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# E-COMMERCE THEORY AND PRACTICE

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**E-COMMERCE THEORY  
AND PRACTICE**



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Dr. Dasinis Nathan

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## CHAPTER 1

# REVOLUTIONIZING COMMERCE: AN INTRODUCTION TO E-COMMERCE AND ITS IMPACT ON BUSINESS AND SOCIETY

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### ABSTRACT:

E-commerce, or electronic commerce, is the buying and selling of goods and services over the internet. In recent years, e-commerce has become increasingly popular due to advancements in technology and changes in consumer behavior. This paper provides an introduction to the world of e-commerce, outlining its history, current state, and future prospects. We explore the various types of e-commerce, including business-to-business, business-to-consumer, consumer-to-business, and consumer-to-consumer, and the different models for conducting e-commerce transactions, such as drop shipping, subscription-based services, and marketplaces. Additionally, we examine the benefits and challenges of e-commerce for businesses and consumers, including increased convenience, lower costs, and expanded global reach, as well as concerns around cybersecurity, privacy, and ethical issues.

### KEYWORDS:

Business-to-business (B2B), Consumer-to-business (C2B), Electronic commerce, E-commerce, Online shopping.

## INTRODUCTION

E-commerce, or electronic commerce, refers to the buying and selling of goods or services over the internet or other electronic means. The growth of the internet and the increasing number of people using it has revolutionized the way businesses operate and reach their customers. E-commerce has become an important part of modern business, and it is estimated that the global e-commerce market will be worth over \$6 trillion by 2023. In this introduction to e-commerce, we will explore the basics of e-commerce, the different types of e-commerce, the benefits and challenges of e-commerce, and some best practices for running a successful e-commerce business.

### 1. Basics of E-commerce

E-commerce is the process of buying and selling products or services over the internet or other electronic means. It involves a variety of activities, including online marketing, online payment processing, and online order fulfillment.

**The basic components of e-commerce include:** A website or online store that displays products or services for sale. A payment gateway that allows customers to make payments online. A shipping or delivery system that gets the products to the customer.



**E-commerce businesses can be categorized into two main types:** B2C (business-to-consumer) – refers to the selling of products or services directly to consumers over the internet. Examples of B2C e-commerce businesses include Amazon, eBay, and Zappos.

B2B (business-to-business) refers to the selling of products or services between businesses over the internet. Examples of B2B e-commerce businesses include Alibaba and ThomasNet.

## **2. Types of E-commerce**

There are several types of e-commerce, each with its own unique features and advantages. Here are some of the most common types:

- i. Retail e-commerce refers to the selling of products directly to consumers through an online store. Retail e-commerce businesses include Amazon, eBay, and Walmart.
- ii. Wholesale e-commerce refers to the selling of products in large quantities to retailers or other businesses. Wholesale e-commerce businesses include Alibaba and ThomasNet.
- iii. Dropshipping refers to the selling of products without keeping any inventory. In this model, the retailer only orders the product from the manufacturer or wholesaler after the customer has placed an order.
- iv. Subscription e-commerce refers to the selling of products or services on a recurring basis. Subscription e-commerce businesses include Birchbox and Dollar Shave Club.
- v. Digital products e-commerce refers to the selling of digital products such as software, e-books, or music. Digital products e-commerce businesses include iTunes and Amazon Kindle.
- vi. Services e-commerce refers to the selling of services online. Services e-commerce businesses include Upwork and Fiverr[1].

## **3. Benefits of E-commerce**

- i. E-commerce offers many benefits to businesses and consumers. Here are some of the main advantages of e-commerce:
- ii. Increased reach E-commerce allows businesses to reach customers from all over the world, regardless of their location. This increases the potential customer base and can lead to increased sales.
- iii. Reduced costs E-commerce eliminates many of the costs associated with running a traditional brick-and-mortar business, such as rent, utilities, and staffing. This can lead to increased profits and lower prices for customers.
- iv. 24/7 availability E-commerce stores are open 24 hours a day, seven days a week, allowing customers to shop whenever they want. This convenience can lead to increased sales and customer loyalty.
- v. Personalization E-commerce allows businesses to track customer preferences and personalize the shopping experience, which can lead to increased customer satisfaction and loyalty.
- vi. Increased efficiency E-commerce can streamline many aspects of the sales process, from order processing to inventory management, leading to increased efficiency and reduced costs.

#### **4. Challenges of E-commerce**

While e-commerce offers many benefits, it also presents several challenges. Here are some of the main challenges of e-commerce:

- i. **Security** E-commerce transactions involve sensitive financial information, such as credit card numbers and personal information, which can be vulnerable to cyberattacks. Businesses must invest in secure payment gateways and take steps to protect customer data.
- ii. **Logistics** E-commerce businesses must have efficient and reliable shipping and delivery systems in place to ensure that products are delivered to customers on time and in good condition.
- iii. **Competition** The global reach of e-commerce means that businesses face increased competition from all over the world. Businesses must differentiate themselves from their competitors and offer unique value propositions to attract and retain customers.
- iv. **Customer trust** E-commerce businesses must establish trust with their customers, who may be wary of buying products online. This involves providing clear and accurate product descriptions, offering easy returns and refunds, and ensuring that customer service is prompt and helpful[2].
- v. **Technical issues** E-commerce businesses must deal with technical issues such as website downtime, slow loading times, and mobile compatibility. These issues can lead to lost sales and dissatisfied customers.

#### **5. Best Practices for E-commerce**

To succeed in e-commerce, businesses must follow best practices to ensure that they meet the needs of their customers and stay competitive. Here are some of the best practices for running a successful e-commerce business:

- i. **Build a user-friendly website** E-commerce website should be easy to navigate, visually appealing, and mobile-friendly. They should also provide clear and accurate product descriptions and images, as well as easy-to-use search and filtering features.
- ii. **Provide excellent customer service** E-commerce businesses must provide prompt and helpful customer service, including easy returns and refunds. This can help build trust and loyalty among customers.
- iii. **Invest in marketing** E-commerce businesses must invest in marketing to reach new customers and retain existing ones. This can include search engine optimization (SEO), social media marketing, and paid advertising.
- iv. **Offer multiple payment options** E-commerce businesses should offer a variety of payment options, including credit cards, PayPal, and other online payment methods.
- v. **Focus on logistics** E-commerce businesses must have reliable and efficient shipping and delivery systems in place. This can include offering free shipping, providing tracking information, and partnering with reliable shipping companies.
- vi. **Prioritize security** E-commerce businesses must prioritize security to protect customer data and prevent cyberattacks. This can include using secure payment gateways and investing in cybersecurity measures.
- vii. **Analyze data** E-commerce businesses should analyze customer data to gain insights into customer behavior and preferences. This can help businesses make data-driven decisions and improve the customer experience.

## 6. Future of E-commerce

- i. The future of e-commerce looks bright, with the global e-commerce market expected to continue to grow in the coming years. Here are some of the trends that are likely to shape the future of e-commerce:
- ii. Mobile e-commerce the use of mobile devices for e-commerce is expected to continue to grow, with more people using their smartphones and tablets to shop online.
- iii. Social commerce social media platforms such as Facebook and Instagram are increasingly being used for e-commerce, with businesses selling products directly through social media.
- iv. Artificial intelligence (AI) is expected to play an increasing role in e-commerce, with businesses using AI-powered chatbots and personalized product recommendations to improve the customer experience[3].
- v. Voice commerce the use of voice assistants such as Amazon's Alexa and Google Assistant for e-commerce is expected to grow, with customers using voice commands to make purchases.
- vi. Sustainability E-commerce businesses are increasingly focusing on sustainability, with many offering eco-friendly products and reducing their carbon footprint.

## DISCUSSION

For the last several years, businesses across the world have seen substantial changes in their corporate data system. Large sums of money were invested in company resources after planned system deployments, they continue to have difficulty obtaining timely information, which need to make wise business decisions and to guarantee the ongoing development of enterprises. Every procedure or function seems to work better with an "e" before it prescription for an unending tale of business success and quick profits. E-commerce, e-procurement, e-sales, e-payment, e-banking, e-CRM, e-CAD, and e-delivery are all examples of just a few. For instance, the internet is quickly rising to the top of the list of sending different types of info. People may locate any kind of information in a shorter amount of time compared to the more time-consuming traditional procedure. The global spread of the Internet has brought forth a wide range of benefits medium in terms of both corporate operations and social customs. Indeed, the Internet is crucial. E-commerce is necessary for its survival. E-commerce, often known as electronic commerce, the capacity to conduct transactions involving the exchange of commodities or services provided by use of electronic instruments and methods between two or more parties.

E-commerce has brought forth new phenomena in our way of life, particularly in buying. The fundamental idea behind electronic commerce is the term commerce, which refers to purchasing whereas "commercial" refers to business practices and operations aimed to make money to get money. Like all businesses, electronic commerce involves the exchange of money to purchase both soft and hard products and services. Communication Perspective: E-commerce is the delivery method in this viewpoint of information, goods or services, or of payments made over telephonic methods, any other kind of electronic communication, such as computer networks. Business Process Perspective: According to this, E-commerce is a technology geared on labor flow and business transaction automation. Service Perspective: E-commerce is a technology that satisfies business desires, to reduce service costs and increase service quality, customers and management must enhancing the delivery speed of products and services. Internet Perspective: E-commerce enables the purchase and sale of goods. Includes details about the web and other

online resources. The definition of commerce is a commercial transaction between partners. Hence, the phrase "e-commerce" seems too many to be quite limited. Hence, sometimes, we use the word "business." It gives e-commerce a wider meaning[4].

The situation is unclear among the academicians and consultants disagree about the usage of this phrase. Others believe that online shopping includes all organizational operations conducted in the domain of computers that support an exchanges on a company's market, encompassing the architecture of its whole information system. On the other hand, others contend that e-business includes all internal company processes. E-commerce might lead to massive cost reductions and increased corporate efficiency, but, the details are still elusive. How will e-commerce alter the way that the world plans? And purchase of logistics and transportation across the supply chain? In terms of logistics, characterized as the primary facilitator of e-business, but how can individual logistics transport businesses make sure they prosper from e-commerce rather than fail in it. It is using the force of sharing software, computers, and the Internet to exchange and receive product specs bids, purchase orders, and invoices; as well as any other kind of data that must be shared with clients, partners, staff, or the general public. E-commerce is the modern, successful method of doing business that extends beyond easy information transfer that broadens the use of electronic transactions beyond point-of-sale needs, decision-making, and production planning, all the way through billing, receipt and payment.

E-commerce makes use of important standards and technologies including Hypertext Markup Language (HTML), Extensible Mark-up Language (XML), Electronic Data Interchange (EDI), Technical Data Interchange (TDI), and the Standard for Data exchange for product models (STEP). The Internet allows for e-commerce extended Internet, World Wide Web, and Value-Added technologies. The Internet is a global network of computer networks that interact with one another employing a common software standard, data may be exchanged between parties through telephone cables, and Internet users may exchange information in many different formats using satellite connections. Size and scope the Internet's architecture and design let people to connect with ease using standard personal exchange electronic mail (E-mail) with friends and family using computers and local phone numbers coworkers who have online accounts provide information for others to view, and regularly update it, access multimedia data including audio.

Visual access various viewpoints from across the globe via photographs, video, and even audio. The fact that the Internet lacks a centralized authority is another feature of it. The Internet is not governed by "Internet, Inc." Notwithstanding the several governing boards that strive to provide guidelines and norms, few laws, and no single authority groups hold the Internet together. Terminology used by various individuals varies, including "electronic trading" and "electronic marketing, electronic buying, or procurement. Given the definition given above, thus, we may say that the term "electronic commerce" is often used in a much wider meaning, to similar to "electronic business" in most respects. E-commerce thus comprises financial transactions including purchases of products, services, and other things where the interactive information or digital technology mediates the process at the two geographically distinct locations, ends of the conversation. Here, the term "transactions" refers to both the specification of commodities and service need and purchase commitment.

Better data exchange and business communication are made possible by electronic commerce. Information is necessary for all types of businesses. The degree and scope of data that a company

provides to consumers or uses this data to develop a firm may already be employing a variety of electronic based tools to help recruit and retain customers, and these choices may decide how competitive the organization is expand your communication and information requirements. Personal computers, among others, pagers, cellular phones, facsimile devices, telex services, word processors, and more. However, many of the communication technologies available today are not truly up to speed meeting modern business requirements and may even provide obstacles to reaching the targets specified the foundation of a company's strategic plans. For instance, mail services might cause businesses to wait days or even weeks for information weeks. Although overnight delivery services might save time, they can also be pricey. Traditional Telex and fax are rapid but expensive, and telephone conversations may drag on forever tag is a game.

Currently, a company may avoid these issues by using e-commerce, which is quick and inexpensive efficient, quick, and simple to use, i.e., tangibility in terms of the economy and excellent business generation. Better transactions and broad market penetration may arise from electronic business by providing the advantages of speed, convenience, affordability, responsiveness, and high profit margins instant client interactions, no customer loss, impact, and control are just a few of the benefits typical business practices from the past. A company will do everything possible to run its effective and profitable company. Better business results from the use of electronic processes in commercial activity solutions. It considerably aids a business in making better selections, sales predictions, pricing determinations, and other important data may be sent and received instantly. A company will with the new system, it can always get the information it needs more quickly, simply, and thoroughly more advanced communication system[5], [6].

This gives businesses an advantage over rivals by informing, following up with, and Customers may request information more quickly and easily. Another benefit is that it aids in maintaining more control, whether it's at work, home, or elsewhere. When travelling, instantaneously communicate with any company or business partner, wherever they are. How does e-commerce benefit industry? It benefits by enhancing market responsiveness circumstances and client preferences. Every company has to understand the value of timing to product sales and marketing. In order to satisfy the requirements of customers. If the sales force, dealers, and distributors do not get the proper information at the appropriate time, in addition to losing crucial clients, there will be a financial problem.

With an e-commerce network, a business may carry out marketing campaigns utilizing more elements like delays, it has been an experience in traditional business methods and reporting systems' inefficiency undermines efficacy responsive and prompt information is transmitted using reliable management systems. According to certain marketing surveys, the majority of salespeople spend close to 75% of their spending most of their communication with their head officers on the phone when they are out on the roadways and clients. Finding someone may become a never-ending, irritating game of telephone tag lead generation and follow-up to verify sales calls. In addition, undelivered or misdirected information has a negative impact on sales figures. Public relations may become more efficient and successful thanks to electronic commerce programmed, news announcements for broadcast, financial information, and other corporate communications. Circulating instant messages speeds up copy checks and approvals communications with important internal and external connections. In any industry where keeping in touch with clients is essential taking this into account, electronic business may boost the company's responsiveness and guarantee client pleasure confirmations of appointments,

information requests, The efficiency of follow-up reporting and electronic data exchange may be improved[7], [8]. Meeting preparation and execution planning and carrying out commercial operations are made easier by the mechanism of electronic operations meetings with senior executives, seminars, workshops, symposia, and Convention management requires a lot of time and work. Plans must be made organized amongst several varied organizations in various places, such as hotels, speakers, the media, participants, exhibitors, etc. It is necessary to provide reports and surveys before computer-based conferences with document sharing capabilities that provide businesses flexibility. The global corporate environment is evolving at a quicker rate than ever before. Using both electronic and paper distribution, may make these tasks simpler and more efficient. Increased competition both domestically and internationally implies that quality and profitability must be maintained corporate organizations. The accepted current order has been reevaluated as a result of this demand business strategy in the quest for increased effectiveness.

### CONCLUSION

When faced with a danger from a competitor, historically, companies have responded by L production, reducing employment, and company reorganization, together with invests in technology to increase output and make money. There are advantages to both businesses to business (B2B) and business to consumer (B2C) transactions whether they are vendors or clients decreased acquisition costs and timeframes, reduced the cost of products and services, the quantity and caliber of suppliers.

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## CHAPTER 2

### **BUILDING A COMPREHENSIVE FRAMEWORK FOR E-COMMERCE: ADDRESSING KEY COMPONENTS AND CHALLENGES**

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#### **ABSTRACT:**

E-commerce has become an essential aspect of modern business operations, offering convenience and flexibility to both businesses and consumers. However, the dynamic nature of the e-commerce industry presents challenges that must be addressed to ensure the success of e-commerce businesses. This paper presents a comprehensive framework for e-commerce, highlighting the key components that must be considered when establishing an e-commerce business. The framework addresses various aspects of e-commerce, including the technological infrastructure, payment systems, security and privacy, logistics, customer service, and legal and regulatory compliance. The paper also discusses the challenges faced by e-commerce businesses, such as competition, changing consumer behavior, and cybersecurity risks, and provides insights on how to mitigate these challenges.

#### **KEYWORDS:**

Customer Service, E-Commerce, Framework, Payment Systems, Technological Infrastructure, Security.

#### **INTRODUCTION**

E-commerce, also known as electronic commerce, is a rapidly growing industry that involves buying and selling goods and services over the internet. The global e-commerce market has seen significant growth over the past decade and is expected to continue to grow in the coming years. This growth is driven by advances in technology, increased internet usage, and changing consumer behavior. In this paper, we will provide an overview of the framework of e-commerce, including its history, types, benefits, challenges, and future prospects.

#### **History of E-commerce**

The history of e-commerce can be traced back to the 1960s, when companies began using electronic data interchange (EDI) to exchange business documents with each other. This technology allowed businesses to exchange purchase orders, invoices, and other documents electronically, instead of using paper-based systems[1]. In the 1990s, the first e-commerce websites were created, allowing businesses to sell products and services online. These early e-commerce websites were primarily used by large corporations, as the technology required to build and maintain them was expensive and complex. The rise of the internet in the early 2000s led to a significant increase in e-commerce activity, as more and more people began using the internet to shop and buy products online. Today, e-commerce has become an essential part of the global economy, with billions of dollars being spent online every year.



## **Types of E-commerce**

There are several types of e-commerce, each with its own unique characteristics and business models. Some of the most common types of e-commerce include:

1. **Business-to-consumer (B2C) e-commerce:** This type of e-commerce involves businesses selling products and services directly to consumers through their websites. Examples of B2C e-commerce sites include Amazon, eBay, and Walmart.
2. **Business-to-business (B2B) e-commerce:** This type of e-commerce involves businesses selling products and services to other businesses through online marketplaces or private networks. Examples of B2B e-commerce sites include Alibaba and Global Sources.
3. **Consumer-to-consumer (C2C) e-commerce:** This type of e-commerce involves consumers selling products and services to other consumers through online marketplaces or social media platforms. Examples of C2C e-commerce sites include eBay and Craigslist.
4. **Consumer-to-business (C2B) e-commerce:** This type of e-commerce involves consumers selling products and services to businesses. Examples of C2B e-commerce sites include freelance platforms like Upwork and Fiverr.

## **Benefits of E-commerce**

There are several benefits of e-commerce for both businesses and consumers. Some of the most significant benefits include:

1. **Increased reach and accessibility:** E-commerce allows businesses to reach customers all over the world, expanding their customer base and increasing their sales potential.
2. **Lower overhead costs:** E-commerce eliminates the need for physical storefronts and reduces overhead costs associated with maintaining a physical presence.
3. **Increased efficiency:** E-commerce allows businesses to automate many of their processes, including inventory management, order fulfillment, and payment processing, increasing their efficiency and reducing the risk of errors.
4. **Improved customer experience:** E-commerce allows businesses to provide customers with a more convenient and seamless shopping experience, with features such as 24/7 accessibility, personalized recommendations, and easy payment options.

## **Challenges of E-commerce**

While e-commerce offers many benefits, there are also several challenges that businesses and consumers face. Some of the most significant challenges include:

1. **Security risks:** E-commerce transactions are vulnerable to security risks such as data breaches and fraud, which can compromise sensitive information such as customer data and payment information.
2. **Competition:** E-commerce has led to increased competition among businesses, as customers have access to a wider range of products and services online.

