



# *E-commerce*

## *The Influence Of E-commerce On Shoppers*

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## Abstract

Information and communication Technologies has influenced the way we interact with the world today. E-commerce is the part of ICT that deals with selling and purchasing of products and services over the Internet. This is the main focus of this document, to try to understand how companies and shoppers have had to adjust to this new technological era. By discussing the social, economical, political, and global impacts that e-commerce has brought, we will be able to better understand its influences and how to successfully adapt to it.

## Introduction

Information and Communication Technologies play a very big part in today's working and personal environments. In this paper I am going to be focusing on the personal environment, looking from the users perspective on how Information and Communication Technologies has been changing the way people shop today. It has created a whole new ecosystem and broadened the markets for consumers.

**Information and communication technology (ICT)** is an umbrella term that covers all technical means for processing and communicating [information](#). While this technically encompasses pre-digital technologies, including paper-based writing, it is most often used to describe digital technologies including methods for communication ([communication protocols](#), transmission techniques, communications equipment, [media \(communication\)](#)), as well as techniques for storing and processing information ([computing](#), data storage, etc.) The term has gained popularity partially due to the convergence of [information technology \(IT\)](#) and [telecom](#) technology.

ICT allows users to participate in a rapidly changing world in which work and other activities are increasingly transformed by access to varied and developing technologies. By this definition, you could almost say ICT is technology's version of economic growth, to satisfy the needs and wants of the community over time (Wikipedia, 2009).

Before ICT appeared buyers did not have as many options as they do today. The only available products were local and whatever was offered in their adjacent areas. The markets that customers had access to were very small, and because of this the prices that they were paying were much higher. Thanks to the increase of the use of the Internet new methods have been created not only to advertise products but also to sell them without any kind of face-to-face interaction. All types of transactions like buying, selling, or exchanging products and services over the Internet are considered E-commerce (Bouwman, Van Den Hooff, Van De Wijngaert, & Van Dijk, 2005).

## Technology

E-commerce appeared in the late 1960's, and during that time it was mostly an exchange of documents like purchases orders and invoices. Most of the E-commerce that was going on during the first decades was B2B (Business to Business). E-commerce took many other forms, credit card companies, ATMs, and airlines reservations are some of the most commonly B2B E-commerce used(Wikipedia, the free encyclopedia, 2009).

Thanks to the technological advances, the accessibility to technology, and the government's control and protection, online shopping became a reality for regular consumers. E-commerce transactions between business and consumers are referred as B2C (Business to Consumer). A very good example of this type of company is overstock.com. Overstock.com is an online retailer; it offers a wide variety of merchandises from jewelry, electronics, sporting goods and shoes. It started in Salt Lake City, UT in 1999 and had revenue of \$1,835,000. Over 9 years later their revenue for 2008 was \$834,366,743. They started by selling products from other business that failed and selling returned merchandise and over the Internet. (Wikipedia, the free encyclopedia, 2009)

With the use of any device that has access to the internet like a computer or a cell phone, customers can browse, for services or products available not only in their city, state, or country, but all over the Globe. By using a credit/debit card or a bank account number customers can purchase goods and services from the comfort of their homes.

For example, e-bay, overstock.com, Amazon.com, are some companies that offer all kind of goods and services over the Internet. Giving you the opportunity to compare products, prices and availability not only with local mortar business but also with many other online stores.

Many traditional brick and mortar stores are combining the traditional way of shopping with e-commerce. They still have their stores were you can walk in to do all your shopping. Because of the increase on e-commerce, stores were loosing customers and had to change the way the approach their business. They did this by adding many e-services and products allowing them to keep their existing customers and accessing a whole new type of customers.

For example, Festival Foods is a regular supermarket that had to add e-commerce to their business model in order to stay competitive and survive in today's economy. Festival Foods created a website for their stores, and now give their customers the option to shop online. In Festivals Foods website you can just add to all the products that you need to your shopping cart and have them ready for pick up or delivery (Festival Foods, 2009).

Another good example is Best Buy, they also have their regular brick and mortar stores, along with their online stores, giving the customers the option to shop for what ever they need or want from where ever they have access to the Internet (Best Buy, 2009).

E-commerce is still a growing industry. In the United States of America over 70% of the population uses the Internet for E-commerce, but in the rest of the world only about 10% of the population has access to the Internet (Dugal, Jiang, & Bangstad, 2009).

The next couple of graphs will show the increase of the online retail sector in the United States, which grew 16.6% in 2008, and a 28.1% in the period of 2004-2008 (DATA MONITOR, 2009). Followed by a pie chart showing us the percentage of Internet users divided by world regions.

