand that it is usually not expensive to install and operate SC systems and Conduct market research quickly and inexpensively and get feedback from customers, employees, and business partners also Increase market share and margins. And Build brands through conversations and social media promotions, Enhance customer service and support. [5] A summary of added benefits of social media to m-commerce are shown in Table 1.

Business Partner	Benefits
Employees	Reduced internal communication costs Improved training processes
	Improved recruitment of new employees
Customer engagement	Speedier access to organizational knowledge Including stronger customer dialog.
	Ability to mine and analyze customer data. Increased customer satisfaction and reduced marketing costs
External partners	Speedier access to external knowledge.
	Improved information sharing Reduced external communication costs
	Improved collaboration and innovation New marketing opportunities
Customers	Purchases are better matched with specific needs of customers.
	Increases satisfaction and reduces product choice decision time Better customer service from vendors.
	Customers can meet new friends and socialize online.

Business Partner	Benefits
Retailers	Free Word-of-mouth marketing. Increased website traffic, which increase revenue.

Here some advantages of social media and m-commerce are described below.

1) Convenience

It is a true convenience to do much from a handy device via M-Commerce. With wherever you are, in just a few clicks on your mobile device, you can already do shopping, banking and download media files.

2) Flexible Accessibility

User can be accessible via mobile phones and at the same time be accessible online too through logging on to various mobile messengers like Yahoo and other networking platforms. On the other hand, user may also choose not to be accessible by shutting down his mobile device, which at times can be a good thing.

3) Easy Connectivity

As long as the network signal is available, mobile devices can connect and do commerce transactions, mobile to mobile and even mobile to other devices. No need for modem or WI-FI connectivity set up

4) Personalization

Each mobile device is usually dedicated to a specific user, it is personal. You can do whatever you want to your mobile device, modify the wallpaper, change view settings or modify contact information as you send emails or e-payments.

5) Time Efficient

Doing M-Commerce transactions do not require the user to plug anything like personal computer or wait for the laptop to load. Just hit the on button of your mobile device and you're ready to go

6) No Standing

In queue or being placed on Hold evermore. For clientele, this is one of the most popular conveniences of ecommerce.

7) Easier to Compare Prices:

There are several shopping search engines and comparison shopping websites that help consumers locate the best prices.

8) Access to Stores Located Remotely:

Especially for people who are not situated in major urban centers, this can be a big advantage. Likewise ecommerce opens new markets for ecommerce businesses.

9) No Need for a Physical Store:

Since there is no need for a physical store, ecommerce businesses save on one of the biggest cost overheads that retailers have to bear.

10)Lots of Choices:

11)Stores Are Open All the Time

12) Ability to Buy and Sell to Other Consumers:

Auction sites and listing sites allow individuals to buy and sell from each other. SUPPORT consumer to consumer (C2C).

13) Ability to Scale up Rapidly:

Ecommerce businesses are able to scale up easier than physical retailers, as they are not bound by physical limitations. 14)Ease of Communication:

Since the ecommerce merchant captures contact information in the form of email, sending out automated and customized emails is quite easy.

15)Superior Inventory Management.

16)Reduced Employee Costs:

Since ecommerce processes are automated to a large extent; fewer employees are required for lower-end jobs.

5. Challenges and Risks of Conducting Social and M-Commerce

On the other hand there are considerable challenges and risks that must be addressed for conducting m-commerce and social commerce

5.1. Risks

First there are some risks faces organizations: they are very often structured hierarchically. Social networking and social media platforms may clash with these organizational structures. Also clashes between new social technologies and the norms of behavior and levels of accountability and control that pre-exist the technology's introduction. Second there are some risks faces employees: such as first employers may be worried about their employees posting hateful, inappropriate or critical material on a public-facing social network. also the loss of commercially sensitive and private data on these systems, as well as data ownership. Also the risks include capturing and demonstrating in a repeatable and formal way. [2] Representative risk factors are difficulties in justification of SC initiatives to upper management, security and privacy issues, and possibilities of fraud, legal concerns, and a waste of time by employees during work. Companies also risk loss of control over their brand images and reputations in social media conversations and product review sites, which can affect product sales. [5]

5.2. Challenges

Simply thinking social networking as something money promising, however, probably may cause a failure of investment as customers or online surfers may consider advertisements offensive and intrusive. It is suggested that overstatement may arise and careful exploration should be conducted. [7]