3. **Shipping and logistics:** E-commerce requires efficient shipping and logistics systems to ensure timely delivery of products and services. Businesses must manage their supply chain and logistics operations effectively to minimize shipping delays and costs.
4. **Technical issues:** E-commerce platforms require sophisticated technology and infrastructure to function properly, which can be challenging for businesses to maintain and upgrade as technology continues to evolve.
5. **Customer trust:** E-commerce requires a high level of trust between businesses and consumers, particularly with respect to the security and privacy of customer data. Businesses must take steps to build and maintain customer trust to ensure the long-term success of their e-commerce operations.

#### Future of E-commerce

The future of e-commerce looks bright, with continued growth and innovation expected in the coming years. Some of the key trends shaping the future of e-commerce include:

1. **Mobile commerce:** As mobile devices become increasingly popular, businesses are focusing on developing mobile-friendly e-commerce platforms to meet the needs of mobile users.
2. **Artificial intelligence and machine learning:** E-commerce businesses are using artificial intelligence and machine learning to analyze customer data and provide personalized shopping experiences, improve supply chain and logistics operations, and enhance fraud detection and security measures[2].
3. **Virtual and augmented reality:** Virtual and augmented reality technologies are being used to provide customers with immersive shopping experiences, allowing them to visualize products in real-world settings before making a purchase.
4. **Social commerce:** Social media platforms are increasingly being used as e-commerce channels, with businesses leveraging social networks to reach new customers and sell products and services.

### DISCUSSION

Basically, commerce is any economic activity that involves trade or the exchange of products for cash. The client would go there in person to the store, choose the item they wish to buy, and then pay for it. When we enter the technological era, all such actions are conducted utilizing E-Commerce is the term for business conducted through the internet a changing way of life, internet banking, the use of plastic money, the use of debit and credit cards, the rise of the tech-savvy youth, and E-commerce enterprises and an increase in disposable income are only two of the factors[3].

India's economy is booming. In addition to technical factors, another reason for this shift, the avoidance of all traffic and stress on the mind the streets. One must navigate the traffic to get to the store crowded sidewalks. With the proliferation of smartphones, mobile the growth of e-Commerce in India now includes shopping. The rise of Internet enterprises began in the middle of the 1990s. India, yet underdeveloped, with little Internet penetration, and lack of knowledge. The bottlenecks were the payment systems online personal ads, matrimonial ads, and the primary

e-commerce sites at the time were employment portals the internet began to acquire popularity in the 2000s, which boosted e-commerce. India's industry. Furthermore to the dot com sector's advancements, India's the retail industry began to prosper. Retail establishments eventually launched virtual stores.

India's 14-billion-dollar e-commerce sector has gained momentum with the disclosure of a proposal in the Union Budget for 2014–15 allow international merchants to conduct e-commerce sales inside the nation platform brands that were selling well were Nike, Puma, and Marks & Spencer. Electronic commerce is often referred to as "e-commerce" or even online shopping. Its self-explanatory term refers to a gathering of online purchasers and vendors. This entails the exchange of products and products, the exchange of money and data, and services hence, when a consumer accesses his or her Amazon account and buy a book—this is a prime instance of e-commerce transaction. In this case, the buyer and seller (Amazon) exchange data in the form of images, text, a delivery address, etc., and then he or she pays the invoice. E-commerce, then, is the term for the purchasing and selling of the provision of products or services through the internet, the sending of payment and data to carry out these operations[4].

Internet for tangible goods, but it may also refer to any sort of business a transaction that is made possible through the internet. "E-commerce" refers to the exchange of goods and services online, or product, service, and information exchange across computer networks including the internet." Turban India's fastest-growing and most intriguing avenue is e-commerce for use in business transactions. Indian e-commerce is anticipated to grow. This Increasing internet and smartphone use has spurred growth penetration. The nation's continuous digital transformation is anticipated to the number of internet users in India would rise to 829 million by 2021 from amount as of September 2018: 560.01 M. The internet economy in India includes anticipated to increase from US\$125 billion in April 2017 to US\$250 billion by 2020, with e-commerce playing a big role.

Indian online shopping Revenue is anticipated to increase by US\$ 120 billion from US\$ 39 billion in 2017 billion in 2020, expanding at the greatest pace in the world 51% annually making it the world. Trends in the Market Today India's online retail sales are anticipated to increase by 31% to US\$ in 2018, Flipkart, Amazon India, and Paytm Mall dominated with 32.70 billion[5]. Nowadays, internet retail sales of electronics are the largest segment a market share of 48 percent, closely followed by clothing at 29 percent. Top US companies may now more easily contact consumers thanks to e-commerce. Indian consumers and has become one of the quickly expanding commerce various routes for transnational trading in commodities and services. Among Indian consumers with access to the internet, there is an increasing desire for foreign goods of higher quality and international brands greater awareness and growing income levels several categories

Online sales are performing well for collectibles, event tickets, and online music. Innovations made possible by technology include digital payments, hyper local logistics (the act of sending items straight from a seller to the analytics-driven consumer interaction, customer delivery via couriers, and the Indian e-commerce market has been able grow thanks to digital ads grow much more quickly. Government programmed including Startup India, Skill India, and Digital India and Made in India are also assisting in the development of the online retail sector. E Commerce shopping now sees between 1.1 million and 1.2 million transactions per day. A new pattern of developing E-Commerce aggregators seeking to to digitize a number of offline services in order to build a useful environment for consumers.

CompuServe was the first company to provide electronic mail in 1979 technical assistance for users of personal computers and mail capabilities. In 1980 the first online service to provide real-time conversation was launched by CompuServe online. The business created its Network Services Division in 1982 to provide business customers access to wide-area networking capabilities. Michael Aldrich, an English innovator, created and popularized e-commerce by joining telephone and television lines. He created a method for promoting products and services on television that allows viewers to phone a processing center to put in orders. Aldrich referred to his method as "teleshopping." [6]

Book Stacks Unlimited was launched by Charles M. Stack as an online bookstore. The business initially employed a dial-up bulletin board style. Nevertheless, the website shifted to the internet and began operating from the in 1994. Netscape Navigator was co-created by Jim Clark and Marc Andreessen as a web-surfing device. In the 1990s, Netscape Navigator rose to prominence as before the introduction of contemporary web browsers, the default web browser on the Windows platform. Amazon was primarily presented by Jeff Bezos as an online retailer a reading platform. In the meanwhile, eBay became a popular online marketplace launched in 1995. Originally dubbed Concinnity by its creators Max Levhin and Peter facilitated the processing of payments for internet retailers and other business users. Customers of PayPal may keep, transfer, and receive money in several

An online marketplace called Alibaba Online debuted with more than the financing is \$25 million. The business was profitable by 2001. It continued to become a significant, widely-used B2B, C2C, and B2C platform today. Pay-per-click (PPC) was the setting in which merchants first used the technique. Search engine optimization initiatives are distinct from advertising campaigns (SEO). Access to streaming services like Amazon Video and inexpensive one-day delivery were other benefits that the membership eventually gained members-only occasions, such as "Prime Day." This tactical choice encouraged and increased client loyalty repeat buying. Free shipping and quick delivery are now the most important typical demands made by online customers. Founded in 2005, Etsy is a worldwide marketplace where anyone can buy and sell construct stores to market their distinctive, often handcrafted goods. These things come under a variety of classifications, such as jeweler, luggage, apparel, furnishings and accessories for the house, toys, tools for making art, and tools [7].

More than \$25 billion in merchant purchases have been handled since 2009 via the platform, and the business's current Austin headquarters Sydney and San Francisco. In order to facilitate peer-to-peer payments, Google Wallet was launched. It made it possible for anyone to transfer and receive money using a mobile device desktop pc, etc. Users may connect their digital wallet to a bank account or debit card to may use these gadgets to pay for goods or services. Early advertising options on Facebook were made available to owners of business pages via sponsored papers. With these sponsored advertisements, E-commerce companies might target certain demographics and make headlines feeds for various target markets. Payment processing business Stripe John created the company. Apple Pay was made available as a mobile payment option. When more people started utilizing their mobile devices for internet shopping Apple regularly released Apple Pay, allowing customers to pay for goods or services that work with Apple hardware. Entrepreneur Marc Lore founded Jet.com after he sold his formerly owned and Michael Nate Faust and Hanrahan.

Online store Jet.com provides lower costs on a variety of products a range of goods, and its revenue comes from yearly membership payments that subscribers pay. Prices adjust in real time based on algorithms based on the mix of goods the consumer has in their trolley. Jet asserts that the subscription payments are where it derives all of its revenue, and that it does Efforts are made to provide clients the most affordable costs. Shoppable Instagram is debuted in 2017 (19) Big launched Instagram Shopping with e-commerce. Commerce. Since then, the service has grown to include more e-commerce websites, enabling Instagram users to instantly click a visit the product page for that item to make a purchase. Worldwide COVID-19 outbreaks prompted customers to unprecedented magnitude. Ecommerce transactions reached \$1 trillion by May 2020 \$82.5 billion, up 77% from the previous year. It might have required four to six. Using the usual increases from year to year, it would take years to reach that amount. The majority of consumers now make their purchases online in physical stores, including food, household goods, clothing, and entertainment. Many consumers claim they will keep using online till a COVID-19 vaccine is accessible, storefronts. E-Commerce Timeline: Ancient to Contemporary CompuServe is established in 1969. It will eventually turn into what many regarded as the original true e-Commerce company[8].

Michael Aldrich became tired of making frequent trips to the market in 1979 introduces electronic shopping to the world Boston Computer Exchange becomes one of the earliest platforms for online commerce. Charles M. Book Stacks Unlimited, one of the new services from Stack, initial online markets 1994 saw the release of Netscape Navigator, which quickly rose to popular among the first web browsers Launch of AuctionWeb in 1995. It will eventually change its name to. Due to increasing internet usage and changing technology the e-commerce industry has experienced a shift in consumer mindset. The Initially, only print media and classified services dominated the market. It presently encompasses the newest internet-focused business models. Group purchasing and social commerce are examples. India's e-commerce development can be broadly categorized into based on the emergence of different sub-segments, two phases. Furthermore, India saw the introduction of the internet (via dial-up) in six cities in 1995 cities. The introduction of Internet in India marked the beginning of the first phase of e-commerce in the country.

The economic liberalization after the launch of the reforms in 1991 attracted MNCs and brought about the growth of the IT industry. The implementation of liberalization policy has led to the demise of the license regime, high taxes and import restrictions, as well as facilitates the growth of SMEs. The IT industry and SMEs were the early adopters of internet. This led to the emergence of B2B and matrimonial portals in 1996. In 1997, the job portals were launched for the job searches[9]. B2B Directory: India's first online B2B directory was launched in 1996. The liberalization of the country's international trade policies was the key factor that accelerated the growth of B2B online portals.

It enabled buyers and sellers to easily connect with their global counterparts. Online Matrimonial: In 1996, the first online matrimonial portal was launched in India. A concept unique to India, online matrimonial portal transformed the perception about matchmaking process from "marriages are made in heaven" to "marriages are made in cyber space." Such portals have now evolved to cater to various segments of the population such as NRIs, widows or Widowers, divorcees and other special groups.

## CONCLUSION

E-commerce has revolutionized the way businesses operate and consumers shop, offering numerous benefits and opportunities for growth and innovation. However, it also presents several challenges, such as security risks, competition, and logistics issues, that must be addressed to ensure its long-term success. With continued technological advancements and evolving consumer behavior, the future of e-commerce looks bright, with new trends and opportunities emerging to shape the industry for years to come.

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## CHAPTER 3

# EXPLORING THE IMPACT OF INTERNET SERVICE PROVIDER CHARACTERISTICS ON CUSTOMER SATISFACTION: A COMPARATIVE STUDY

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### ABSTRACT:

The research was conducted through a comparative study of three different ISPs in a specific geographic location. The study utilized both qualitative and quantitative research methods, including interviews with ISP representatives and surveys administered to customers of each ISP. The results of the study indicate that ISP characteristics such as reliability, speed, customer service, and pricing have a significant impact on customer satisfaction. Specifically, customers placed a high value on the reliability and speed of their internet connection, as well as the quality of customer service provided by the ISP. Pricing was also an important factor, with customers expecting a fair and transparent pricing structure.

### KEYWORDS:

Customer Satisfaction, Customer Service, Internet Service Provider (ISP), Reliability, Speed, Pricing.

### INTRODUCTION

An Internet Service Provider (ISP) is a company or organization that provides Internet access to homes, businesses, and other organizations. ISPs offer a variety of services, including dial-up, DSL, cable, fiber optic, satellite, and mobile broadband. In this paper, we will discuss in detail what an ISP is, how it works, and the different types of ISPs that exist. We will also look at the challenges facing ISPs today and how they are adapting to meet the changing needs of their customers. An ISP is a company that provides Internet access to users. The primary function of an ISP is to provide a gateway to the Internet, allowing users to access the World Wide Web, send and receive email, and use other Internet-based services. ISPs operate a network of servers and other infrastructure that connects users to the Internet. They typically charge a monthly fee for access to their services, with the cost depending on the type of service and the speed of the connection[1].

ISPs work by connecting their customers to the Internet through a variety of technologies. The most common types of technology used by ISPs include dial-up, DSL, cable, fiber optic, satellite, and mobile broadband. Dial-up connections use a telephone line to connect to the Internet. A modem is used to convert the analog signal from the telephone line into a digital signal that can be used by a computer. Dial-up connections are slow and have largely been replaced by other types of connections. DSL (Digital Subscriber Line) connections use a

telephone line to connect to the Internet. DSL connections are faster than dial-up connections and offer higher bandwidth, making them more suitable for tasks such as streaming video and downloading large files. Cable connections use a coaxial cable to connect to the Internet. Cable connections offer higher speeds than DSL connections and are more reliable in areas with a high population density.

Fiber optic connections use fiber optic cables to connect to the Internet. Fiber optic connections offer the highest speeds and the highest bandwidth of any type of connection, making them ideal for businesses and other organizations that require fast, reliable Internet access. Satellite connections use a satellite dish to connect to the Internet. Satellite connections are often used in rural areas where other types of connections are not available. Mobile broadband connections use a cellular network to connect to the Internet. Mobile broadband connections are often used by people who need to access the Internet on the go, such as travelers and commuters. There are several types of ISPs, including national ISPs, regional ISPs, and local ISPs. National ISPs are the largest type of ISP and offer service to customers across the country. Examples of national ISPs include AT&T, Comcast, and Verizon. Regional ISPs offer service to customers in a specific region or area. Examples of regional ISPs include Cox Communications and Time Warner Cable.

Local ISPs offer service to customers in a specific local area, such as a city or town. Local ISPs often specialize in providing high-speed Internet access to small businesses and other organizations. ISPs face several challenges in today's rapidly changing technological landscape. One of the biggest challenges facing ISPs is the increasing demand for high-speed Internet access. As more people use the Internet for streaming video, gaming, and other bandwidth-intensive activities, ISPs must continually upgrade their networks to provide faster speeds and higher bandwidth. Another challenge facing ISPs is the increasing threat of cyber-attacks. As more businesses and individuals store sensitive data online, the risk of cyber-attacks and data breaches increases. ISPs must work to protect their networks and their customers' data from these threats. Finally, ISPs must navigate complex regulations and legal frameworks governing the Internet. These regulations can vary from country to country and can have a significant impact on how ISPs operate and the services they can offer to their customers[2].

## **DISCUSSION**

ISPs face intense competition from other providers, both within their local markets and across the country. In order to remain competitive, ISPs must continually improve their services and offer competitive pricing to their customers. Customer service is a critical factor in the success of an ISP. Customers expect fast and reliable service, and they want to be able to reach a customer service representative quickly and easily if they have a problem or question. ISPs must invest in customer service infrastructure to meet these expectations. Net neutrality is the principle that all Internet traffic should be treated equally, without discrimination or favoritism. ISPs have a significant role to play in maintaining net neutrality, and they must work to ensure that their networks are open and accessible to all users.

Privacy is a major concern for Internet users, and ISPs must take steps to protect their customers' personal data. This includes implementing robust security measures to prevent data breaches and protecting user data from unauthorized access. ISPs must stay at the forefront of technological innovation to remain competitive in today's market. This means investing in research and development and exploring new technologies and services that can provide value to their



customers. Internet Service Providers (ISPs) are entities that provide internet connectivity services to individuals, businesses, and other organizations. These services include providing access to the internet through various technologies such as dial-up, DSL, cable, fiber-optic, and wireless. ISPs also offer other related services such as email, web hosting, and virtual private network (VPN) services. In this discussion, we will explore various aspects of ISPs, including their history, types, services, regulation, and challenges.

The history of ISPs can be traced back to the early days of the internet when it was primarily used by academic institutions and government agencies. In the 1980s, the National Science Foundation (NSF) established the first backbone network for the internet, which allowed academic institutions and research facilities to connect and share resources. At the same time, commercial entities began to explore the potential of the internet as a new medium for communication and commerce. The first commercial ISP was The World, founded in 1989 by a group of entrepreneurs in Boston. The World offered dial-up access to the internet and email services to its subscribers. In the 1990s, the internet exploded in popularity, and more ISPs emerged to meet the growing demand for internet connectivity. By the end of the decade, there were thousands of ISPs in the US alone, offering a range of services to consumers and businesses[3].

These are the largest ISPs in the world, with their own global networks that connect to other Tier 1 networks. They provide internet connectivity to other ISPs and content providers and have a significant impact on the routing of internet traffic. These ISPs are regional providers that connect to Tier 1 networks and provide internet connectivity to smaller ISPs and businesses. These are the smallest ISPs, providing internet connectivity to residential customers and small businesses in specific geographic areas. These ISPs provide internet connectivity through cable TV infrastructure, offering high-speed internet access to residential and business customers. These ISPs provide internet connectivity through telephone lines, offering high-speed internet access to residential and business customers. These ISPs provide internet connectivity through fiber-optic cables, offering high-speed internet access to residential and business customers. These ISPs provide internet connectivity through wireless technologies such as Wi-Fi, offering internet access to residential and business customers.

ISPs provide internet connectivity to their customers through various technologies such as cable, DSL, fiber-optic, and wireless. ISPs provide email accounts to their customers, allowing them to send and receive emails. ISPs provide web hosting services to businesses and individuals, allowing them to host their websites on the internet. ISPs provide VPN services to businesses and individuals, allowing them to securely connect to the internet and protect their online privacy. Some ISPs provide cloud storage services to their customers, allowing them to store and access their files online. ISPs are subject to various regulations, depending on the country and region in which they operate. In the US, ISPs are regulated by the Federal Communications Commission (FCC), which oversees the provision of broadband internet services and enforces rules related to net neutrality, data privacy, and consumer protection.

Net neutrality is the principle that all internet traffic should be treated equally, without discrimination or favoritism. In 2015, the FCC adopted net neutrality rules that prohibited ISPs from blocking, throttling, or prioritizing internet traffic based on content, applications, or services. However, in 2017, the FCC under the Trump administration repealed the net neutrality rules, sparking a contentious debate over the future of the internet and the role of ISPs. Consumer

protection is another key area of regulation for ISPs. The FCC has rules that require ISPs to disclose their network management practices, service plans, and fees to customers. The FCC also requires ISPs to take reasonable measures to protect customer privacy and secure their networks from cyber threats.

In addition to the FCC, other regulatory bodies, such as the European Union's Body of European Regulators for Electronic Communications (BEREC), also oversee ISPs and ensure compliance with rules related to net neutrality, consumer protection, and competition. The internet industry is highly competitive, with many ISPs vying for market share. Large ISPs with deep pockets and extensive networks often have an advantage over smaller ISPs, which may struggle to compete on price or quality of service. ISPs must continually invest in new technologies to keep pace with changing customer demands and stay ahead of the competition. This can be challenging, as emerging technologies such as 5G wireless and fiber-optic networks require significant capital investment. ISPs must navigate a complex regulatory environment, with rules and regulations that vary by region and change over time. Changes to net neutrality rules or other regulatory policies can have a significant impact on ISPs' business models and profitability. ISPs must protect their networks from cyber threats such as hacking, malware, and ransom ware attacks. This requires ongoing investment in cybersecurity technologies and staff training, as well as compliance with regulatory requirements related to data privacy and security. As the internet becomes more central to daily life, consumers expect fast, reliable, and affordable internet access. ISPs must balance these demands with the need to maintain profitability and invest in new technologies.