**Table 1: United States Online Retail Sector Value: \$ billion, 2004-2008**

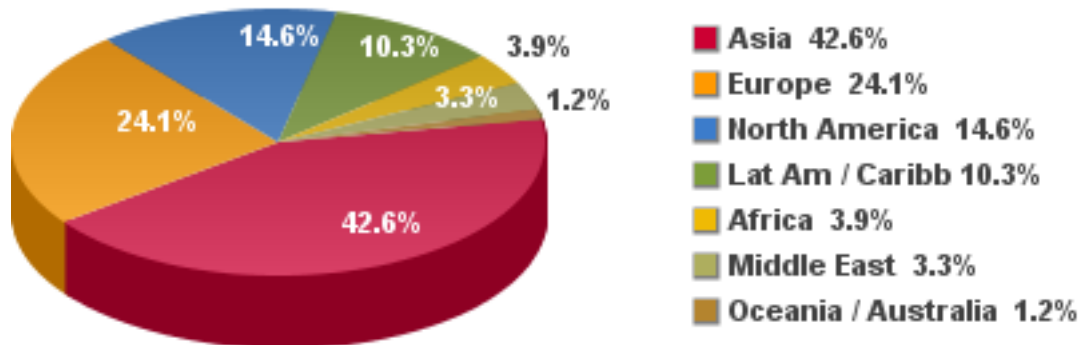
Year	\$ billion	% Growth
2004	69.2	
2005	86.0	24.20%
2006	114.2	32.80%
2007	160.1	40.20%
2008	186.7	16.60%
<b>CAGR, 2004-2008:</b>		<b>28.1%</b>

Source: Datamonitor DATAMONITOR



(DATA MONITOR, 2009)

## World Internet Users by World Regions



Source: Internet World Stats - [www.internetworldstats.com/stats.htm](http://www.internetworldstats.com/stats.htm)  
1,733,993,741 Internet users for September 30, 2009  
Copyright © 2009, Miniwatts Marketing Group

It is evident that e-commerce is still very new and there are many opportunities for growth not only in this country but also all over the world. With all the advances in technology, and as technology becomes more available in other countries, who knows what is coming next. Today we have many companies that are growing at exponential rates, in different fields like travel, telecommunications, banking, entertainment, learning, etc. The main advantage and potential that E-commerce has for the companies and the customers, is the flexibility. For companies it is very easy and inexpensive to create a website that allows the customers to customize their products, compare their products with other vendors and really give the customers what they want.

Dell is a great example of e-commerce that offers to their customers all this options to customize and get exactly what you want. "Dell is a straightforward company that, like a host of others, sells custom-configured PCs to consumers and businesses" (Marshall, 2000). If you visit Dell's website, you can choose what type of computer you want, you can select a skin (color and design), and keep adding form here the desired speed, size of memory, and different hardware and software. Every time that you make a change, it will update the price on the screen telling you exactly how much you will be paying for your own personalized and unique computer. Today there are many car companies that also allow you to customize your products even a brand new car.

### Impact Analysis

E-commerce has changed many things, not only the companies, and the customers behavior. It has also change society, with new laws created to prevent companies or people from taking

advantage of their customers. E-commerce has change the economy all over the world where purchases are made via the Internet.

Businesses had to create new jobs, and workers had to learn new skills to be able to adapt to this new technology, and customer behaviors. In today's world people research product online before they even go to the store. Many time the customer knows more about the product that the representative that is trying to sell the products. Best Buy is a great example of how companies are dealing with these savvy customers. Best Buy trained all of their staff on the products that they are selling, with help from their manufacture suppliers, they gave their employers really good inside knowledge of their products. Best Buy reps also get to try the products in the store when there are no customers experiencing and getting a better view of what customers need and want. (Byrnes, 2007)

Another technique that brick and mortar stores are using to catch up with the e-commerce trend is to had kiosks in their stores where to customers and employees can access their databases and inventories to locate products, check for availability and order the products if unavailable. (Byrnes, 2007)

The great part about e-commerce is that not only big companies can afford to do business online, small starting companies are able to reach millions of customers all over the world. E-commerce has given small companies a tool to compete with big corporations for their own share of the market. Customers can even compare prices from other stores from these kiosks to get the best deals.

Thanks to e-commerce, businesses are able to reduce cost all over their operation systems. Labor cost is greatly reduced since fewer workers can keep the business running as computers do most of the work (such as "taking" orders and completing transactions). It also reduces the time and increases data accuracy when transmitting information between providers. E-commerce has allowed companies to streamline the processes when shipping and receiving, tracking shipments, sending notices to clients and customers, and auditing. The way of documenting all these processes it mostly automated, and everything is logged in the systems for review. E-commerce has also allowed business to keep their customers, by adapting to their needs and wants, which is much cheaper than getting new customers.