The most formidable challenges for Facebook as one of the most social commerce application are: first challenge is budging the poor on-Facebook metrics. Even for off-Facebook efforts, such as when shoppers share items they've purchased or reviews they've written or even products that they like, the overall influence of those actions is relatively small when shared on a Facebook wall. In addition to generally low metrics, companies need to contend with wall posts being turned off, a post getting lost on a wall, or a post being deprioritized by Facebook's algorithm for popularity and relevance. Second challenge is Facebook is not a search engine because it is a directory and a communication tool and, as a result, a place where relatively few shoppers engage with brands. Third challenge is the payment method with Facebook: Payment systems, however, are complex and labor-intensive to build and maintain, and retailers are unlikely to adopt another payment form given that many have yet to even adopt PayPal, which is a far more common, mature, and proven online standard. Fourth challenge concerns with the privacy issues: Particularly on issues related to personal financial information social networks fare particularly poorly. [8] A summary of risks and challenges added by the social media to m-commerce are shown in Table 2.

Table 2. A summary of risks and challenges added by the social media to mcommerce.

Risks	Challenges
Clash with organizational structures	budging the poor on-Facebook metrics
Employee lose loss of commercially sensitive and private data	few shoppers engage with brands
Security and possibilities of fraud	Payment systems are complex and labor-intensive to build and maintain
Waste of time by employees during work	Privacy for personal financial information
Loss of control over their brand	
images	

Here some disadvantages of social media and mcommerce are described below.

- 1) Technology constraints of mobile devices (memory, Processing power, display capabilities, input methods).
- 2) User interface is often difficult to learn how to use.
- 3) Use of graphics limited
- 4) WAP and SMS limited to small number of characters and Text.
- 5) Limited bandwidth
- 6) Small screens of most devices still limit types of file and data transfer.
- 7) Cost of establishing mobile and wireless broadband Infrastructure.
- 8) Small screens of most devices still limit types of file and data transfer (i.e. streaming videos, etc.)
- Standards guiding applications and technology development and connection(s)
- 10) Less functionality for mobile Internet over mobile phones and existing generation of handhelds than for mobile computers (laptops and next generation handhelds).
- 11) Limited roll out of higher bandwidth mobile networks and devices (i.e. 3g networks and wireless broadband networks are predominantly located in cities).
- 12) Security of data moved across some mobile and wireless networks.
- 13) Businesses investment in hardware and infrastructure is seen as riskier as rapid evolution of mobile and wireless technologies continues.
- 14) Lack of Personal Touch I miss the personal touch and

relationship that develops with a retail store. In comparison, ecommerce is far more sterile.

- 15) Inability to Experience the Product before Purchase.
- 16) Need for an Internet Access Device Ecommerce can only be transacted with the help of an Internet access device such as a computer or a smartphone.
- 17) Need for an Internet Connection Not just does one need an access device; one also needs Internet connectivity to participate in ecommerce.
- 18) Security Issues Consumers run the risk of identity fraud and other hazards as their personal details are captured by ecommerce businesses.
- 19) Extraordinarily High Reliance on the Website For an ecommerce business, its website is everything. Even a few minute of downtime can lead to a substantial loss of money, not to mention customer dissatisfaction.
- 20) Multiplicity of Regulations and Taxation Regulators are still not clear about the tax implications of ecommerce transactions. This is especially true when the seller and buyer are located in different territories. This can lead to multiplicity of taxation as well as higher expense on accounting and compliance.
- 21) Charge back "s Credit card issuers are quite liberal in permitting charge back's upon customer request.
- 22) Expense and Expertise Needed for Ecommerce Infrastructure Substantial information infrastructure is required to run an effective ecommerce website.
- Need for Expanded Reverse Logistics In the case of physical retail.

6. Security and Privacy Issues

E-commerce security is the protection of e-commerce assets from unauthorized access, use, alteration, or destruction. While security features do not guarantee a secure system, they are necessary to build a secure system. [1]

Security features have some categories

Authentication: Verifies who you say you are. It enforces that you are the only one allowed to logon to your Internet banking account, Authorization: Allows only you to manipulate your resources in specific ways. This prevents you from increasing the balance of your account or deleting a bill, Encryption: Deals with information hiding. It ensures you cannot spy on others during Internet banking transactions. Auditing: Keeps a record of operations. Merchants use auditing to prove that you bought specific merchandise, Integrity: prevention against unauthorized data modification, Nonrepudiation: prevention against any one party from reneging on an agreement after the fact and availability: prevention against data delays or removal.

In this paper we focus on the privacy issues in mobile world If you want to find out someone's address when you know the home phone number and then get a map to that location? Go to Google and enter that person's phone number. The top listing will provide you the name and address of the owner of that phone number. Click a button and you will get a map to the house or business. Google calls it Phonebook. Or when you set up a wireless network in your house using Wi-Fi. Your neighbor will possibly be able to pick up your signals and network traffic if they are within 300 feet of your base station and "join" your network.