The computing and communications industries have seen unparalleled change because to the Internet before. The telegraph, telephone, radio, and computer's inventions paved the way for this unheard-of capability integration. The Internet is a global network at once a technique for information distribution, a medium for broadcasting, and cooperation and communication through computers with people, regardless of place-based places. The Internet is a vast computer network that enables users to send email and browse the web.

Browse websites, download audio and picture files, chat, publish messages on newsgroups, and with much more, forums. The Advanced Research Projects developed the Internet. In the 1960s, the American Research Projects Agency (ARPA) launched the Arpanet. During this time, academic and governmental organizations housed the first Internet computers and were mostly used to send emails and view files. Beginning in 1983, with the development of the communication technology, the internet as we know it today began to take shape. TCP/IP protocol to ARPANet. Since its inception in 1983, the Internet has made a lot of changes and keeps becoming better. The Internet has been around for two decades accommodate things like frame switched services, ATM, and network LANs. The availability of the internet on mobile devices like pagers and potentially in the near future on TVs[4].

The Internet seems to be enormous and anti-institutional, institutional and cosy, well-organized, and disorderly. The Internet functions something like a global cooperative member networks contributing funds, hardware, maintenance, and other resources to the project technological knowledge. On the portions of the Internet that get governmental funding, the U.S. government has a significant impact. In the middle of the 1980s, the National Science Foundation (NSF) launched the NSFNET, a national network in the US that linked several mid-level networks, which in turn linked academic institutions and other businesses. As part of the phase-out of the

NSFNET production backbone, connection will be made available. In the near future by other providers, including commercial networks. But, you may still individuals talking about the NSF and how it affects the Internet. NSF contributes to a financing for an experimental high-speed network will be given in the near future assisting colleges and institutions in obtaining Internet access.

If you've ever visited a place where you were unable to understand the street signs or navigate, comprehend the benefit of being familiar with the Internet' address and name system. There are two techniques to distinguish the majority of computers on the Internet. Every computer, or host, has a name and a unique numerical address, much like the majority of computers. With our names or phone numbers, you may find any of us. It is simpler to on the Internet, it's easier to remember a name than a phone number. An online typically, a computer name consists of many words that are separated by commas, like yahoo.com. An Internet addresses, or IP addresses, are officially four integers separated by periods[5].

While accessing resources, it is intended for users to utilize the machines' names and to allow the IP addresses are used by routers and computers. Internet-connected device a company maintains a database with the names and addresses of all linked machines to the networks it owns. Considering that there are so many computers connected to the Internet and there. Name assignment is best left to the local networks since they have actual central authority. Internet domain names. These names and locations truly have a system—a DNS, or domain name system, is a naming scheme. The DNS is furthermore a global network of dispersed address and name databases. Such databases give a "translation" service for names to numbers and vice versa, a kind of international

Military, organizations, networks, and two-letter countries are among the terms codes for Switzerland and the United States, respectively, include US and CH. A business may buy a domain name by choosing one of the top-level choose the one from the list of requirements above that best describes it, and then a known variation of its name. For instance, the ABC Software Systems business. After that, it might separate into subdomains, adding departmental levels to the organization chart, or just providing all of its names of machines with the abc.com domain. You'll be able to recall names better after you comprehend how this naming system works simply, and you may also determine information about a computer, such as the company it belongs to belongs. Yet, the names may not usually denote a specific geographic area[6].

The three-letter abbreviations described are used by several American organizations and businesses above (for example, EDU, COM, and ORG) (for example, EDU, COM, and ORG). Nonetheless, the majority of nations have outlined that businesses use top-level domains with their two-letter country codes. For instance, Quake is a computer owned by Thinking Machines Company (think), a American maker of supercomputers. Nowadays, email is a crucial commercial communication tool. It is also fantastic for storing. Keeping in contact with friends and family. Email has the benefit of being cost-free (there is no fee per in comparison to mail, telephonic, and fax services. For almost any topic, there is a vast quantity of knowledge accessible online any topic imaginable, including public policy, services, trade shows, and conferences, market data, fresh ideas, and technical assistance.

Nowadays, a variety of services, including online banking, job searching, and applications and lodging arrangements. These services often don't exist offline or are expensive. By portraying your business or organization as cutting-edge, you may attract new clients and showing potential

clients that you are financially stable, knowledgeable about technology, and prepared the twenty-first century using modern technology to their advantage. And lastly, that you have the means to assist in a way that is most advantageous to your clients. Television, radio, magazine, and newspaper advertisements are increasingly including an online address. Avoiding having to catch up later is best done now. Customers may contact the businesses seven days a week, 24 hours a day. The internet is always on. If a client requests information about a firm, anyone interested in the company's goods or services may visit its website[7].

The Internet is a worldwide network. According to recent estimates, there are roughly 40 million people having Internet connectivity, and this number is increasing daily. By just publishing a Consider creating a full-color brochure without needing to pay for proofs. Long lead times between changes, printers, wasted paper, and more.

Then picture a complete Interactive color brochure with text promoting products or services video, music, and/or graphics one that may be updated right away without the changes to product materials often cost. Everyone's hand is like a virtual brochure, but without the related expenses. Potential clients may get comprehensive information about without having to pay for direct selling any time, any of your goods or services. Also, people may simply purchase your stuff online. Via the Internet or a request form on your website, provide them further information a website[8], [9].

Reduced Expenses of Communication your time is precious, as is the time of your workers most companies and institutions spend time responding to the same queries again. With a website, you make the solutions easily accessible to everybody. You may also change your Wednesday page simply and rapidly updated with fresh information. Information of any kind you think would be helpful might incorporate information about your consumer base on your website to entice people to come.

## CONCLUSION

ISPs play a critical role in connecting users to the Internet and enabling them to access a wide range of services and resources. However, they face a variety of challenges in today's market, including increasing demand for high-speed Internet access, cyber security threats, complex regulations and legal frameworks, intense competition, and customer service expectations. To succeed in this environment, ISPs must be proactive in addressing these challenges and continually adapting to meet the changing needs of their customers.

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## CHAPTER 4

# IMPACT OF THE INTERNET AND WORLD WIDE WEB: A COMPREHENSIVE ANALYSIS

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### **ABSTRACT:**

The internet and the World Wide Web have transformed the way people communicate, access information, conduct business, and interact with the world around them. This paper provides a comprehensive analysis of the evolution and impact of the internet and World Wide Web. The paper traces the history of the internet, from its origins as a military communication network to its current status as a ubiquitous global infrastructure. It also explores the development of the World Wide Web, including the role of Tim Berners-Lee in creating the first web browser and the subsequent explosion of web content and applications.

### **KEYWORDS:**

Business, Communication, Evolution, Internet, Technology, World Wide Web.

### **INTRODUCTION**

The Internet and the World Wide Web (WWW) are two distinct concepts that are often used interchangeably. The Internet is a global network of networks that connects millions of computers and devices together. The World Wide Web, on the other hand, is a collection of web pages and other resources that can be accessed through the Internet. The Internet is a vast and complex network that has revolutionized the way we communicate, do business, and access information. It is a decentralized network that connects computers and devices together through a system of routers and switches. This allows information to flow between different networks and devices, regardless of their physical location. The Internet was initially developed as a means for researchers and scientists to communicate and share information. In the 1960s, the US Department of Defense created a network called ARPANET, which connected several universities and research institutions together. This network was designed to be resilient, so that if one part of the network was damaged or destroyed, the rest of the network could continue to function[1].

Over time, the Internet grew to include more and more computers and devices, and new technologies were developed to make it faster and more reliable. In the 1980s, the World Wide Web was developed as a way to make it easier for people to access information on the Internet. The World Wide Web is a collection of web pages, images, videos, and other resources that are linked together through hyperlinks. These hyperlinks allow users to navigate between different pages and resources on the Web. The Web is based on a set of protocols and standards that define how information is transmitted and displayed. The most important of these is the Hypertext Transfer Protocol (HTTP), which is used to transmit web pages and other resources

between computers and devices. The Web is also based on a system of addresses called Uniform Resource Locators (URLs), which are used to identify and locate specific resources on the Web. URLs are composed of several parts, including a protocol identifier, a domain name, and a path to the specific resource on the server (such as /index.html).

In addition to HTTP and URLs, the Web is also based on several other technologies and standards, including HTML (Hypertext Markup Language), which is used to create web pages, CSS (Cascading Style Sheets), which is used to style web pages, and JavaScript, which is used to add interactivity to web pages. The Web has had a profound impact on the way we communicate, do business, and access information. It has made it possible for people all over the world to share information and ideas, regardless of their physical location. It has also made it possible for businesses to reach customers all over the world, and for people to access a wealth of information on virtually any topic. However, the Web has also presented a number of challenges and risks. One of the biggest challenges is the issue of security. Because the Web is a decentralized network, it can be difficult to ensure the security of the data and information that is transmitted over it. This has led to a number of security breaches and cyber-attacks, which can have serious consequences for individuals and organizations[2].

Another challenge of the Web is the issue of privacy. Because the Web is so interconnected, it can be difficult to maintain privacy and control over personal information. This has led to concerns about data collection and tracking, as well as the use of personal information for targeted advertising and other purposes. Despite these challenges, the Internet and the World Wide Web continue to play a central role in our lives. They have transformed the way we communicate, do business, and access information, and they will continue to shape our world for years to come.

## **DISCUSSION**

The internet and the World Wide Web (WWW) are two of the most transformative technologies of the 21st century. The internet is a global network of interconnected computer networks that allow users to communicate, share information, and access resources from anywhere in the world. The World Wide Web, on the other hand, is a collection of interconnected documents and resources that can be accessed via the internet. In this discussion, we will explore the history, evolution, and impact of the internet and the World Wide Web. The origins of the internet can be traced back to the 1960s, when the U.S. Department of Defense created a network of computers known as ARPANET. The goal of this network was to develop a reliable and secure communication system that could withstand a nuclear attack. In the 1970s, the development of email and file transfer protocols allowed users to share information across the network. By the 1980s, the internet had grown to include universities, research institutions, and government agencies. The development of the Domain Name System (DNS) in 1983 allowed for the use of domain names instead of IP addresses, making it easier for users to access websites[3].

The 1990s saw the commercialization of the internet, with the creation of online services such as AOL and CompuServe. The development of the World Wide Web by Tim Berners-Lee in 1989 revolutionized the way people accessed and shared information online. The World Wide Web is a collection of interlinked documents and resources that can be accessed via the internet. The development of the World Wide Web began in 1989 when Tim Berners-Lee, a researcher at CERN, proposed a system for sharing information between researchers. Berners-Lee developed the first web browser and web server in 1990, and the first website was created in 1991. The

early days of the World Wide Web were characterized by static HTML pages, limited graphics, and slow connection speeds. The mid-1990s saw the introduction of dynamic web pages, which allowed for more interactive and personalized content. The development of JavaScript and Cascading Style Sheets (CSS) allowed for more sophisticated web design and functionality.

The 2000s saw the emergence of Web 2.0, which was characterized by user-generated content, social networking, and collaboration. The rise of mobile devices in the 2010s led to the development of responsive web design, which allows websites to adapt to different screen sizes and devices. The internet has revolutionized the way we communicate, allowing us to connect with people all over the world instantly. Email, instant messaging, and video conferencing have made it easier than ever to stay in touch with friends, family, and colleagues. The World Wide Web has made it possible to access information on any topic from anywhere in the world. Online encyclopedias, news websites, and search engines have made it easier than ever to learn about anything we want[4].

The internet has transformed the way we buy and sell goods and services. Online shopping has made it possible to purchase almost anything from anywhere in the world, while online payment systems have made transactions faster and more secure. The internet has given us access to an endless array of entertainment options, from streaming movies and music to playing online games. The internet has made education more accessible and affordable than ever before. Online courses, tutorials, and educational resources are available.

The rise of social networking sites like Facebook, Twitter, and Instagram has changed the way we connect with others and share our lives. The internet and social media have played a significant role in shaping politics, from election campaigns to grassroots activism. The internet has made it possible for people to work remotely from anywhere in the world, leading to the rise of the gig economy and flexible work arrangements. The internet has transformed healthcare, making it easier for patients to access medical information and connect with healthcare professionals. The internet has raised concerns about privacy and security, with the potential for hacking, identity theft, and cyberbullying. There is still a significant gap in internet access between developed and developing countries, as well as between rural and urban areas. The internet has made it easier for false information to spread, leading to the spread of conspiracy theories, fake news, and propaganda[5].

The internet has also given rise to cybercrime, including hacking, identity theft, and fraud. A few dominant tech companies, such as Google, Facebook, and Amazon, have come to dominate the online landscape, raising concerns about their power and influence. The internet and the World Wide Web have outgrown the regulatory frameworks that were developed in the early days of the internet, leading to calls for new regulations to address issues like privacy, cybersecurity, and competition. The future of the internet and the World Wide Web is uncertain, but one thing is clear: they will continue to shape our lives in profound ways. The next generation of technologies, such as artificial intelligence, the Internet of Things, and block chain, will likely bring new opportunities and challenges.

Internet is an exclusive network, but it is also incredibly egalitarian. It contains useful information, but the Internet is a vast, quickly expanding network of commercial, academic, and research networks that link millions of computers and the people who utilize them in more than a hundred nations. Although having its beginnings in the late 1960s, the internet has recently become highly popular. The US when the government established the Internet's foundation, the



procedure was launched. A network of computers that would all be funded by the Department of Defense (DOD) was established in the same tongue. The goal was to link researchers and government employees and defense contractors who were giving government organizations technology and data. The majority of computer manufacturers at the time used various communication rules[6].

The DOD chose to create a set of protocols that are independent of vendors. The Advanced Research Projects Agency's (ARPANET) network was established inside the TCP/IP protocol suite supplanted the ARPANET protocol in the 1970s. These protocols allowed for efficient data transfer from any computer any other computer on the internet using the ARPANET. Hence, it serves as the basis for the as we understand it now. The following is a timeline of what happened: Oct. IMPs (Interface Message Processors), or special purpose computers Protocol for Network Communication (NCP) E-mail was accidentally created in 1972 to allow for two-way communication exchange programmers. The world's first satellite was sent by BBN's Ray Tomlinson.

Transport Control Protocol/Internet Protocol (TCP/IP) was developed in the middle of the 1970s. Designed by Vintner to connect several packet networks ability to join several distinct networks through the US government favored TCP/IP in 1978; the development of Berkley UNIX, which included TCP/IP, was financed by DARPA in 1980. The National Science Foundation (NSF) financed the creation of CSNET from 1980 to 1986 a network for computer science research. CSNET gained acceptance. NSF launched a new initiative in 1986 to boost networking and computers for centers for research-oriented supercomputing. IT set up the NSFNET network backbone application. When CSNET and BITNET combined in 1987, the backbone's speed was increased from 56 Kbps service provided by TI (1.5:1 Mbps); TI began operations in 1988[7].

The NSFNET programmed has overgrown as a tool for doing scientific research first conception (of 1985). High launched a successor programmed. Internet commercialization as found even today High-speed communications and computing (HPCC Program) Infrastructure for national information. The United States government required that the system be safe and would In the event of a nuclear strike, these locations and computers will continue to cooperate. Host Name: A host name is the resource's server address, followed by two slashes a domain name or an IP address, whichever is appropriate.

Alternatively put, the hostname is a server's name that stores HTML files and associated files. In a server's file system, folder names identify documents. Folders function they do the same task on a web server that they do on your computer. The number of files that the folders can hold is limited. File names are the names given to certain documents. It gives the file's name to be shown (for example, an HTML page, an image, a text file, etc.). In the earlier instance, the most widely used protocols are Transmission Control Protocol and Internet Protocol (TCP/IP). On the Internet, protocol. They primarily work on dividing the data into little packets directing them via the communication channel as well. They are sent to their destination and transported from node to node, then put together to create the data stored on the final computer. A highly well-liked protocol used in combination with the internet is TCP/IP to create a connection while communicating via the internet between two computers, certain guidelines and rules to allow for computer-to-computer data transmission.

Protocol refers to a collection of universally recognized regulations. The protocol which uses TCP/IP establishes the guidelines and methodology for data transmission between several

machines. It is necessary to provide the address of each computer in order to create a connection between two or more of them the machine. This address has to be distinct. Guidelines for secure sending are also needed for transmitting data via the communication channel. TCP/IP is split into two groups. TCP, or Transmission Control Protocol, is one of the protocols, and IP, or Internet Protocol for Transmission Control in this, packets across networks are discussed. The packets are discrete data chunks intended for effective and secure network connectivity. To transfer a data chunk across a data is split up into several bits for transmission, and these data are sent and received as packets. These packets must travel a distance starting from one node or computer to another. We refer to this procedure as routing. The extent of on the basis of network capabilities, packets are chosen. The TCP also guarantees the secure transportation to the location and assembly of all packets to get the whole batch of data stored on the final machines[8].

The addresses of computers are the major topic here. Internet Protocol determines which computer's address will be marked on the packet. This enables different computers or intermediary nodes to route the message to and read the target computers address a node's final position. The hypertext transfer protocol is used to transmit a web page to a user's computer (HTTP). The protocol used to transfer hypertext files, such web pages, is called HTTP internet-based transmission. In general, HTTP servers host web pages. A user makes an HTTP request for a web page with the use of a web browser and client software. Instead, by selecting a hypertext link or specifying a specific Website (uniform resource locator). Next, the server transmits the user's PC with the desired data.

The HTML is interpreted by the browser software web page's information is coded and shown on the website in a legible way. PC of the user. The family of TCP/IP protocols includes FTP. It is a procedure or set of guidelines that allows files to be moved across machines. Ftp operates according to the client/server model with a client software, a user may communicate with a server to obtain information on the server computer, and services. Computers include transferrable file storage known as FTP servers. Use of an FTP client application is required to access these files. Here is an interface that enables the user to find and start the transfer of the desired file(s) process. An individual may get access to a multitude of publicly accessible material through anonymous ftp. There are several types of publicly accessible files accessible through anonymous ftp. Shareware is software that you may use for free for a trial period before purchasing it Authorized Version. Freeware is entirely free software, such as games, typefaces, and clipart. Patches and Upgrades: modifying software via upgrades and fixing issues with software either offered for free or a fee.

On FTP servers, files are often compressed. File size is reduced through compression, and thus File transmission speeds are sped up and more data may be stored on the server. A user must use the proper software to decompress a compressed file before utilizing it. Before transferring data, it is advisable to run current virus checking software on the computer. With this protocol, email is delivered. While sending an email, follow these steps: Mail Transfer Software establishes a TCP connection across the Internet with the remote system which is transmitted to email. After the connection is made, Simple Mail will launch Transmission Protocol (SMTP) defines the destination of mail, the sender of the message, and the email message is subsequently transferred. The SMTP also has functionality that enable for the sender to inquire about the existence of the mailbox to which the message is sent on the or not, a distant computer. The sender might also retain a copy of the communication.

There are several methods for utilizing a PC or Macintosh to browse the Internet. Email may be sent and read. A more well-known application makes advantage of the Post Office. Protocol (POP) (POP). Simply said, the POP system enables each individual workstation to get its Mail is sent by email from a large computer that doubles as a post office when Ask for it from your computer. This removes the need that your computer be on at all times accessible all the time to receive email. Using a POP-based email programmed requires the following[9]:

A POP mail account and Internet connection through dial-up or constant connectivity are required on a computer at a post office ask your Internet provider. Each of these programmed offers flexible editors. When a telephone line is utilized to access the Internet, this is employed. In India, typically, may reach the Internet Service Provider (ISP) server from your house or place of business by using the line of the phone. PPP is a collection of guidelines that outline how the data will be used contacted your computer over the phone when the connection with your. When communication takes place through a serial transmission line, such as the line of the phone. The protocol enables the usage of GUI-based web browsers, such as Microsoft Internet Explorer and Netscape. Internet service providers use the SLIP and PPP protocols. Users need an account to see graphics online. These accounts provide an IP address after a connection is made, address to your machine. A protocol, or set of guidelines, called Telnet makes it possible for two computers to connect. Another name for this procedure is remote login computer used by the user, which the local computer, which launches the connect icon, and the device being the computer that is linked to and accepts the connection is known as the remote or host computer. The user computer mimics the remote computer once it is connected the act of typing these are carried out on the distant computer in orders[10].