Society has been having to adjust to all the changes that technology is bringing. With e-commerce there is almost no human interaction. Buyers had to learn to use and rely on technology. E-commerce has given the customers more direct access to all types information regarding their purchases. Users not only have access to the specific information for their products, but they also get to see and read reviews from other customers that have used or purchased the same product, giving the buyers a better idea and understanding of the what they are buying (Sreenivas, 2007). A very good example is Barnes & Noble, they had their stores as community centers, and each store was designed to meet the specific needs of the area where it was located. The stores have extended these community centers into their virtual site. This allows members to create their profiles and create virtual community centers where all the members can post and share all their reviews and favorite books. The company has also added

events like author interviews, chat rooms to interact with the authors, music, etc. all to mimic their stores (Ranganathan, Goode, & Ramaprasad, 2003). Society has had to adapt to new ways of interacting in these virtual communities, and Barnes and Noble has provided a great environment for doing so.

The Government has also adjusted to this new technology. E-commerce also brought new rules and regulations by the government. Because of all the exposure of personal information when purchasing products online, the FTC Federal Trade Commission regulates all these activities of e-commerce (Gallegos, Senft, Manson, & Gonzales, 2004). E-commerce opened a whole new world for criminals. Here we have a great example from the FBI on how these criminals operate and what the government does to protect us.

**Here's an alarming statistic for you:** Information on over 15 million credit card accounts has been stolen or compromised by eastern European hackers.

**How does it happen?** It can happen as easily as a person sitting in a small room somewhere in the world...probing U.S. e-commerce computer systems...and detecting vulnerabilities in unpatched operating systems. That's precisely the back door they're looking for. Once they're "in," it's just a matter of downloading proprietary information, customer databases, and credit card information. Sometimes they sell the credit card information; sometimes, just to add insult to injury, these hackers contact the victim company to announce their intrusion and suggest a tidy payoff for them to patch the system against other hackers.

U.S. e-commerce companies are obviously working hard to slam shut all the back doors as they materialize, but in the meantime the FBI is working just as hard to identify the criminals -- no matter where they are in the world -- to stop their operations, and to bring them to justice.

Take the case of twenty something Alexey Ivanov and Vasily Gorshkov, both of Chelyabinsk, Russia. They were partners in crime, acting as "project managers" for a team of hackers in Russia who hacked across cyberspace into dozens of computers throughout the United States, stealing usernames, passwords, credit card information, and other financial data, then extorted their victims with the threat to pay up...or else they'd delete their data and destroy their computer systems.

FBI agents traced them back to Chelyabinsk, then extended invitations to them to travel to the U.S. for "job interviews" with Invita Security, Inc. -- a brand new "company" created especially by FBI undercover agents. Ivanov and Gorshkov bit -- arriving in Seattle, proud to boast of their illegal activities in an effort to impress the company recruiters. They impressed them, all right -- right into a couple sets of handcuffs. Gorshkov was convicted in a Washington state federal court and sentenced to prison last year. Ivanov was convicted in a Connecticut federal court and was sentenced to prison just this summer. (Federal Bureau Of Investigation, 2003, ¶.1)

As we can see e-commerce has had many positive and negative impacts. There were jobs created and lost, new opportunities to learn, new markets, new laws, and also new types of crimes. Users have no more options and these options will continue to grow as e-commerce continues growing.



## Recommendations

My recommendation for future users of this technology and the new forms of e-commerce that are coming, is to have a good understanding of what you are doing before you jump in to it. There is currently enough information available to make smart and safe decisions. Now that we have access to new markets, we have more options and more risk.

Consumers should make sure that they are using the latest browsers for better accessibility and security. In addition, having high-speed Internet connection is going to make the process much faster and easier. Consumers should also make sure to protect themselves by using secure Internet connections and secure passwords. Doing these things cannot guarantee safety while purchasing items online, but it will certainly help

Consumers should take advantage of online banking; it will help them to stay up to speed with what is going on in their bank accounts. With online banking they will have access to up to date information of what is going on in their accounts. This will allow them to detect any kind of fraudulent activities.

Here are some tips from the Better Business Bureau, National Cyber Security Alliance and information-technology trade group ISACA (Tali, 2009).

Computer *users* need to have the most recent antivirus, anti-spyware and spam filters installed. Update the programs before beginning to shop.

Make sure employees know how to verify the authenticity and safety of a retailer's website. The browser's status bar should show a closed padlock, and the beginning of the site's address should switch from "http" to "shttp" or "https" when the site asks a shopper to provide credit-card information upon checkout.

Make sure employees use desktop computers, not work-issued smart phones, to shop. The computers are likelier to be more secured. (Tali, 2009)

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