The wireless industry, mindful of the privacy issues raised in the online e-commerce context, has issued calls for stringent self-regulation in an attempt to avoid governmentimposed regulation. For instance, the Mobile Marketing Association (MMA) has a Code of Conduct for wireless marketing campaigns, developed by an MMA boardappointed Privacy Advisory Committee whose members included Cingular Wireless, Procter & Gamble, and VeriSign, among others. The MMA has also established a wireless antispam committee. TRUSTe, a not-for-profit organization that operates an Internet privacy seal program, has Wireless Privacy Principles and Implementation.

Solving the problem of, third-party sharing of personally identifiable information, and the use of location-based information. Under the guidelines, wireless service providers are encouraged to provide a full privacy statement to the consumer prior to or during the collection of personally identifiable information, or upon first use of a service. They should only disclose that information to a third party for uses unrelated to the provision of services if the consumer has provided "opt-in" consent prior to such use. Finally, the guidelines state that wireless service providers should only use location information for services other than those related to placing or receiving voice calls if consumers opt-in.

So any company whose business model is predicated on that assumption is underestimating the increasing sensitivity to privacy concerns'.

7. Conclusion and Future Work

Organizations adopting social software tools need a business case in mind before they make any decisions about what technologies to purse because there's no one-size-fitsall solution to this. To do so first you need to give the technology a business use. Once that is achieved, then the goal is to think in about how to integrate the tools into more complex business processes such that they support the more challenging use cases. Because in future, digital natives will expect to be using these tools as they enter the workforce. This study highlights different areas, applications, opportunities of social media and m-commerce. Highlight the different advantages, benefits and the risks, challenges of conducting social media in business. Future work is to give more researches for social media and m-commerce that help organization to identify and eliminate the risk of social media to improve its reliability and to aid different organization to achieve its goals.

References

 Niranjanamurthy, M., and N. Kavyashree. "Analysis of E-Commerce and M-Commerce: Advantages, Limitations and Security issues." Analysis 2.6 (2013).

- [2] Batikas, Michail, and Rene Van Bavel. Assessing the Benefits of Social Networks for Organizations. No. JRC85669. Institute for Prospective and Technological Studies, Joint Research Centre, 2013.
- [3] Ghosh, Anup K., and Tara M. Swaminatha. "Software security and privacy risks in mobile e- commerce." *Communications of the ACM* 44.2 (2001): 51-57.
- [4] Kenneth C. Laudon and Carol Guercio Traver. E-Commerce: Business, Technology, and Society, Fifth Edition, Prentice Hall, a division of Pearson Education, Inc. (2009)
- [5] Stephen, Andrew T., and Olivier Toubia. "Deriving value from social commerce networks." *Journal of marketing research* 47.2 (2010): 215-228.
- [6] Fariborzi, E., and M. Zahedifard. "E-mail Marketing: Advantages, Disadvantages and Improving Techniques." *marketing* 4 (2012): 5.
- [7] Qiao, Yu. "Social networks and E-commerce." Seminar on Internetworking, Published on: 28th April. 2008.
- [8] Mulpuru, Sucharita. *Will Facebook Ever Drive Ecommerce?*. Forrester Research, 2011.
- [9] Qualman, Erik. Socialnomics: How social media transforms

the way we live and do business. John Wiley & Sons, 2012.

- [10] Busscher, Nicole, and A. M. Von Raesfeld-Meijer. "Social Media: their role as marketing tools in B2B Marketing." (2013).
- [11] Zerfass, Ansgar, Stephan Fink, and Anne Linke. "Social media governance: Regulatory frameworks as drivers of success in online communications."*Pushing the envelope in public relations theory and research and advancing practice*, *14th International Public Relations Research Conference*. Gainesville, FL: Institute for Public Relations, 2011.
- [12] Swamynathan, Gayatri, et al. "Do social networks improve ecommerce?: a study on social marketplaces." *Proceedings of the first workshop on Online social networks*. ACM, 2008.
- [13] Social Media and the Impact on Marketing Communication. 2014.
- [14] Evangeline, S. Jacinth, K. M. Subramanianl, and K. Venkatachalam. "Efficiently Mining the Frequent Patterns in Mobile Commerce Environment." *International Journal of Innovation and Scientific Research* 5.1 (2014): 30-39.
- [15] Salvatori, Luca, and Fausto Marcantoni. "Social commerce: A literature review." Science and Information Conference (SAI), 2015. IEEE, 2015.