Gopher is a protocol designed to find, get, and display documents from distant sources internet-based websites. It does this by having users run a client/server paradigm client applications running on their local computers that provide an interface for interacting with faraway machines or servers that have relevant information. Together with documentation it is possible to create online connections with other users for document retrieval, presentation, and Gopher is a system. Information saved on many computers and accessible via Gopher use the Internet. Gopher servers are the name for these machines. Gopher users may utilized full-text searches and a hierarchy of menus to interact with the programmed gopher's capacity to locate needed documents. Whenever it is located on the network, Gopher fetches the specified file and (if it is text) presents it. Users may believe that Gopher is the only source of information accessible to them Gopher is really connecting with a vast number of computers, not just their local one.

## CONCLUSION

The internet and the World Wide Web have transformed the way we communicate, access information, do business, and live our lives. While they have brought many benefits, they also present significant challenges. As we move into the future, it is essential that we find ways to address these challenges while continuing to embrace the opportunities that the internet and the World Wide Web provide.

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## CHAPTER 5

# EXPLORING THE EVOLUTION, TRENDS AND SECURITY CHALLENGES OF ELECTRONIC PAYMENT SYSTEMS: A COMPREHENSIVE REVIEW

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### ABSTRACT:

Electronic payment systems have become an integral part of modern-day transactions, making cash transactions a thing of the past. As technology continues to advance, electronic payment systems have also evolved, providing users with numerous options to choose from. This paper provides a comprehensive review of the evolution, trends, and security challenges of electronic payment systems. The paper begins by presenting an overview of electronic payment systems, highlighting the different types of systems and their features. It then delves into the evolution of electronic payment systems from the early days of electronic fund transfer to the current day. The paper also highlights the current trends in electronic payment systems, including the adoption of mobile payment systems, block chain-based payment systems, and contactless payment systems.

### KEYWORDS:

Contactless payments, Digital wallets, Electronic payment system, E-commerce, Mobile payments, Online transactions.

## INTRODUCTION

Electronic Payment Systems (EPS) refer to the various methods that allow electronic funds transfer from one party to another. Electronic Payment Systems have gained popularity and have replaced traditional payment methods such as cash, checks, and money orders. In today's digital world, electronic payment systems have become an integral part of e-commerce, online shopping, and other online transactions. In this paper, we will discuss the different types of electronic payment systems, their benefits, and their limitations.

### Types of Electronic Payment Systems:

#### 1. Credit and Debit Cards:

Credit and Debit cards are the most common electronic payment methods. Credit cards are issued by financial institutions, which allow the cardholder to borrow money up to a specific limit. The cardholder is required to pay the borrowed amount along with interest on the outstanding balance. Debit cards, on the other hand, allow the cardholder to spend only the available funds in their account.

## **2. Online Banking:**

Online Banking refers to the electronic transfer of funds between bank accounts. Online banking can be used for a variety of purposes such as paying bills, transferring money between accounts, and making online purchases. Online banking has become an essential part of the banking industry, with many banks offering online banking services to their customers[1].

## **3. Digital Wallets:**

Digital Wallets refer to mobile apps that allow users to store and manage their payment information, including credit and debit cards, bank account details, and other payment methods. Digital Wallets make it easy for users to make payments online and in-store using their smartphones.

## **4. Mobile Payment Systems:**

Mobile Payment Systems allow users to make payments using their mobile phones. Mobile Payment Systems can be used to make payments in-store, online, or to other individuals. Mobile Payment Systems use Near Field Communication (NFC) technology, which allows users to make payments by tapping their mobile phones on a compatible payment terminal.

## **5. Electronic Checks:**

Electronic Checks are similar to traditional paper checks but are processed electronically. Electronic Checks can be used to make payments online, over the phone, or through email. Electronic Checks are a secure and convenient way of making payments.

### **Benefits of Electronic Payment Systems:**

#### **1. Convenience:**

Electronic Payment Systems offer a high level of convenience to users. Users can make payments from the comfort of their homes or offices, without having to go to a physical location. Electronic Payment Systems are available 24/7, allowing users to make payments at any time of the day.

#### **2. Speed:**

Electronic Payment Systems offer a faster way of making payments compared to traditional payment methods. Payments can be made instantly or within a few hours, depending on the type of electronic payment system used.

#### **3. Security:**

Electronic Payment Systems offer a high level of security compared to traditional payment methods. Electronic Payment Systems use encryption and other security measures to protect user information and prevent fraud.

#### **4. Cost-effective:**

Electronic Payment Systems are cost-effective compared to traditional payment methods. Electronic Payment Systems save users time and money by eliminating the need for physical checks, stamps, and envelopes.

**Limitations of Electronic Payment Systems:****1. Security Risks:**

Electronic Payment Systems are susceptible to security risks, such as hacking and identity theft. Users need to be careful when using electronic payment systems and ensure that they use a secure network and keep their payment information confidential[2].

**2. Technical Issues:**

Electronic Payment Systems are dependent on technology and can experience technical issues such as system failures, which can result in delays and inconvenience to users.

**3. Lack of Universal Acceptance:**

Not all merchants accept all types of electronic payment systems. Some merchants may only accept certain types of electronic payment systems, limiting the options available to users.

**4. Lack of Regulation:**

Electronic Payment Systems are not regulated in the same way as traditional payment methods, which can result in a lack of consumer protection.

**DISCUSSION**

Electronic payment systems, also known as digital payment systems or e-payment systems, refer to the methods of transferring money electronically between parties. In recent years, these systems have become increasingly popular due to the convenience, speed, and security they offer. One of the most common types of electronic payment systems is credit card payments. Credit cards allow consumers to make purchases by borrowing money from a financial institution and paying it back over time with interest. Another popular type of electronic payment system is the use of debit cards, which allow consumers to make purchases using their own funds directly from their bank accounts.

Other types of electronic payment systems include online banking, electronic checks, digital wallets, and peer-to-peer payment services like Venmo and PayPal. These services allow individuals to transfer money directly to other individuals or businesses without the need for traditional banking institutions. Electronic payment systems offer numerous advantages over traditional payment methods. They are fast, secure, and convenient, and can be used to make purchases from anywhere in the world at any time. They also offer greater transparency and accountability, as transactions can be easily tracked and monitored[3].

However, there are also some potential disadvantages to electronic payment systems. One of the main concerns is the risk of fraud and security breaches. Hackers and cybercriminals may attempt to steal personal information and financial data, putting consumers at risk of identity theft and financial loss. Another concern is the potential for technical glitches and system failures. Electronic payment systems rely on complex software and infrastructure, and any problems or outages could result in lost transactions and revenue. Overall, electronic payment systems are a valuable tool for businesses and consumers alike, offering numerous benefits over traditional payment methods. However, it is important for users to be aware of the potential risks and take steps to protect their personal and financial information.

Electronic payment systems have been rapidly gaining popularity in recent years as the world moves towards a more cashless society. These systems have revolutionized the way people conduct financial transactions, allowing them to make payments and transfers quickly, easily, and securely. In this paper, we will discuss the various types of electronic payment systems, their benefits and drawbacks, and their impact on the economy[4].

**Credit and Debit Cards** Credit and debit cards are perhaps the most well-known and widely used forms of electronic payment. Credit cards allow users to borrow money from a financial institution and pay it back over time with interest, while debit cards allow users to spend money directly from their bank accounts. Both types of cards are accepted at most merchants and can be used for online purchases as well.

**Online Banking** Online banking allows users to conduct transactions, view their account balances and statements, and perform other financial activities from a computer or mobile device. Most banks now offer online banking services, allowing customers to access their accounts 24/7 from anywhere with an internet connection.**Digital Wallets** Digital wallets are mobile apps that allow users to store their payment information, such as credit or debit card details, and make payments from their smartphones. Examples of popular digital wallets include Apple Pay, Google Pay, and Samsung Pay. **Peer-to-Peer (P2P) Payment Services** P2P payment services allow users to transfer money directly from one bank account to another without the need for a traditional bank. Examples of popular P2P payment services include Venmo, Zelle, and PayPal[5].

**Convenience** Electronic payment systems allow users to make transactions quickly and easily from their computers or mobile devices, without the need for cash or checks. This makes it much more convenient to pay bills, make purchases, and send money to friends and family. **Speed** Electronic payment systems process transactions much faster than traditional payment methods. For example, credit card transactions can be completed in a matter of seconds, while bank transfers can take several days. **Security** Electronic payment systems are generally more secure than traditional payment methods. Transactions are encrypted, and payment information is stored securely on servers. Most payment systems also offer fraud protection and other security features to protect users' financial information.

**Transparency** Electronic payment systems offer greater transparency and accountability than traditional payment methods. Users can easily track their transactions and view their account balances and statements online. **Risk of Fraud and Security Breaches** Electronic payment systems are vulnerable to fraud and security breaches, which can result in financial losses and identity theft. Hackers may attempt to steal payment information or access users' accounts, so it's important to take steps to protect personal and financial information. **Technical Glitches and System Failures** Electronic payment systems rely on complex software and infrastructure, which can be vulnerable to technical glitches and system failures. If a payment system experiences an outage or other issue, it could result in lost transactions and revenue[6].

The rise of electronic payment systems has had a significant impact on the economy. Here are a few ways in which these systems have affected various sectors of the economy: **Retail** Electronic payment systems have made it easier for retailers to accept payments from customers, both in-store and online. This has led to increased sales and revenue for many businesses. **Banking** Electronic payment systems have disrupted the traditional banking industry, allowing new



players to enter the market and compete with established institutions. This has led to increased innovation and lower fees for consumers.

Government Electronic payment systems have made it easier for governments to collect taxes and fees from citizens, as well as disburse benefits and other payments. This has led to increased efficiency and reduced costs for governments. International Trade Electronic payment systems have made it easier and more affordable for businesses to conduct international trade, as they can quickly and securely transfer funds across borders without the need for traditional banking institutions. Small Businesses Electronic payment systems have been a boon for small businesses, allowing them to accept payments from customers without the need for expensive point-of-sale systems. This has leveled the playing field for small businesses, enabling them to compete more effectively with larger companies.

Electronic payment systems (EPS) are digital payment methods that allow individuals, businesses, and governments to send and receive payments electronically. With the rise of the internet and the growth of e-commerce, electronic payments have become increasingly popular, providing a faster and more convenient way to pay for goods and services. This discussion will explore the different types of electronic payment systems, their advantages and disadvantages, and the challenges facing their adoption. Credit and debit cards are one of the most widely used electronic payment systems. These cards allow users to make purchases by swiping or inserting their cards into card readers. Credit cards allow users to borrow money to make purchases, while debit cards allow users to spend the money they already have in their bank accounts. EFT allows users to transfer funds between bank accounts electronically. This type of payment is commonly used for direct deposit of paychecks, bill payments, and online shopping[7].

Digital wallets allow users to store their credit or debit card information on their mobile devices. This information can be used to make purchases in-store or online. Mobile payments allow users to make payments using their mobile devices. This type of payment is commonly used for peer-to-peer transactions, such as splitting a restaurant bill with friends. Crypto currencies are digital currencies that use cryptography to secure transactions and control the creation of new units. Bitcoin is one of the most well-known crypto currencies. Electronic payment systems allow users to make transactions quickly and easily, without the need for physical cash or checks. Electronic payments are processed almost instantly, reducing the time it takes for transactions to be completed. Electronic payment systems are often more secure than traditional payment methods, as they use encryption and other security measures to protect user data. Electronic payments can be cheaper than traditional payment methods, as they do not require physical infrastructure, such as bank branches or ATMs.

Electronic payment systems can be vulnerable to fraud and hacking, which can result in financial losses for users. Electronic payment systems can experience technical issues, such as system crashes or server downtime, which can disrupt transactions. Electronic payment systems require technology, such as computers and mobile devices, which can be subject to malfunction or damage. Electronic payment systems can compromise user privacy, as transactions can be tracked and monitored by governments, corporations, or hackers. Electronic payment systems require a reliable and secure infrastructure, including internet access and mobile devices, which may not be available in all regions or countries. Some users may be hesitant to adopt electronic payment systems due to concerns about security, privacy, or unfamiliarity with the technology. Electronic payment systems are often subject to regulations and laws, which can vary between

countries and regions, creating barriers to adoption and interoperability. Electronic payment systems may not be compatible with each other, creating difficulties for users who need to make transactions across different systems or platforms.

As businesses search for more efficient ways to transact online, electronic payment solutions are essential strategies to provide customer service more quickly and cheaply. New developments in the payment for products and services, internet commerce promises to provide a variety of new opportunities possibilities for business. Products and services must be paid for by customers. Payment is undoubtedly a crucial component of the Prompt payment and the mercantile procedure are essential. If the different parties' claims and debits are not Due to payments, participants (consumers, businesses, and banks) are not in balance if there is a delay, the whole business chain is broken. Hence, quick and secure credit or debit card payment, clearing, and settlement is a key component of online commerce claims.

In many respects, the situation of online electronic payments today is similar to the middle Ages. While attempting to trade between Asia and Europe, merchants encountered a similar issue. Those ancestors who traded encountered several challenges (such as contradictory local laws and norms pertaining restrictive business practices and non-convertible, incompatible currencies trade. Several types of payment were created by merchants to get around some of these issues instruments. Also, the merchants created commercial legislation governing the use of these tools, which proved to be one of the pivotal moments in the history of commerce and commerce[8]

Similar developments are about to occur in the world today, except they are unlikely to take as long as it did for the conventional payment system to evolve. Everyone concurs that a possible bottleneck in the payment and settlement process might be if we depend on traditional payment methods in the dynamic internet commerce environment using instruments like cash, cheques, bank draughts, or bills of exchange digital clones of the speed necessary for e-commerce is not well suited for these traditional instruments processing of purchases. For instance, small-denomination payments (micropayments) must be sent to suppliers in real time and accepted by them. Considering the high transaction costs and slowness of conventional instruments, micropayments processing them involves significantly increase the overhead novel means to satisfy the new requirements of e-commerce, payment are required. Systems for electronic payments are becoming important in online commercial transactions. As businesses today seek for new ways to provide clients with quicker and more affordable services effectively.

Internet commerce opens up a variety of new global company opportunities. There is no denying that there are more and more electronic payment systems more widespread and will be significant in the commercial sector digital payment includes an exchange of money for products or services between a player and a payee a minimum the issuer (used by the payer) and payee will both be one financial entity, such as a bank. Risks are recognized with electronic payment systems trust, legal clarity, and security are key factors affecting public acceptance of trade between enterprises and people. Moreover, social and financial aspects play an important part. Numerous papers on risk awareness discuss how the opaque legal landscape poses problems for both businesses and customers. E-commerce resistance in this situation seems to be more noticeable in businesses than in clients.

The fundamental cause of businesses' reluctance there might be uncertainty brought on by a lack of laws defining when a transaction occurs legally valid. Also, for consumers, the safety of online payments methods could be important. Acceptance of credit cards by merchants is a

significant problem in Europe. Initially, the credit cards were made available to retailers on the premise that transactions that were allowed would be honored. After the system has been put in place, banks in some. Tensions arise when nations penalize merchants for dishonest deals a few huge due to the conditions of their contracts, merchants continue to refuse to accept credit cards. The outcome has Debit cards, which use the same infrastructure but vary in some ways, have become more popular contract conditions. Generally speaking, there doesn't seem to be agreement on whether businesses and clients explicitly determine if they would discriminate between secured and unsecured forms of payment not consent to the latter due to the dangers involved.

Some groups think that businesses and clients discern between secured and insecure ways with ease. However, some claim that only businesses can tell the difference between secured and unsecured debt methods. Contrarily, customers' understanding of hazards is likely dependent on It relies less on analysis and more on perception than on facts. When both spouses are E-commerce (banks and merchants) is trustworthy and provides practical payment methods, the danger problem is still unknown to the general people. The typical person's top priority is consumer seems to be upholding the exchanging of credit card details in confidence

According to some experts, the perceived lack of security in online transactions danger is greatly overblown and not at all warranted by electronic payments. The typical customer is not yet aware of the danger of having his card information stolen much higher than over the Internet in traditional face-to-face purchases. Here are some of the consequence of unfamiliarity and ignorance, as well as an incorrect trust in the security of conventional methods of payment. In this regard, the challenge of generalizing the every systems' security considerations should be emphasized. There are several payment options systems with differing levels of security due to different security features[9].

The security of electronic payments is impacted by several other problems, possibly much more so. Importantly, the human, procedural, and physical security measures used at the two endpoints of a communication connection (whether via a PC, smart card or mobile phone). It is also well recognized that "insider" threats are to blame for the majority of security lapses as opposed to by outside hackers (or crackers). A buyer-to-seller transfer of funds is an essential part of the traditional payment and settlement procedure cash or payment specifics (e.g. credit card or check). The payment's real settlement takes occur in the network for money processing. When paying with cash, the buyer must the seller's deposit, a withdrawal from his bank account, and a cash transfer to the seller of the transfer of funds to their account.

Payment methods other than cash are settled by modifying the relevant balances between the banks by crediting and debiting them in accordance with based on credit card or check payment details. Condensed for both cash and non-cash transactions, a diagram. Money is transferred from the buyer's bank to the buyer's bank by means of in-person transactions in the market. Whenever a purchaser makes use of a payment method, payment details as opposed to cash transfers from the buyer to the in the end, payments are resolved between the impacted banks who notarial depending on the payment details, change the accounts. This clearing procedure works in actual markets involves middlemen, such as check clearing or payment card providers companies. The majority of payment systems are conceptually built around identical procedures concerning the names of the buyer and the vendor, as well as certain guidelines for payment

settlement without disclosing financial data such as the actual numbers associated with credit card or bank accounts the values that digital money represents.

### CONCLUSION

Electronic payment systems have transformed the way people conduct financial transactions, offering greater convenience, speed, and security than traditional payment methods. While these systems have many benefits, they also come with some potential drawbacks, including the risk of fraud and technical glitches. As electronic payment systems continue to evolve and improve, it is important for users to stay vigilant and take steps to protect their personal and financial information. Overall, electronic payment systems have had a significant impact on the economy, enabling businesses and individuals to conduct transactions more efficiently and effectively than ever before.

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## CHAPTER 6

### IMPACT OF E-COMMERCE ON THE BANKING INDUSTRY: OPPORTUNITIES AND CHALLENGES

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#### **ABSTRACT:**

The emergence and growth of e-commerce have significantly influenced the banking industry, and this trend is expected to continue in the foreseeable future. E-commerce has transformed the way customers conduct financial transactions, and the banking industry has had to adapt to remain competitive. This paper aims to explore the impact of e-commerce on the banking industry, particularly in terms of the opportunities and challenges that it presents. The paper begins by providing a brief overview of e-commerce and its growth in recent years. It then examines the role of e-commerce in the banking industry, including the rise of online banking, mobile banking, and other digital financial services. The paper also discusses the advantages of e-commerce for banks, such as reduced costs, increased customer satisfaction, and expanded customer reach.

#### **KEYWORDS:**

Banking Industry, Customer Satisfaction, Digital Financial Services, E-Commerce, Online Banking.

#### **INTRODUCTION**

E-commerce is the buying and selling of goods or services over the internet. It has transformed the way business is conducted in the modern world. Banking, on the other hand, is the practice of accepting deposits, making loans, and providing other financial services. The banking industry has also been revolutionized by technology, which has enabled banks to provide their services online. In this paper, we will explore the impact of e-commerce on the banking industry, the challenges and opportunities it presents, and how banks are responding to these changes.

#### **Impact of E-commerce on the Banking Industry**

The rise of e-commerce has had a significant impact on the banking industry. Firstly, it has made banking services more accessible to customers. Customers can now access banking services from anywhere in the world, as long as they have an internet connection. This has made it easier for banks to expand their customer base and provide services to people who previously had limited access to banking services[1].

Secondly, e-commerce has enabled banks to provide their services more efficiently. Banks can now automate many of their processes, such as account opening, loan approvals, and fund transfers. This has reduced the need for manual processing and has made banking services faster

and more reliable. Thirdly, e-commerce has made it easier for banks to offer a wider range of products and services. Banks can now offer their customers a range of investment products, insurance products, and other financial services. This has enabled banks to generate more revenue and has made them more competitive.

### **Challenges and Opportunities**

The rise of e-commerce has presented both challenges and opportunities for the banking industry. One of the biggest challenges facing banks is the threat of cyber-attacks. As banking services become increasingly reliant on technology, banks are at risk of being targeted by hackers and other cyber criminals. This can result in the theft of customer data, financial fraud, and other security breaches. Another challenge facing banks is the need to adapt to changing customer expectations. Customers now expect banking services to be available 24/7, and to be accessible from anywhere in the world. Banks need to invest in technology to meet these expectations, and to provide a seamless customer experience.

Despite these challenges, e-commerce has also presented banks with a range of opportunities. One of the biggest opportunities is the ability to expand their customer base. Banks can now provide services to customers who previously had limited access to banking services. This includes people in rural areas, or people who live in countries where there are few banks. Another opportunity presented by e-commerce is the ability to offer a wider range of products and services. Banks can now offer investment products, insurance products, and other financial services. This has enabled banks to generate more revenue, and to become more competitive in the market.

### **How Banks are responding to E-commerce**

Banks have responded to the rise of e-commerce in a number of ways. One of the most significant responses has been the development of online banking platforms. Banks now offer customers the ability to manage their accounts online, including checking balances, transferring funds, and paying bills [2]. Another response has been the development of mobile banking applications. Banks now offer mobile apps that allow customers to manage their accounts from their smartphones or tablets. This has made banking services more accessible to customers, and has provided a more convenient way to manage finances.

Banks have also invested in technology to improve the security of their online banking platforms. This includes the use of encryption and other security measures to protect customer data from hackers and other cyber criminals. In addition to these responses, banks have also embraced e-commerce as an opportunity to expand their customer base and offer a wider range of products and services. Banks have developed online investment platforms, insurance products, and other financial services to meet the changing needs of customers.

## **DISCUSSION**

E-commerce and banking industries have been two of the most rapidly evolving industries in recent times. The emergence of e-commerce has transformed the way people shop, while the banking industry has undergone a significant transformation through the digitization of its services. E-commerce has created a new avenue for businesses to reach customers, and banking has played a crucial role in facilitating online transactions. With the rise of e-commerce, there

has been an increase in demand for digital payment systems, and banks have been at the forefront of developing secure and reliable payment systems[3].

The integration of banking and e-commerce has resulted in several benefits for consumers. Online shoppers can now pay for their purchases using various payment methods, such as credit cards, debit cards, e-wallets, and internet banking. With these payment options, consumers can easily and securely purchase products and services from anywhere in the world. Furthermore, e-commerce platforms have enabled banks to expand their customer base and offer new services. Banks can now provide online account opening and loan applications, as well as offer investment opportunities to their customers through e-commerce platforms.

However, the integration of e-commerce and banking has also brought about new challenges. One of the significant challenges is the security of online transactions. Cybersecurity threats such as hacking and identity theft are a significant concern for both industries. Banks and e-commerce platforms have to continuously improve their security measures to safeguard their customers' financial and personal data. Another challenge is the regulatory landscape. Governments and regulatory bodies across the world are still grappling with the regulations needed to govern e-commerce and digital banking activities. This lack of regulatory clarity creates uncertainty for both e-commerce and banking industries[4].

Electronic commerce, commonly known as E-commerce, has revolutionized the way businesses operate. E-commerce refers to the buying and selling of goods and services over the internet or other electronic networks. With the rise of E-commerce, the banking industry has also been affected as the online payment system is a crucial part of E-commerce transactions. In this discussion, we will explore the relationship between E-commerce and the banking industry and how they impact each other. The banking industry has been a key player in the growth of E-commerce. The primary reason is the online payment system that allows customers to make transactions with ease. With the help of online payment systems, customers can make payments using various methods, including credit/debit cards, net banking, digital wallets, and more. This has made the buying process more convenient for customers, thereby driving the growth of E-commerce.

Banks play a crucial role in the development of E-commerce. Banks provide the necessary infrastructure for secure and efficient online payment systems. Banks work closely with E-commerce merchants to provide a seamless payment experience for customers. Banks also provide various payment gateway solutions, which are used by E-commerce businesses to accept payments online. In recent years, there has been a significant shift in the banking industry towards digital banking. This has been driven by the increasing adoption of E-commerce and the need to provide customers with a seamless online banking experience. Banks are now providing various digital banking services such as mobile banking, internet banking, and more. This has enabled customers to perform banking transactions from the comfort of their homes, making banking more convenient and accessible[5].

The rise of E-commerce has had a significant impact on the banking industry. E-commerce has led to an increase in online transactions, which has made banks focus on strengthening their online security measures to prevent fraud and other cybercrimes. Banks are also investing in new technologies such as block chain and artificial intelligence to enhance security and provide a better customer experience. E-commerce has also led to the growth of alternative payment systems, such as digital wallets and crypto currency. These payment systems offer customers an

alternative to traditional payment methods and have led to the emergence of new players in the payment processing industry. Banks have responded by investing in their own digital wallet solutions to compete with other players in the market. E-commerce has also led to the growth of cross-border transactions. Customers can now buy products from merchants located in different countries, which has led to an increase in foreign currency transactions. Banks are now providing various foreign currency services to facilitate cross-border transactions, such as forex cards and online foreign currency transfers.

The banking industry has had a significant impact on the growth of E-commerce. Banks provide the necessary infrastructure for secure and efficient online payment systems, which is a crucial component of E-commerce. Banks work closely with E-commerce merchants to provide a seamless payment experience for customers. Banks also provide various services such as loans, credit, and debit cards, which are used by E-commerce businesses to grow and expand their operations. Banks provide working capital loans and other financial services to E-commerce businesses, which enables them to invest in marketing, inventory, and other operational expenses. Banks also play a crucial role in the development of digital infrastructure, which is essential for the growth of E-commerce. Banks invest in new technologies such as block chain, artificial intelligence, and other digital solutions, which enable E-commerce businesses to provide a better customer experience[6].

E-commerce and banking industries are two of the most rapidly growing industries in the modern world. The rise of e-commerce has completely transformed the way people shop and conduct business transactions. At the same time, the banking industry has become an integral part of the global economy, facilitating financial transactions across the world. In this discussion, we will explore the relationship between these two industries, the challenges they face, and the opportunities they offer.

E-commerce refers to the buying and selling of goods and services over the internet. The industry has grown rapidly in recent years, with more and more people turning to online shopping for convenience and lower prices. According to a report by Statista, global e-commerce sales are projected to reach 6.5 trillion US dollars by 2023, up from 3.5 trillion US dollars in 2019. E-commerce has several advantages over traditional brick-and-mortar stores. For consumers, it offers convenience, 24/7 availability, and a wider range of products to choose from. For businesses, it offers a global reach, reduced overhead costs, and the ability to reach customers who may not have access to physical stores. The banking industry plays a critical role in the global economy by facilitating financial transactions between individuals, businesses, and governments. Banks offer a range of services, including savings accounts, loans, credit cards, and investment services. According to a report by the World Bank, the global banking industry had total assets of 143.6 trillion US dollars in 2020[7].

The banking industry has undergone significant changes in recent years due to technological advancements and regulatory changes. The rise of fintech has disrupted the traditional banking model, with new players offering innovative services and products that challenge traditional banks. At the same time, regulations such as Basel III and MiFID II have increased the compliance burden on banks, making it more difficult for them to operate profitably. The relationship between e-commerce and the banking industry is symbiotic, with both industries relying on each other to function effectively. E-commerce platforms require a secure and reliable



payment infrastructure to process transactions, while banks need e-commerce platforms to reach new customers and offer their services.

One of the key challenges for e-commerce platforms is to offer a range of payment options that are convenient and secure for customers. This requires collaboration with banks to integrate their payment systems with the e-commerce platform. In turn, banks benefit from the increased transaction volume that comes with partnering with e-commerce platforms. Another area of collaboration between e-commerce and banking industries is in the area of financing. E-commerce platforms require financing to grow their businesses, and banks are often the primary source of funding. Banks, on the other hand, benefit from lending to e-commerce platforms, as they offer a high potential for growth and profitability[8].

Despite the opportunities offered by e-commerce and the banking industry, both sectors face several challenges that could impede their growth. One of the key challenges facing e-commerce platforms is the threat of cybercrime. As more transactions are conducted online, the risk of fraud and data breaches increases. This could result in significant financial losses for e-commerce platforms and erode customer trust. E-commerce platforms need to invest in robust security measures to protect their systems and customers' data. The banking industry, on the other hand, faces several regulatory challenges. Regulations such as Basel III and MiFID II require banks to hold higher levels of capital and increase their compliance burden. This has increased the cost of doing business for banks, making it more difficult to operate profitably. Banks also face the threat of cybercrime, as hackers target their systems to steal customer data and money.

Opportunities for E-commerce and Banking Industry facing e-commerce and banking industries, there are several opportunities for growth and innovation. One of the key opportunities for e-commerce platforms is to leverage emerging technologies such as artificial intelligence (AI) and machine learning (ML) to improve the customer experience. AI and ML can be used to personalize recommendations and improve search results, making it easier for customers to find the products they are looking for. Additionally, e-commerce platforms can use these technologies to optimize pricing and inventory management, improving their bottom line. Another area of opportunity for e-commerce platforms is to expand their reach into emerging markets. According to a report by McKinsey, emerging markets are expected to contribute more than half of global GDP by 2030. E-commerce platforms can leverage this growth by offering localized services and products that cater to the unique needs of consumers in these markets[9].

For banks, one of the key opportunities is to embrace digital transformation and offer innovative services and products. Banks can leverage emerging technologies such as block chain and cloud computing to streamline their operations and offer new services such as digital wallets and peer-to-peer lending. This can help banks to stay competitive in an increasingly crowded market and attract new customers. Another area of opportunity for banks is to expand their services into emerging markets. According to a report by the World Bank, around 1.7 billion adults worldwide are unbanked, with limited access to financial services. Banks can leverage their expertise and resources to offer financial services to underserved populations, such as microfinance and mobile banking services.

The method that banking is conducted has changed dramatically since the 1990s. The situation has been advancing quite quickly as electronic commerce (e-commerce) is becoming more popular in the financial sector. Technology has changed how a significant influence on this

sector by lowering operational costs and offering sufficient client service. The keen interest that bankers have in electronic banking (sometimes known as "e-banking") represents a more widespread interest in the using the internet as a platform for business.

E-fundamental banking's component is the internet is a resource for the gathering, transport, storage, and processing of information assets. The most effective and powerful instrument for managing these information activities. The concepts of "Anywhere Banking" and "Anytime Banking" are now realities. There doesn't a particular online banking area where transactions are restricted. Keeping books is Tax calculation is automated and simplified. Bills are settled for at least effort. E-banking gives financial organizations a larger audience. The majority of online banking when it helps the user save time and money, it is valuable. It is very beneficial for those who are using a personal financial programmed like who have several invoices to pay and Microsoft Money or Quicken from Intuit. E-banking is always needed as more individuals get addicted to doing their banking online transaction in a fast and simple manner. Also, since e-banking is safe a lot of businesses are switching to online banking. Electronic money is used in e-banking. Debit or check cards, smart cards or digital checks, digital currency, and stored-value cards are the many sorts of digital money. Whenever anybody makes transactions using a check card, the money is promptly moved from his or her account to the business's account[10].

RFID cards have an inbuilt credit of a certain amount. Both are included on the card's chip financial and personal data about the user. Digital currency is one method of enabling instead of using a credit card, customers buy things online. Digital with electronic bill payment services, checks are utilized. Customers may utilized their own they may utilized software offered by a bank or several financial software applications. Nowadays, loans are sold as products that come with a range of value-added services them to. Banks provide mutual funds, student loans, auto loans, and mortgages credit cards, debit cards, and loans. Petroleum has been linked to some things.

The financial industry is already undergoing restructuring. Whenever banks converse, they are modifying their organizations to adapt in order to provide anyplace service for their clients due to the new reality that has increased their productivity and function-direness. Public Sector banks are also refocusing to alter their profile in order to boost new money obtained from the market. For banks of all sizes, the Internet is a very effective tool for collecting and handle information to accommodate people's varying financial demands, and enterprises, in particular, by combining or "bundling" services.

On the other hand, the Internet enables financial organizations of all sizes to enter markets and reach clients who were previously out of their grasp. Nonetheless, there are a number of significant bigger institutions, economies of size and scope in data processing and storage compared to smaller banks, are better positioned to take advantage of these size and scope savings. E-commerce may be generically referred to be all performed transactional business. Business-to-business (B2B) electronic communication between firms and their end-customers (B2C), as well as within a business, online, and extranets intranets, etc. E-commerce, or online business transactions, has grown to be a significant economic power. Not only do people buy items online, but they also use technological devices trade of goods and services, including expertise and information like legal counsel.

Access to and supply of information are E-commerce security is a crucial concern, just as it has always been for any kind of commerce. For full social, economic, and educational participation,

online access is already necessary participation in light of the declared electronic participation objectives of the public and private sectors service provision. To transfer money directly from one person to another through electronic methods is called electronic another's account. Customers of banks may use an electronic banking system to use to get access to accounts and basic information about bank services and goods computer system or different intelligent apparatus.

Payment methods include phone systems, point-of-sale terminals, Online banking, and PC banking services, including banking, via a mobile device. Online banking provides customers the ease of paying their bills, moving money across accounts, and bills and other purchases, seven days a week, 24 hours a day. A robust and adaptable bank e-commerce system that is completely integrated business server with services and apps that fully use the currently collected data, including risk profiles, credit histories, and consumer demographics Leveraging account histories to aid in using consumer preferences and speeding up time to market and raise the net income. The demand for e-banking, individualized data and customer service, and the finest network quality are what forward-thinking banks are concentrating on security.

The performance of banks has been significantly impacted by e-banking. Benefits and challenges of technology in e-commerce banking Modern technologies provide hitherto unheard-of degrees of connection and growing opportunities for independent life and fair access to information. Electronic technologies can ease the cost and challenge of information provision e-banking hurdles might include worries about security and privacy, especially with credit cards, pricey shipping and delivery, time-consuming, and challenging to discover websites/products, ordering procedure complexity. Accountability and trust are the primary prerequisites. E-banking may not be suitable for all users and may involve certain risks. Despite significant access issues for certain persons with impairments.

It's possible that financial market liberalization and globalization have prepared the path to enhanced cross-border financial accessibility, but the major improvements in electronic Technology has enhanced cross-border banking's ability to be quick and anonymous. Without the financial market liberalization. Technology advancements in the banking sector have led to a significant Prior until now, the banking sector has focused mostly on asset quality and capitalization, however currently capitalization and asset quality performance are not sufficient. Deep knowledge of the competitive climate and innovative methods to more income is what contemporary banks mostly want.

The needs of customers are drastically altering in this dynamic climate. Consumers now wish to download account data and access account-related information to move money across accounts, personal financial software tools, and pay your bills online. The bank must be capable of protecting consumer data and private space. Banking sector consolidation and the broadening reach of financial services companies indicates that the sector will be held accountable for their offerings for preserving and protecting vast databases that contain a wealth of information on individuals.

The requirements of ecommerce go well beyond mere connectivity in such a fiercely competitive networked financial sector. Competitive pressures have forced it is evident that banks must continue to use cutting-edge e-commerce technologies in order to they are able to consistently provide high-quality service wherever and across any medium for communication. Banks need integrated e-commerce platforms the complete back office and corporate decision-making

process chain for best results profitability, adaptability to shifting market demands, and flexibility. Now sophisticated e-commerce is necessary since no one wants to lag behind conventional methods.

E-commerce and banking services based on innovative technologies think about how convenient it would be to do routine banking without leaving your desk. Imagine not having to mail bills and make checks each month. Using just with a personal computer, a modem, and a bank for internet banking, one control all monthly expenses, such as creditor, rate, and power payments invoices. The capability of moving money between accounts and getting transaction information it is simpler and easier to have fast access to all financial records.

Indeed, almost all normal banking activities such transfers, payments, and reconciliations, as well as paying salaries and Paying salary from one's own workplace is easily doable with electronic banking. PC connection direct connection to the bank's computer allows for quick and easy access whenever required branch network optimization for cost reduction.

By the optimization of the branch networks, e-primary banking's goal is to enhance operational efficiency, minimize compliance expenses, and strengthen internal financial controls efficiency, organizational effectiveness, and improved capital allocation for large-scale savings on cash reserves, a decrease in capital expenses as a result of improved risk management, and an strategic decision-making, improving investor image and reputation, and increased freedom, and client communities.

Customer's desire to utilized technology as the internet becomes more popular. To connect to a bank's network from anywhere in the globe. Using the Internet as a tool Due to technology, more people can now access banking goods and services obstacles caused by proprietary systems and geography were removed. With a larger market, also, banks may increase or modify the range of goods and services they provide using enabling technologies to provide comfort and high-quality service.

## CONCLUSION

E-commerce and banking industries are two of the most important and rapidly growing industries in the modern world. These industries rely on each other to function effectively, with e-commerce platforms requiring a secure and reliable payment infrastructure, and banks needing e-commerce platforms to reach new customers and offer their services. Despite the challenges facing these industries, such as cybercrime and regulatory burden, there are several opportunities for growth and innovation. E-commerce platforms can leverage emerging technologies such as AI and ML to improve the customer experience and expand their reach into emerging markets. Banks can embrace digital transformation and expand their services into underserved populations. The relationship between e-commerce and banking industries will continue to be symbiotic, with each industry relying on the other to succeed. The key to success for both industries will be to embrace innovation and collaboration, and to stay ahead of the curve in an ever-changing global economy.

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## CHAPTER 7

# IMPACT OF E-COMMERCE ON RETAIL INDUSTRY: A COMPARATIVE ANALYSIS OF BRICK-AND-MORTAR AND ONLINE RETAILERS

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### **ABSTRACT:**

The rise of e-commerce has had a profound impact on the retail industry, with traditional brick-and-mortar retailers facing increasing competition from online retailers. This paper provides a comparative analysis of the e-commerce and retail industries, focusing on the key drivers of growth and the challenges faced by both sectors. The paper also explores the impact of e-commerce on consumer behavior, including the shift towards online shopping and the increasing importance of customer experience in the retail industry. In addition, the paper examines the strategies that retailers are using to adapt to the changing landscape, including the integration of online and offline channels, the use of data analytics and artificial intelligence, and the adoption of innovative technologies such as augmented reality and virtual reality.

### **KEYWORDS:**

Brick Mortar, Consumer Behavior, E-Commerce, Retail Industry, Online Retailers.

### **INTRODUCTION**

E-commerce and retail are two of the largest industries in the world, with the former being a subset of the latter. The retail industry encompasses all businesses involved in the sale of physical goods to consumers, while e-commerce refers to the buying and selling of goods and services over the internet.

In recent years, the growth of e-commerce has led to significant changes in the retail industry, and traditional retailers have had to adapt to remain competitive. In this paper, we will explore the e-commerce and retail industries in detail, including their history, current state, trends, challenges, and future prospects.

### **History of E-commerce:**

The history of e-commerce dates back to the 1960s when the first computer networks were developed. However, it was not until the 1990s that e-commerce began to take off, thanks to the invention of the World Wide Web.

The first e-commerce transaction took place in 1994 when a man named Dan Kohn sold a Sting CD to a friend over the internet. Since then, e-commerce has grown at an unprecedented rate, with global e-commerce sales reaching \$4.28 trillion in 2020[1].

**History of Retail:**

The history of retail dates back to ancient civilizations when people would barter or exchange goods in marketplaces. Over time, retail evolved into a more organized industry, with the development of department stores, supermarkets, and other types of retail outlets. In the 20th century, the retail industry underwent significant changes due to technological advancements, such as the invention of the cash register and barcode scanner. Today, the retail industry is a global phenomenon, with retail sales totaling \$25.04 trillion in 2020.

**Current State of E-commerce:**

E-commerce has grown rapidly over the past few years, thanks to the increasing availability of the internet and smartphones. In 2020, global e-commerce sales reached \$4.28 trillion, up from \$1.33 trillion in 2014. The COVID-19 pandemic further accelerated the growth of e-commerce, as consumers turned to online shopping to avoid crowded stores. According to a survey conducted by Digital Commerce 360, e-commerce sales in the US grew by 32.4% in 2020, compared to 2019.

**Current State of Retail:**

The retail industry has also undergone significant changes in recent years. The rise of e-commerce has forced traditional retailers to adapt to new consumer demands, such as offering an omni channel shopping experience that seamlessly integrates online and offline channels. Despite the growth of e-commerce, traditional retail still accounts for the majority of sales, with online sales representing only 14.1% of total retail sales in the US in 2020. The COVID-19 pandemic has had a significant impact on the retail industry, with many brick-and-mortar stores forced to close temporarily or permanently due to lockdowns and social distancing measures[2].

**Trends in E-commerce:**

The e-commerce industry is constantly evolving, with new trends and technologies emerging all the time. Some of the current trends in e-commerce include:

1. **Mobile commerce:** With the increasing use of smartphones, mobile commerce has become a significant trend in e-commerce. According to a report by Statista, mobile e-commerce sales in the US are projected to reach \$432.6 billion by 2022.
2. **Social commerce:** Social media platforms, such as Facebook and Instagram, are increasingly becoming important channels for e-commerce. According to a report by eMarketer, social commerce sales in the US are expected to reach \$36.09 billion by 2022.
3. **Artificial intelligence:** Artificial intelligence (AI) is being used in e-commerce to personalize the shopping experience, improve search algorithms, and optimize pricing.
4. **Augmented reality:** Augmented reality (AR) is being used by some e-commerce companies to enhance the shopping experience for customers. For example, customers can use AR to see how furniture or clothing would look in their home or on their body before making a purchase.
5. **Subscription services:** Subscription services, such as Amazon Prime, have become increasingly popular in recent years. These services offer customers perks such as free shipping, exclusive discounts, and access to streaming services.

### Trends in Retail:

The retail industry is also experiencing significant trends and changes. Some of the current trends in retail include:

1. **Omnichannel retailing:** As mentioned earlier, omnichannel retailing is becoming increasingly important, as customers expect a seamless shopping experience across all channels.
2. **Personalization:** Personalization is becoming a key trend in retail, as retailers use data and AI to personalize the shopping experience for customers.
3. **Sustainability:** Many consumers are becoming more environmentally conscious, and retailers are responding by offering sustainable products and reducing their carbon footprint.
4. **Automation:** Automation is being used in retail to improve the efficiency of processes, such as inventory management and checkout.
5. **Contactless payments:** With the COVID-19 pandemic, contactless payments have become increasingly popular, as customers look for ways to reduce physical contact while shopping[3], [4].

### Challenges in E-commerce:

While e-commerce offers many benefits to consumers and businesses, it also presents several challenges. Some of the key challenges in e-commerce include:

1. **Security:** E-commerce transactions involve the exchange of sensitive personal and financial information, making security a critical concern. Cybercriminals are always looking for ways to steal this information, and businesses must implement robust security measures to protect their customers' data.
2. **Logistics:** E-commerce involves the shipping and delivery of physical goods, which can be challenging and costly. Businesses must ensure that they have efficient logistics systems in place to meet customer expectations.
3. **Competition:** The growth of e-commerce has led to increased competition, making it difficult for businesses to stand out and attract customers.
4. **Customer Experience:** E-commerce customers expect a seamless and personalized shopping experience. Businesses must invest in technologies and processes that improve the customer experience, such as AI and chatbots.
5. **Returns:** E-commerce returns can be costly for businesses, and managing them efficiently is essential to maintaining profitability.

### Challenges in Retail:

The retail industry also faces several challenges, including:

1. **Changing Consumer Behavior:** Consumers' shopping habits are constantly evolving, and retailers must adapt to keep up with these changes.



2. **Competition from E-commerce:** E-commerce has disrupted the retail industry, and traditional retailers must compete with online retailers to remain relevant.
3. **Real Estate Costs:** Retailers must pay for prime real estate locations, which can be costly and impact profitability.
4. **Supply Chain Disruptions:** Disruptions to the supply chain, such as natural disasters or global pandemics, can have a significant impact on retailers' ability to meet customer demand.
5. **Labor Costs:** Retailers must pay wages and benefits to their employees, which can be a significant cost and impact profitability.

### **Future of E-commerce and Retail:**

The future of e-commerce and retail is likely to be shaped by new technologies and changing consumer behavior. Some of the key trends that are likely to shape the future of these industries include:

1. **Increased use of AI:** AI is likely to play an increasingly important role in e-commerce and retail, as businesses use it to personalize the shopping experience, optimize pricing, and improve supply chain efficiency.
2. **Expansion of Mobile Commerce:** Mobile commerce is expected to continue to grow, as consumers increasingly use their smartphones to shop online.
3. **Growth of Social Commerce:** Social media platforms are likely to become even more important in the world of e-commerce, as businesses use them to connect with customers and drive sales.
4. **Continued focus on Sustainability:** Consumers are becoming increasingly environmentally conscious,

## **DISCUSSION**

The world of retail has seen significant changes in recent years, with the rise of e-commerce transforming the way people shop. E-commerce, which involves the buying and selling of goods and services online, has been growing rapidly in popularity and is projected to continue to do so in the coming years. In this discussion, we will examine the e-commerce and retail industry, the key players, trends, challenges, and opportunities. The e-commerce and retail industry refers to the buying and selling of goods and services through digital channels, such as websites, mobile apps, social media platforms, and marketplaces. The industry has seen tremendous growth in recent years, driven by technological advancements, changing consumer behavior, and increasing internet penetration. According to eMarketer, global e-commerce sales reached \$4.28 trillion in 2020, up from \$3.53 trillion in 2019. The COVID-19 pandemic also accelerated the growth of e-commerce as people were forced to shop online due to store closures and social distancing measures.

The retail industry, on the other hand, refers to the physical selling of goods and services through brick-and-mortar stores, supermarkets, and malls. Retail is still a significant contributor to the economy, with global retail sales projected to reach \$28 trillion in 2022, according to eMarketer. Amazon is the largest e-commerce company globally, with a market capitalization of over \$1.5

trillion. The company started as an online bookseller but has since expanded into other product categories, including electronics, fashion, and groceries. Alibaba is a Chinese e-commerce company that operates multiple online marketplaces, including Taobao, Tmall, and AliExpress. The company has a market capitalization of over \$500 billion.

Walmart is the largest retailer in the world, with over 11,000 stores in 27 countries. The company also has a strong e-commerce presence, with its online sales growing by 74% in 2020. JD.com is a Chinese e-commerce company that operates its own logistics network and focuses on selling high-quality goods. The company has a market capitalization of over \$100 billion. Target is a US-based retailer that operates over 1,800 stores in the US. The company has been investing heavily in its e-commerce capabilities and saw its online sales grow by 145% in 2020.

Mobile commerce, or m-commerce, is on the rise, with more people using their smartphones to make purchases. According to eMarketer, mobile commerce sales accounted for 72.9% of all e-commerce sales in 2020, up from 58.9% in 2017. Social media platforms, such as Facebook, Instagram, and Pinterest, are increasingly becoming shopping destinations. Social commerce is projected to reach \$604.5 billion in global sales by 2027, according to Research And Markets. Personalization is becoming a key driver of customer loyalty and sales. Retailers are using data and technology to personalize the shopping experience, from product recommendations to targeted marketing. Consumers are becoming more conscious of the impact their purchases have on the environment. Retailers are responding by implementing sustainable practices, such as reducing waste, using eco-friendly materials, and offering green products.

E-commerce and retail Delivery and logistics are critical components of e-commerce and retail, and they pose significant challenges. Retailers must ensure that products are delivered on time and in good condition, while also keeping delivery costs low. The e-commerce and retail industry is highly competitive, and retailers must constantly innovate to stay ahead of the competition. Small retailers may find it challenging to compete with large e-commerce platforms, which have significant resources and customer bases. Consumer behavior is constantly evolving, and retailers must adapt to these changes to remain relevant. For example, the COVID-19 pandemic has led to a shift in consumer behavior, with more people shopping online and avoiding physical stores.

E-commerce and retail present significant opportunities for global expansion. Retailers can use e-commerce to reach customers in different countries, and they can also use data and technology to tailor their offerings to specific markets. Emerging technologies, such as augmented reality, virtual reality, and artificial intelligence, are transforming the e-commerce and retail industry. These technologies can be used to create immersive shopping experiences, personalize the shopping journey, and streamline operations. Subscription services, such as meal kits, beauty boxes, and pet supplies, are becoming increasingly popular. Retailers can use subscription services to create recurring revenue streams and build customer loyalty. Omnichannel retailing, which involves integrating online and offline channels, is becoming essential for retailers. By providing a seamless shopping experience across channels, retailers can increase customer satisfaction and drive sales[5].

The world of business has undergone significant changes over the past decade with the growth of e-commerce. Electronic commerce, or e-commerce, refers to buying and selling goods and services over the internet. The retail industry is one of the most affected industries by e-commerce. Online shopping has changed the way we shop, and it has created new opportunities

for businesses. In this discussion, we will examine the impact of e-commerce on the retail industry. E-commerce has revolutionized the way we buy and sell products. With the rise of the internet, businesses can now reach customers all over the world, breaking down geographical barriers. Retailers can now sell their products through online marketplaces, social media, and their websites. Customers can purchase products from the comfort of their homes and have them delivered right to their doorstep.

The retail industry has been significantly impacted by e-commerce. Online shopping has become more popular, and traditional brick-and-mortar retailers are feeling the pressure. E-commerce is growing at a faster rate than traditional retail, and it is expected to continue to do so in the future. E-commerce has allowed retailers to increase their sales by reaching a broader audience. Online stores can sell to customers all over the world, breaking down geographical barriers. Online shopping is convenient for customers. They can shop from the comfort of their homes, and the products are delivered right to their doorstep. Online stores do not have the same overheads as traditional brick-and-mortar stores. They do not have to pay rent, utilities, or staff, which means they can sell products at a lower price. E-commerce allows retailers to collect data on their customers. They can analyze the data to gain insights into customer behavior, Preferences, and trends. E-commerce has led to reduced foot traffic in traditional retail stores. Customers are more likely to shop online than in-store. Traditional retailers have had to close their stores due to reduced foot traffic, which has led to job losses. E-commerce has led to increased competition in the retail industry. Traditional retailers are now competing with online stores, which can sell products at a lower price. Online shopping lacks the personalization of traditional retail. Customers cannot touch, feel, or try on the products before they buy them[6].

The future of e-commerce and the retail industry is bright. E-commerce is expected to continue to grow, and it is estimated that by 2040, 95% of all purchases will be made online. The retail industry will have to adapt to these changes to remain competitive. Here are some of the trends we can expect to see in the future of e-commerce and the retail industry. Retailers will have to adopt an Omni channel approach to remain competitive. This means offering customers a seamless shopping experience across all channels, including online and in-store. Mobile commerce, or m-commerce, is expected to grow in the future. Retailers will have to optimize their websites for mobile devices to cater to the increasing number of customers who shop on their smartphones. Retailers will use artificial intelligence and machine learning to gain insights into customer behavior, preferences, and trends. This will allow them to offer personalized shopping experiences to their customers.

E-commerce has allowed retailers to increase their sales by reaching a broader audience. Online stores can sell to customers all over the world, breaking down geographical barriers. This has opened up new markets for retailers and has increased their customer base. With the rise of e-commerce, retailers can now sell their products to customers who are not in their local area or even in their country. This has led to increased revenue for retailers[7]. Online shopping is convenient for customers. They can shop from the comfort of their homes, and the products are delivered right to their doorstep. This is especially convenient for customers who live in rural areas or who do not have easy access to physical stores. E-commerce has made it possible for customers to purchase products at any time of the day, 365 days a year, without having to worry about store opening and closing times [7].

Online stores do not have the same overheads as traditional brick-and-mortar stores. They do not have to pay rent, utilities, or staff, which means they can sell products at a lower price. This has made it possible for e-commerce retailers to offer products at a lower price than traditional retailers. As a result, customers can save money on their purchases, which has increased their loyalty to online retailers. E-commerce allows retailers to collect data on their customers. They can analyze the data to gain insights into customer behavior, preferences, and trends. This has made it possible for retailers to offer personalized shopping experiences to their customers. For example, retailers can use data to offer product recommendations based on a customer's past purchases. This has increased customer loyalty to e-commerce retailers. E-commerce has led to reduced foot traffic in traditional retail stores. Customers are more likely to shop online than in-store. This has resulted in a decline in sales for traditional retailers. Retailers who have not adapted to the rise of e-commerce have been hit the hardest. Traditional retailers who have not established an online presence have struggled to compete with e-commerce retailers.

Traditional retailers have had to close their stores due to reduced foot traffic, which has led to job losses. Retailers who have not adapted to the rise of e-commerce have had to close their doors, resulting in job losses. For example, department stores that have not established an online presence have had to close their doors, resulting in job losses. E-commerce has led to increased competition in the retail industry. Traditional retailers are now competing with online stores, which can sell products at a lower price. This has put pressure on traditional retailers to lower their prices, which has reduced their profit margins. Retailers who have not adapted to the rise of e-commerce have been hit the hardest.

Online shopping lacks the personalization of traditional retail. Customers cannot touch, feel, or try on the products before they buy them. This has led to an increase in returns for e-commerce retailers. Customers who are not satisfied with their purchase are more likely to return the product. As a result, e-commerce retailers have had to develop new strategies to reduce the number of returns. The future of e-commerce and the retail industry is bright. E-commerce is expected to continue to grow, and it is estimated that by 2040, 95% of all purchases will be made online. The retail industry will have to adapt to these changes to remain competitive. Here are some of the trends we can expect to see in the future of e-commerce and the retail industry[8].

## CONCLUSION

The e-commerce and retail industry is a dynamic and rapidly evolving sector. While e-commerce is growing in popularity, traditional retail is still significant, and both sectors face unique challenges and opportunities. Retailers must adapt to changing consumer behavior, innovate to stay ahead of the competition, and embrace emerging technologies to remain relevant. Overall, the e-commerce and retail industry present significant opportunities for growth, and retailers that can navigate the challenges and capitalize on these opportunities are well-positioned for success.

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## CHAPTER 8

# EXPLORING THE IMPACT OF ELECTRONIC COMMERCE ON ONLINE PUBLISHING: A STUDY OF CONSUMER BEHAVIOR AND INDUSTRY TRENDS

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### **ABSTRACT:**

The emergence of electronic commerce (e-commerce) has transformed the publishing industry, especially with the advent of online publishing. The purpose of this study is to examine the impact of e-commerce on online publishing, specifically in terms of consumer behavior and industry trends. Through a review of literature, it was found that e-commerce has significantly influenced consumer behavior, with more individuals opting to purchase online publications rather than physical copies. This shift has led to changes in the publishing industry, with publishers needing to adapt to new business models and distribution methods.

### **KEYWORDS:**

Business Models, Distribution Methods, Electronic Commerce, Industry Trends, Online Publishing.

## INTRODUCTION

Electronic commerce (e-commerce) and online publishing are two interrelated areas of the digital economy that have transformed the way businesses operate and people consume information. E-commerce refers to the buying and selling of goods and services over the internet, while online publishing is the dissemination of content, such as news, papers, books, and journals, through digital channels. In this paper, we will explore the history, evolution, and impact of e-commerce and online publishing, as well as their current and future trends.

### **History and Evolution of E-commerce**

The concept of e-commerce can be traced back to the 1960s when businesses started using electronic data interchange (EDI) to exchange business documents, such as purchase orders and invoices, between computers. However, it was not until the 1990s that e-commerce gained widespread popularity with the advent of the World Wide Web (WWW) and the emergence of popular online marketplaces such as eBay and Amazon. During the dot-com boom of the late 1990s, e-commerce experienced unprecedented growth, and many internet-based startups emerged, fueled by venture capital funding.

The early days of e-commerce were characterized by rudimentary online storefronts and limited payment options. However, as the technology improved, e-commerce platforms became more sophisticated, and new payment systems, such as PayPal and Apple Pay, emerged, and making

online transactions faster, easier, and more secure. Today, e-commerce is a multibillion-dollar industry that encompasses a wide range of activities, including online retail, online auctions, online travel, online banking, and online marketplaces.

### **Impact of E-commerce**

E-commerce has had a significant impact on the business landscape, revolutionizing the way companies operate and interact with customers. For businesses, e-commerce has made it easier to reach a global audience, reduce operating costs, and streamline supply chain operations. Online retailers, such as Amazon and Alibaba, have disrupted traditional brick-and-mortar retail, forcing companies to adopt a digital-first approach to remain competitive. For consumers, e-commerce has transformed the shopping experience, making it more convenient, personalized, and accessible. Online marketplaces offer a wide selection of products at competitive prices, and shoppers can compare prices and reviews across multiple vendors with just a few clicks. E-commerce has also enabled the rise of the sharing economy, with companies such as Uber and Airbnb providing on-demand services that leverage digital platforms to connect consumers with service providers[1], [2]. However, e-commerce has also raised concerns over issues such as data privacy, cybersecurity, and the impact of digital disruption on jobs and the economy. The increasing dominance of large online platforms has raised antitrust concerns, and governments are grappling with how to regulate the digital economy effectively.

### **Current and Future Trends in E-commerce**

E-commerce is an ever-evolving industry, with new technologies and trends emerging all the time. Some of the current and future trends in e-commerce include:

1. **Mobile Commerce:** With the widespread adoption of smartphones and mobile devices, mobile commerce (m-commerce) is becoming increasingly important. E-commerce platforms are optimizing their sites for mobile devices and developing mobile apps to make it easier for consumers to shop on the go.
2. **Augmented Reality:** Augmented reality (AR) technology allows shoppers to visualize products in real-time, enhancing the shopping experience and reducing the risk of returns. AR technology is already being used by some e-commerce platforms, such as Wayfair, to enable customers to visualize furniture in their homes before making a purchase.
3. **Voice Commerce:** Voice assistants, such as Amazon's Alexa and Apple's Siri, are increasingly being used to make purchases online. As voice recognition technology improves, voice commerce is expected to become a significant driver of e-commerce growth.
4. **Artificial Intelligence:** Artificial intelligence (AI) is being used by e-commerce platforms to personalize the shopping experience, optimize pricing and inventory

## **DISCUSSION**

Electronic commerce (e-commerce) and online publishing are two rapidly growing areas of the digital economy that have transformed the way businesses operate and how information is disseminated. In this discussion, we will explore the key features of these two areas and how they have impacted the modern business landscape. Electronic commerce, commonly known as e-commerce, is the buying and selling of goods and services over the internet. This includes

online shopping, online banking, and online auctions. E-commerce has transformed the way businesses operate, allowing them to reach customers beyond their geographic location and sell products and services 24/7[3].

One of the main advantages of e-commerce is that it offers a more convenient and efficient way for customers to shop. With e-commerce, customers can easily browse products, compare prices, and make purchases from the comfort of their homes. This has led to a significant increase in online sales over the years, with e-commerce sales expected to reach over \$4.9 trillion by 2021. Online publishing refers to the distribution of information or content via the internet. This includes news websites, blogs, social media platforms, and digital magazines. Online publishing has transformed the traditional publishing industry, allowing publishers to reach a wider audience and distribute content more efficiently.

One of the key advantages of online publishing is that it offers publishers the ability to reach a global audience. Unlike traditional publishing, which is limited by geographic boundaries, online publishing can reach readers anywhere in the world. Additionally, online publishing allows publishers to distribute content faster and at a lower cost than traditional publishing. E-commerce and online publishing are closely related, as online publishing plays a crucial role in the success of e-commerce.

Content marketing, for example, is a popular online publishing strategy used by businesses to attract and engage customers. By creating high-quality content, such as blog posts, infographics, and videos, businesses can establish themselves as experts in their field and attract more customers to their website[4].

Additionally, online publishing can also help businesses build trust with their customers. Reviews and testimonials, for example, can be published on a business's website or on third-party review sites, helping to establish credibility and build trust with potential customers. E-commerce and online publishing have transformed the way businesses operate and how information is disseminated. These two areas are closely related and have a significant impact on the modern business landscape. As the digital economy continues to grow, e-commerce and online publishing will play an increasingly important role in how businesses connect with customers and distribute content.

E-commerce refers to the process of buying and selling goods and services online. It has emerged as a game-changer for businesses around the world, making it possible for them to reach customers beyond their geographical boundaries. E-commerce has been growing at a rapid pace over the last decade, with online sales expected to reach over \$4.9 trillion by 2021. One of the main advantages of e-commerce is the convenience it offers to customers. With e-commerce, customers can easily browse products, compare prices, and make purchases from the comfort of their homes. E-commerce has also eliminated the need for customers to physically visit stores, which saves time and reduces the cost of transportation.

Another advantage of e-commerce is that it operates 24/7, providing businesses with an opportunity to generate sales even when physical stores are closed. This has also led to a significant increase in the number of businesses adopting e-commerce as a sales channel. E-commerce also offers businesses the ability to gather and analyze data related to customer behavior and preferences. This data can be used to optimize the shopping experience and tailor marketing efforts to specific customer segments[5].



Online publishing refers to the distribution of information or content via the internet. This includes news websites, blogs, social media platforms, and digital magazines. Online publishing has transformed the traditional publishing industry, making it possible for publishers to reach a wider audience and distribute content more efficiently. One of the key advantages of online publishing is that it offers publishers the ability to reach a global audience. Unlike traditional publishing, which is limited by geographical boundaries, online publishing can reach readers anywhere in the world. This has enabled publishers to distribute content faster and at a lower cost than traditional publishing.

Another advantage of online publishing is that it offers publishers the ability to interact with their audience in real-time. Social media platforms, for example, enable publishers to engage with readers and build relationships with them. This helps to increase reader engagement and loyalty. Online publishing also offers publishers the ability to measure the performance of their content in real-time. This includes metrics such as page views, engagement, and social shares. This data can be used to optimize content and improve the overall performance of a publisher's website.

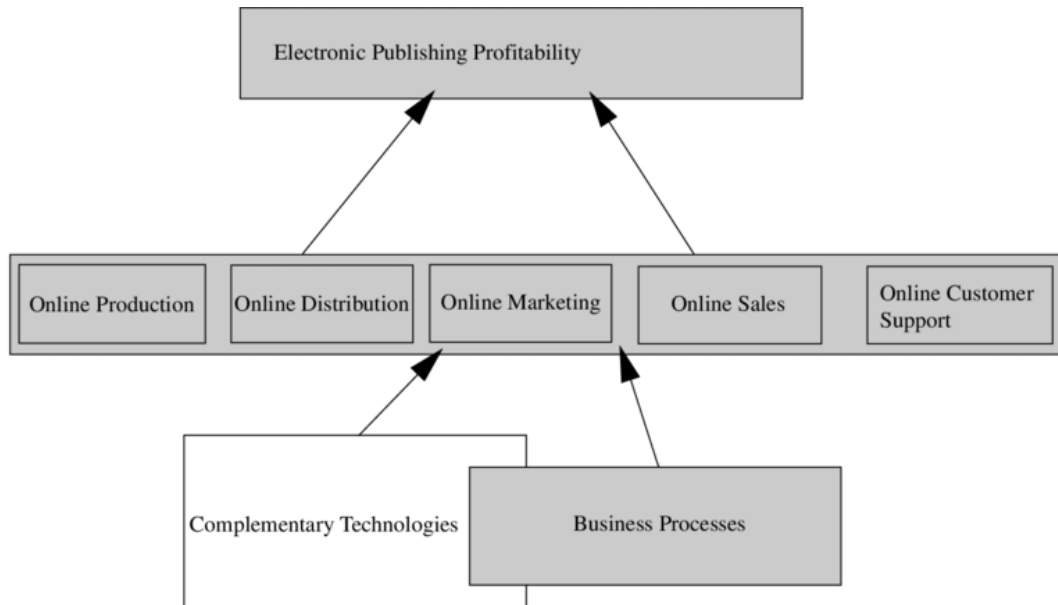
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E-commerce and online publishing can also be used together to create a seamless customer experience. Product descriptions and reviews, for example, can be published alongside product listings, providing customers with all the information they need to make an informed purchase decision. Despite the numerous advantages of e-commerce and online publishing, there are also some challenges that need to be addressed. One of the main challenges of e-commerce is the issue of security. Cyber-attacks and fraud are common in e-commerce, and businesses need to take steps to protect their customers' data.

Another challenge of e-commerce is the issue of logistics. Businesses need to ensure that their products are delivered to customers in a timely and efficient manner. This requires investment in logistics infrastructure and processes. In online publishing, one of the main challenges is the issue of monetization. While online publishing offers a wide reach and lower distribution costs, it can be difficult for publishers to monetize their content effectively. Ad revenue is one common revenue stream for online publishers, but with ad-blocking software becoming increasingly common, publishers are exploring alternative revenue streams, such as subscription models and sponsored content. Another challenge of online publishing is the issue of content quality. With the ease of publishing content online, the internet is flooded with low-quality content, which can damage the reputation of reputable publishers. This has led to a growing emphasis on quality content and the need for publishers to invest in producing high-quality content that engages readers and adds value to their lives. Figure 1 illustrate the Business value complementarity model of electronic publishing.

Electronic Commerce (E-commerce) and online Publishing are two interconnected aspects of the digital era. E-commerce is the buying and selling of goods and services over the internet, while

online publishing refers to the publication of written or visual content on the internet. E-commerce has revolutionized the way businesses operate, providing convenience to customers, increasing sales, and creating new revenue streams. Online publishing has provided a platform for content creators to share their work with a global audience, eliminating geographical barriers, and changing the way information is consumed. This paper will discuss the various aspects of E-commerce and Online Publishing, their impact on the business and publishing industries, the benefits and challenges they pose, and future possibilities.



**Figure 1: Illustrate the Business value complementarity model of electronic publishing.**

E-commerce has transformed the way businesses operate. In the past, businesses were limited to their physical location and customers within their vicinity. However, the internet has provided businesses with a global reach, enabling them to sell their products and services to customers worldwide. The ease of access and convenience of E-commerce has resulted in a significant increase in online sales. According to Statista, global E-commerce sales amounted to \$4.28 trillion in 2020, and it is expected to reach \$6.39 trillion by 2024[7]. One of the primary benefits of E-commerce is the convenience it provides to customers. Customers can purchase products or services from the comfort of their homes, without the need to physically visit a store. This convenience has led to an increase in online sales, as customers can purchase products anytime, anywhere. E-commerce has also enabled businesses to operate 24/7, providing customers with the ability to purchase products or services at any time, day or night.

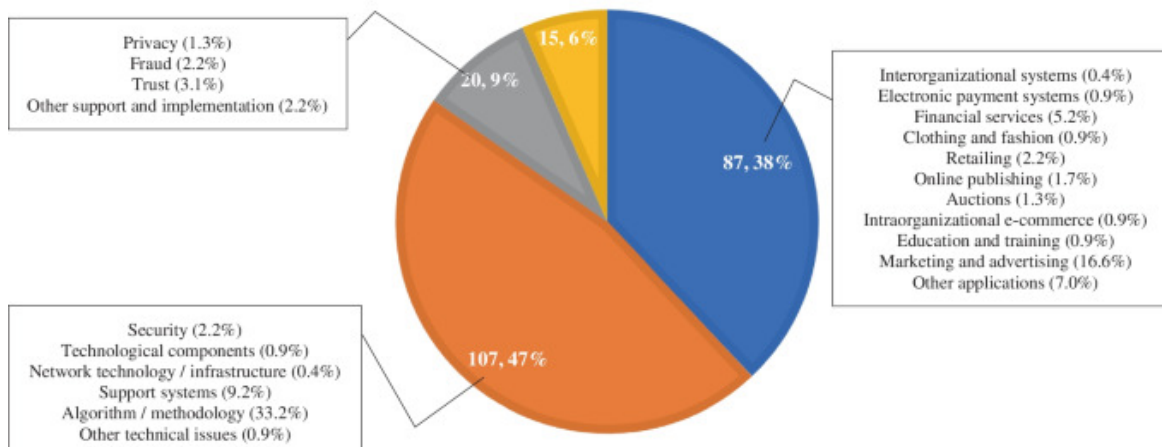
Another benefit of E-commerce is the ability to target a global audience. With the internet, businesses can sell their products or services to customers worldwide. This has created new revenue streams for businesses and has enabled them to expand their customer base beyond their physical location. E-commerce has also enabled businesses to reach niche markets, as they can target customers based on their interests or location.

However, E-commerce also poses some challenges. One of the primary challenges is the security of online transactions. As customers provide personal and financial information during online

transactions, there is a risk of this information being intercepted by hackers. This can result in the loss of sensitive information, financial loss, and damage to the reputation of the business.

Another challenge is the need for businesses to constantly adapt to changing technologies and consumer behavior. As technology evolves, businesses need to keep up with the latest trends to remain competitive. They need to constantly improve their online presence, optimize their websites for mobile devices, and provide a seamless online shopping experience to customers.

Online publishing has transformed the publishing industry, enabling content creators to share their work with a global audience. With the internet, writers, journalists, and other content creators can publish their work online, eliminating geographical barriers and reaching a broader audience. This has created new opportunities for content creators and has changed the way information is consumed. Figure 1 illustrate the Artificial Intelligence in E-commerce.



**Figure 1: Illustrate the Artificial Intelligence in E-commerce.**

One of the primary benefits of online publishing is the ability to reach a global audience. With the internet, content creators can share their work with people worldwide, providing them with a platform to express their thoughts and ideas. Online publishing has also provided a platform for new and emerging writers, enabling them to showcase their work and gain exposure. Another benefit of online publishing is the ability to publish content instantly. With the internet, content can be published within seconds, enabling writers to share breaking news or current events with their audience as soon as it happens. This has changed the way news is consumed, as people can access news from around the world within seconds of it happening[8], [9].

## CONCLUSION

E-commerce and online publishing have transformed the way businesses operate and interact with customers. The benefits of e-commerce and online publishing are clear, but they also come with their own set of challenges that need to be addressed. As technology continues to evolve, it is important for businesses to stay up-to-date with the latest trends and developments in e-commerce and online publishing to remain competitive in the digital marketplace.

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## CHAPTER 9

### ENTREPRENEURSHIP AND INNOVATION IN E-BUSINESS

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#### **ABSTRACT:**

This makes the case that innovation and entrepreneurship work best together to ensure the long-term viability of e-commerce and e-businesses. Innovation and entrepreneurship have a beneficial relationship and work together to support the success of an organization. The explores the connections between entrepreneurship and innovation and examines the elements that encourage interaction between the two using an integrative approach. A thorough literature analysis on entrepreneurship and innovation was supplemented with case studies of innovative and entrepreneurial dot-com businesses. Understanding the ideas and practices of entrepreneurship and innovation in organizations is improved by this empirical research.

#### **KEYWORDS:**

Business, Corporate, Entrepreneurship, E-Commerce, Organization.

#### **INTRODUCTION**

The rapid expansion and commercial successes of eBay, Amazon.com, Travel.com, Priceline.com, and other dot-com companies, as well as the worldwide bankruptcies of many of these companies in 2000, have had significant management ramifications for IT innovation and entrepreneurial organizations around the world. Emerging disciplines like e-entrepreneurship and e-innovation may help businesses adapt proactively to changes in the e-business environment. The dot-com bust offered e-business managers and entrepreneur's new possibilities to rethink and reconfigure their company strategy as well as new problems. According to this author, innovation and entrepreneurship work together to make e-commerce and e-businesses sustainable in the long run. An integrated approach to e-entrepreneurship and e-innovation will help firms achieve a competitive edge and hold the key to success in the e-business world in this rapidly shifting competitive landscape.

This study looks at how innovation and entrepreneurship interact and what roles they play in organizational growth generally and dot-com businesses specifically. There is barely any English-language literature exploring dot-com experiences from a viewpoint of entrepreneurship and innovation, according to an examination of recent literature regarding e-business as well as entrepreneurship and innovation. The method, organization, and strategy of either entrepreneurship or innovation have been the subject of certain studies; the conceptual connection between the two has also been mentioned. Unfortunately, there aren't many empirical studies that look at how the two work together[1].

So, the objectives of this research are to: construct an integrative framework for creating entrepreneurial and creative organizations; and contribute to knowledge of the complementary nature of entrepreneurship and innovation via an empirical study of dot-com enterprises. Using comprehensive procedures, data for this qualitative research were gathered from three sources. Initially, a survey of the key works on entrepreneurship and innovation was conducted to compile the ideas already in existence concerning the two and investigate the conceptual connections between them. Second, semi-structured interviews were done to investigate senior managers in e-business' attitudes of entrepreneurship and innovation as well as the elements that foster their growth and integration. Between April and August 2004, 11 top managers working in Australian e-businesses were spoken with. These interviews centered on the management of dot-coms and e-businesses, their successes and failures, and the lessons that might be drawn from their journeys. This summarizes several interview results that are important to the study's principal subject. Finally, to examine organizational practice and behavior as well as the relationship between business practice entrepreneurship and innovation in dot-com sectors, case studies of five dot-com businesses were conducted. Two of the case studies depend on semi-structured interviews with their top management, while the other three rely on documentary research. The businesses chosen for the case studies and interviews represent a variety of business sectors, operate in various countries and cultures, and have a variety of histories, sizes, and lengths of existence. Nevertheless, they serve to illustrate the main focus of the interaction between entrepreneurship and innovation in e-business.

### **Entrepreneurship**

The process of turning ideas into goods or services and then creating a business to sell those items is known as entrepreneurship. The focus of entrepreneurship research has recently shifted away from small businesses in general and onto the idea of entrepreneurship. The mirrors this tendency by placing more focus on the idea of entrepreneurship than the characteristics or psychology of small company owners[2]. Organizational behavior is represented by entrepreneurship. Risk-taking, initiative, and invention are three essential components of entrepreneurship. The three components, according to Slevin and Covin, are not enough to guarantee organizational success. The authors argued that "a successful business not only exhibits entrepreneurial management behavior, but also has the necessary organizational structure and culture to sustain such behavior." Similar thinking is used in this, which views entrepreneurship as organizational behavior connected to change and innovation.

### **Entrepreneurs and proprietors of Small Businesses**

Small company owners vary from entrepreneurs in many ways. According to Garland, Hoy, Boulton, and Garand and Steward, Watson, Garland, and Garland, entrepreneurs were more likely to take risks, have higher achievement motivation, and be more open to innovation and change than small business owners, who were more concerned with securing an income to meet their immediate needs. This argument that entrepreneurship and invention are intimately connected and complimentary gives a similar viewpoint.

### **Intrapreneurship or Corporate Entrepreneurship**

When he used the terms "corporate entrepreneurship" or "intrapreneurship," Drucker made a significant contribution to the theoretical framework of entrepreneurship in huge organizations. No matter the size of the organization, intrapreneurship exists, according to Antoncic and

Hisrich. The establishment of new corporate initiatives, the characteristics of entrepreneurial organizations, and the individual intrapreneur have all been the subjects of intrapreneurship study. Entrepreneurship in this context encompasses intrapreneurship and corporate entrepreneurship[3].

### **Innovation**

Research and development has been tightly linked to technical progress for more than 50 years. The most limited definition of innovation is invention. According to Drucker, there are seven fundamental sources of chances for innovation. Neither one of them has anything to do with innovation. Innovation is thus more than invention and need not be technical. The instances of social and economic breakthroughs are many. Innovation is the combination of existing information and practices into a suggested theory or design concept that serves as the theoretical underpinning for a novel idea. As a result, innovation is multifaceted and has many different aspects. The three most prevalent innovation dimensions radical vs. incremental; product vs. process; and administrative vs. technological can be articulated as dualisms.

Both drastic and gradual innovation are possible. Radical innovations are ground-breaking, disruptive, revolutionary, unique, pioneering, fundamental, or significant inventions. Little adjustments are known as incremental innovations, and they are done to strengthen and expand the current systems, goods, and services. Radicality is a continuum, therefore this difference does not "necessarily to the more fine-tuned reality." As the name implies, "product innovation" "reflects change in the final good or service provided by the organizations, whereas process innovation shows changes in the manner in which enterprises generate final goods or services." Innovation has been divided into administrative and technical subcategories by some scholars. Administrative innovations include changes that have an impact on policies, resource allocation, and other elements connected to the social structure of the organization. Technological innovation is about "the acceptance of a new concept that directly alters the fundamental output processes." [4] For these purposes, innovation is generally defined to encompass new goods, procedures, and services as well as novel organizational structures, untapped markets, and the creation of new human capital.

## **DISCUSSION**

The Conceptual Relationship between Entrepreneurship and Innovation. In the literature, the conceptual connection between entrepreneurship and innovation has been explored for a long time. Recent years have seen a rise in interest in the economics of innovation in particular. The entrepreneur paradigm, the technology-economics paradigm, and the strategic paradigm are the three conflicting paradigms defined by Sundbo in his summary of the fundamental ideas of the economics of innovation. The origins of the entrepreneur paradigm may be found in the 1930s, when Schumpeter made his first attempts to connect entrepreneurs and innovation in theory and considered the entrepreneur as an inventor. He emphasized that since entrepreneurs create inventions, innovation helps the economy flourish. The entrepreneur paradigm, which emphasizes the importance of the entrepreneur in the innovation process, is based on the idea that entrepreneurs are innovators. This paradigm states that an entrepreneur can only be someone who establishes a new business based on a novel concept.

Entrepreneurship is seen as a creative and innovative endeavor. Creating something from scratch is the goal of entrepreneurship. Based on recognizing and seizing an opportunity, the invention

gives value to both the person and the society. Similar ideas were held by Bygrave and Hofer. They saw entrepreneurship as a transformation, a dynamic process, and a singular occurrence. Legge and Hindle held the opinion that entrepreneurs are those who drive teams and organizations to adopt innovations. Entrepreneurs look for possibilities, and inventions provide them the means to do so. A new concept, new goods, a new organizational structure, a new method of production, or the creation of a new organization by an already existing organization are all examples of corporate entrepreneurship. "Innovation involves three fundamental components: the infrastructure, the cash, and the entrepreneurial talent required to make the first two work," Herbig et al. have noted. Innovation is a special tool used by entrepreneurs to take advantage of change as a chance for a new product or service. The areas of entrepreneurship and innovation are highly overlapping. If innovation is to be successful commercially, it must also answer market requirements and include entrepreneurship[5].

### **Case Studies on the Relationships between Innovation and Entrepreneurship**

The 11 interviews and five case studies that were done for the research are summarized in this part. The goal of the interviews with top managers from dot-com enterprises in Australia was to learn more about their management styles and perspectives on the importance of innovation and entrepreneurship in operating an online company. The vast majority of the managers we spoke with believed that innovation and entrepreneurship are inextricably linked and mutually beneficial. For instance, the CEO of Destra, a well-known dot-com business with headquarters in Australia, considers entrepreneurship to be the act of "making something out of nothing" and to be a mentality in which "everything is conceivable and the only restrictions are those we establish ourselves." "Doing something that hasn't been done before or doing something differently," according to him, is what innovation is. Destramusic.com, run by his firm, was Australia's first digital music service when it launched between 1997 and 1998, years before any of its contemporary rivals.

Young Melbourne-based dot-com SpeakerDirect offers an internet speaker gateway. The fact that the founders of the online speaker portal believed that speed to market was one of the crucial components of their strategy and a feature of the e-market is demonstrated by the fact that the business idea for the portal was developed in December 2003 and the portal was formally launched in March 2004. With the idea that the business needed a user-friendly and comprehensive tool for both speakers and speaker-seekers, the website system was created from the ground up. SpeakerDirect serves as both a business resource and a marketing tool. SpeakerDirect.com.au offers a free service for businesses to look for and choose corporate speakers, but unlike its rivals, the business does not charge engagement fees. The company's lofty goals include connecting the whole business community and becoming the top worldwide speaker portal within five years.

Entrepreneurship and innovation are risky, according to the founders and directors of the firm who were interviewed for the study: In the face of difficulty, entrepreneurship is taking charge of and moving forward with a notion or a desire. Innovation is what makes it possible in the practical sense. For instance, even if everyone says it cannot be done, I am upset at it, or that it is too dangerous, I am going to take action and spend time and money to make it happen because I want people to be able to speak with each other across vast distances. A phone is meant to accomplish this. The "big picture" is a blend of both, requiring persistent and passionate individuals to convert an idea into reality by being autonomous and in charge. The company's



business concept, the first of its type, replaces the notion that a customer must deal with several agencies individually by developing a one-solution gateway. It is an example of entrepreneurship and innovation combined. The mechanism that powers the website is another illustration of innovation and entrepreneurship. Both speakers and searchers will find this to be incredibly user-friendly and multi-functional. One of the more inventive aspects is a bulletin board where businesses may post information about an event for which speakers can show an interest in getting involved; this would be a helpful tool for anybody who is pushed for time or wants a speaker right away. Responding to customer and market requirements is another important dimension of entrepreneurship and innovation that the instance firm exhibits. For instance, SpeakerDirect.com.au wants to be seen as a media resource. Many seeking customers think the free service is "too good to be true" since, in the opinion of the director, they have "flipped the agency paradigm on its head."

A prime example of entrepreneurship and innovation in the e-business sector is eBay, a very successful start-up. From its modest beginnings as a trading post for Beanie Babies, eBay has grown to be one of the biggest online marketplaces in the world. It has produced a completely new business environment that is home to more than 150,000 company owners and around 30 million clients globally. The corporation has consistently sought out novel business strategies. For instance, eBay developed a cutting-edge feedback system that allows customers to evaluate each other after a transaction, improving their overall experience and happiness. Also, purchasers may send electronic payments to eBay sellers who cannot afford a merchant credit card account via its PayPal payment processing system. This creates a whole new channel of communication. By 2005, it is predicted that eBay's net sales would reach US\$3 billion as a consequence of these advances.

The dominant Online search engine, Google, is a leader in innovation as well as an entrepreneurial business due to its aggressive expansion strategy. Google has consistently developed its technology in order to raise the caliber and effectiveness of its features and services. It established a Google Labs services and tools area on its website to showcase its innovation and solicit user testing and feedback on the features and tools. Some of their other cutting-edge e-business products include Google Toolbar, Google Groups, and Google Answers. Google is not a normal firm, as the two graduate computer students who founded the company put it bluntly. We have no desire to merge with one. In this regard, Google has consistently adopted a nontraditional approach to company design and focused on creating a better search engine rather than shelling out millions on advertising campaigns. It has improved upon current technology to provide a quick, precise, and user-friendly search service that is accessible from any location at any time. One of the company's guiding principles is "Never settle for the best." In reality, Google uses continual innovation and entrepreneurship to combat the tough competition in the market for search engine providers by developing new services and income streams. For instance, Google recently unveiled a number of new services, including the free Webmail service Gmail and the pricing comparison website Froogle.

The most recent unorthodox move Google made to sell their business to the general public. The floating strategy is novel and "unusual" since Google's management chose to sell its shares through an online auction as opposed to the customary allocation by major banks. According to a report, this method of doing the IPO sought to provide the general people a greater opportunity to purchase Google's stock before the shares started trading, as opposed to letting investment banks pick who should possess the shares. The floating strategy raised worries that the upcoming

float may ignite a second Internet bubble, however. Experts anticipated a market price of up to US\$40 billion for Google. The company's officials were forced to lower the beginning price from US\$108-US\$135 to \$85 and reduce the number of shares sold from 25.7 million to 19.6 million due to a poor stock market and investors' tepid reaction to Google's IPO plan. Following two trading days, the price of Google's stock increased 27%. Suddenly, the valuation of the fledgling dot-com startup exceeded that of Ford Motor Company. Google's share price hit US\$169 on October 22, 2004, or around two months after the IPO, almost doubling the IPO price.

The success of Amazon.com is entirely a result of invention and entrepreneurship. From its inception, the firm has been a leader in the dot-com sector. It was the first company to move a book retail business online, the first to give customers a "one click" program to speed up the purchasing process by storing comprehensive customer information, including credit numbers, and the first to use collaborative-filtering technology to show customers what others with similar purchase histories have purchased. The comparison-shopping service that refers consumers to other stores if Amazon.com does not carry a certain item was created by Amazon.com as the first firm. Due to its pioneering affiliate program, which sent millions of consumers from its partners' websites to Amazon.com, it was also the first in the dot-com business. Without a question, Amazon.com has continuously innovated to lead the way in e-business. These empirical studies on e-entrepreneurship and e-innovation show that the two are essential facilitators and drivers of e-business, and that their combination is essential to the success of e-business.

### **Issues and Challenges Facing Entrepreneurship and Innovation in E-Business**

The highly competitive environment in which modern e-businesses operate makes it almost hard to maintain a competitive edge, since entry barriers for new players and rivals are very low. Imitation and degradation are ongoing threats to innovation. Regarding the advantages of early adopters in the e-business industry, there are several opinions in the literature. Does it pay to be first to market, or should e-commerce enterprises wait for first movers to make an investment before cannibalizing the concept with a cheaper entry cost? was the issue posed by Mellahi and Johnson. In the e-business environment, where there are more technical uncertainties and a greater pace of technological innovation, it is often believed that it is safer and less costly to emulate the first mover. For instance, many new dot-coms hurried to create an e-marketplace and opted for copying over invention as a business model. According to this author, the failure of many imitators in the dot-com business was due to a lack of entrepreneurial and innovative skills. Being innovative and pro-actively responsive to environmental changes by introducing a new product, process, service, or implementing a unique business model, as did the case companies studied in this, is the essence of innovation and entrepreneurship. It does not mean copying a new idea without taking into account the special needs of local markets[6].

Early on in the development of e-business, it was probably possible to apply most firms in various ways online and offline. The market was characterized by "irrational exuberance," and investors were willing to take on far more risk. The market, however, seems to have returned to conventional concepts and procedures after the dot-com catastrophe. The fundamental structural elements of e-business, such the flow of income, have received more focus. Many businesses today just see e-business as an additional marketing channel. In addition, a large number of senior managers who participated in the study's interviews said there was no distinction between the ideas of entrepreneurship offline and online. Conventional company structures will continue

to exist. New e-businesses need an original concept blended into a good business model that is economically sustainable and that is supported by skilled and experienced individuals if they are to flourish.

As a result, creative and inventive online company ventures that really benefit the client are more likely to succeed. For instance, commerce and banking vary in that one is regarded as an expressive and/or social activity, whilst the other is considered as a job. People demand ease and speed when they bank, but they are more likely to value other characteristics that an online channel may not always be able to supply when they buy for products and services, therefore providing an electronic route to enable the latter is more likely to succeed than the former. Dot-com businesses can make an effort to improve the customer experience in this regard by providing tools on their websites that let users customize their shopping experiences and provide more specialized business services. In conclusion, the challenges confronting modern e-business are that entrepreneurship and innovation must directly address market requirements and establish market trust. Prior to the launch of the firm, credibility should ideally have been established in the market. In order to increase brand recognition, it is also necessary to address the intangibility of an online business.

An Integrated Framework for Creating Innovative and Entrepreneurial Companies. Theoretical and practical research on this topic show that successful e-businesses combine entrepreneurship with innovation, and that this requires organized and systematic behavior. With their strategy, structure, and procedures, organizations may encourage internal entrepreneurship and innovative behavior. As a result, the author suggests an integrated framework for fostering entrepreneurship and innovation to aid businesses, especially dot-coms, in gaining a competitive edge. The "5 S's" of strategy, system, staff, skills, and style are included in the framework. The primary management literature of Bartol, Martin, Tein, and Matthews, Robbins, Bergman, Stagg and Coulter, and Drucker served as the foundation for the creation of this paradigm. Yet, as seen by this, the complexity and dynamic nature of entrepreneurship and innovation implies that the suggested model may only partially address the problems related to these behaviors. In order to encourage entrepreneurship and innovative behavior in organizations, the model should be used as a springboard for establishing successful organizational strategy, structure, and culture[7].

## **Strategy**

An entrepreneurial and creative organization must have a clear, proactive strategy. Such a company requires both internally focused strategies that encourage change and growth within the organization as well as externally focused strategies that actively seek out new business opportunities, acquisitions, mergers, or joint ventures in order to achieve commercial success through innovations. The strategy should be compatible with the organization's future scenario and broad enough to meet a range of technical, financial, and human concerns. The plan should be both entrepreneurial and inventive, and it should include techniques for changing current goods and services into something new that will add value to existing enterprises. This is because entrepreneurship and innovation have strong synergy. Key management and entrepreneurial strategies should focus on meeting and surpassing the changing requirements of consumers as well as placing a strong emphasis on marketing and the creation of new markets. Also, in order to obtain a competitive edge via innovation in the present unstable e-business environment, improving organizational capacity to acquire, generate, collect, and use information should be a key strategy. A successful strategy relies on its implementation, which calls for the right system,

a competent staff team, a broad variety of abilities, and a management approach that encourages creativity and innovation inside the organization.

### **System and Organization**

The case studies in this paper demonstrate that cultural and structural factors are very important in determining the degree of a company's organizational aptitude in entrepreneurship and innovation rather than size, industrial sector, or kind of organization. Because a highly centralised decision-making process restricts information flows and communication with inter-firm partners and also stifles the motivation of e-innovation and e-entrepreneurship, flexible, adaptive, and open organizations are generally more favorable to innovation and entrepreneurship.

Depending on the shifting environmental variables impacting each project or program, the control and management system should be adaptable. In general, heavily regimented organizations do not encourage creativity. Delegation and empowerment are essential, particularly in the early phases of product creation and innovation. To secure a niche market, however, a suitable control system should be kept in place to keep an eye on quality and expenses, to fulfill strict deadlines, and to accomplish predefined goals as the project progresses. It is necessary to strike a good balance between freedom and control.

### **Staff**

The most valuable resource in today's knowledge-based economy is people. To realize the benefits of an innovative and entrepreneurial organization, its employees must be imaginative individuals with a passion for invention and entrepreneurial spirit. They must be eager to adapt and eager to seize opportunities presented by change. An innovative and entrepreneurial organization requires entrepreneurial project managers to encourage and organize the creation of novel initiatives as well as creative and diligent supporting employees to execute the projects if it is to flourish in its economic environment. A good combination of individuals is required for the commercialization of ideas.

### **Skills**

According to Drucker, systematic innovation necessitates the identification and monitoring of seven potential sources of opportunity: the unexpected, incongruities, process needs, industry and market structures, demographics, perception shifts, and new knowledge. It is obvious that an organization that values innovation and entrepreneurship requires a variety of management and entrepreneurial capabilities and skills to manage innovation. Below is a summary of them:

An aptitude for looking for and spotting new chances. A proactive approach to the strategic vision's promotion of innovation. The capacity to support innovation and entrepreneurship in a cultural setting. The capacity to create and execute efficient strategies for innovation and commercialization processes. The capacity to combine research, design, and market data in order to transform novel concepts and inventions into innovations that can be successfully commercialized. The capacity to create methods that are practical and efficient for evaluating R&D projects for innovation, quality, and commercial value[8].

An ideal entrepreneurial management style for innovation should be open and encouraging, should foster the creation of new products, and should be capable of identifying new consumer

demands, new user needs, and new market opportunities. A culture of employee empowerment and a compensation structure that incentivizes creative and entrepreneurial behaviors, values, and presumptions should be enforced by an organization with an innovative and entrepreneurial style.

## CONCLUSION

By an analysis of the key works in the area and case studies of innovative and entrepreneurial companies in the dot-com industry, this study examined the connections between entrepreneurship and innovation. The argument of the is that innovation and entrepreneurship work best together to ensure the long-term viability of e-businesses and e-commerce. According to the author's findings, innovation and entrepreneurship work together to support the growth of an organization. In today's dynamic and changing world, innovation and entrepreneurship work best together, and both are necessary for organizational success and sustainability. In entrepreneurial and creative organizations, innovation and entrepreneurship are dynamic, all-encompassing processes. The implementation of entrepreneurship and innovation in e-business has also been widely addressed in terms of significant concerns and challenges. As innovation and entrepreneurship are systematic behaviors, organizations must make systematic attempts to integrate them into their daily operations. This requirement is addressed by the "5 S's" paradigm. This has aided in the creation of a mindset that views innovation and entrepreneurship as constant, daily practices in organizations. Unfortunately, due to methodological restrictions, the results of this qualitative research cannot be generalized to other contexts due to the limited sample size of interviews and case studies and the nature of the study. The opinions of those surveyed may not be representative of the sector as a whole since they are based on the individuals' own understandings of innovation and entrepreneurship. The case studies of the three top worldwide dot-com giants, Amazon.com, Google, and eBay, were supplemented with two minor Australian dot-coms in order to reduce the constraints.

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## CHAPTER 10

### EXPLORING RHIZOMIC BECOMINGS IN POST DOT-COM CRASH NETWORKS

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#### **ABSTRACT:**

This applies the ideas of Deleuze and Guattari to the study of emergent knowledge dynamics in innovation environments, especially their concept of rhizomic becomings. It demonstrates how an examination of rhizomic becomings may aid in the investigation of novel and emerging patterns, directing interpretation toward the identification of novel pairings and imaginative assemblages in knowledge. The example of a qualitative research studying knowledge dynamics in e-business entrepreneurship after the dot-com crisis serves as an illustration of this. The findings emphasize the creation of the necessary circumstances for creativity in novel combinations of affective and technological lines.

#### **KEYWORDS:**

Business, E-Commerce, Entrepreneurship, Organization, Networking.

#### **INTRODUCTION**

There are two ways the reader may interact with this. In order to explore the problem of the formation of new knowledge, it may first be handled in a social psychological mode as an analysis of the notion of networking in e-business entrepreneurship, particularly of the idea of new forms of technological connection. I'm thinking specifically about the problem of networking among e-business entrepreneurs through communication technologies, which has emerged since the dot-com crash and has new creative dynamics of interaction that are not yet captured in the ways that knowledge dynamics is addressed in current studies. To explain emerging circumstances of innovation, it is important to have a deeper grasp of these processes.

The is an expansion of the idea of knowledge dynamics as rhizomic becoming, incorporating Deleuze and Guattari's ontology of non-dialectic, aconceptual difference, and on a second level, it speaks to a post-structuralist literature.

By suggesting that the dialectic idea's attraction may obscure periods and movements when more unanticipated consequences are occurring, this elaboration goes toward a criticism of the dialectic idea's very pervasiveness and limitless applicability as a tool to approach knowledge dynamics. In fact, I contend that there may be some unexpected twists in the knowledge dynamics of the post-dot-com crash networks, where a few carefully chosen ideas from a reading of Deleuze and Guattari, particularly in relation to the concepts of "difference-in-itself" and "the rhizome," may prompt one to read other narratives than those that have been pre-offered by recent literature on networks and innovation[1].

## **Knowledge Dynamics in E-Business Entrepreneurship Research**

E-business entrepreneurship today combines two indicators of change: advancements in technology communication culture and changes in the way company life is organized around knowledge management. The e-business entrepreneurship industry is a new one, having only been for around ten years. Midway through the 1990s, the World Wide Web<sup>1</sup> began to take shape, opening up new commercial prospects for the sale of goods and services. A huge increase in the number of small entrepreneurial businesses that focused on using new information and communication technologies for business that is conducted entirely or primarily through Web sites was brought about by the new ways to quickly spread information in digital form around the world. This brand-new "Internet-enabled enterprise" quickly become a very prosperous new business type. A significant amount of new economic activity emerged, particularly in the second half of the 1990s, a time period known as the "dot-com boom"<sup>2</sup>.

Knowledge is seen as one of the most important levers of innovation in this new corporate environment, and its good management is recognized as a road to successful innovation. The majority of firms focused on the selling and exchanging of services and solutions through the Internet, swiftly developing into a "knowledge-based" economic arena of innovation. Web pages offering specific information content, Internet intermediaries like consultancies through or about e-business, and businesses concentrating on electronic commerce are among the different types of businesses. These businesses also focus on the provision of systems and solutions for infrastructure or service applications on the Internet[2], [3].

The growth of the new e-business sector coexists with the April 2000 stock market meltdown that is often referred to as the "dot-com crash." The e-business sector's seemingly relentless rise in the 1990s came to an abrupt halt in April 2000 with the value of high-tech corporations collapsing on the global stock market. Hundreds of dot-com companies filed for bankruptcy alone in the UK. The dot-com disaster was a significant turning point, and its aftermath created a "start-from-scratch" situation that sparked fresh concerns about how to approach entrepreneurial innovation. Moreover, it has strengthened the overall emphasis on knowledge's significance and management in terms of both commercial practice and policy.

### **Network building**

I argue in this that in order to respond to the dynamics that appear when attention is concentrated at the intersection of communication technology and knowledge-based business, new theoretical flexibilities are needed. At this meeting place, the network may very well be the main dynamism. Networks have a significant impact in how business is done, according to growing social science data. Most significantly, Wittel makes the case for a new network sociality a new style of interacting with others via networking that is altering both modern business and social life.

New networking techniques were developed during the dot-com boom, such as "First Tuesday" networking events, where entrepreneurs and venture capitalists interacted on the first Tuesday of each month in a casual face-to-face gathering. The purpose was to connect those with business ideas with others who may be able to provide funding for such ideas. During the dot-com boom, several events similar to First Tuesday networking that were more regionally oriented also exploded in popularity[4].



Yet, these networks altered as a result of the dot-com collapse. Although the emphasis on possible investors has shifted away, the idea of networking has come back into fashion thanks to online networking, which provides opportunities for businesspeople to connect with one another through a mix of online introducer systems<sup>3</sup> and face-to-face networking. In these networks, networking had expanded to include the idea of connection, which seemed to be a more all-encompassing notion. The two networks that I shall look at in this are an example of this. In the last three years, the number of members in web-based networking with integrated introducer systems has increased significantly in the UK; many of them have membership numbers in the tens of thousands and are growing internationally. How can we better comprehend the creative dynamics in e-business entrepreneurship that these new and very popular networks contribute to? is the subject that this paper is concerned with. The dialectic model of knowledge dynamics is the one that is most often used to describe innovation in knowledge-based businesses. Many study areas that concentrate on interaction and knowledge generation demonstrate this.

For instance, knowledge dynamics in innovation are examined in organization and management theory as the social generation of knowledge via social ties and social interaction. This study draws its suggestions for innovation management on the importance of social interaction as a driving force in the creation of new knowledge. As the discussion among proactive actors fosters a dynamic of learning, interaction is essential assumed to comprise innovation. The core premise is that creativity and invention are primarily driven by a dialectic process. Hegelians see dialectics in this sense as the gradual growth of ideas via the interaction of thesis, antithesis, and synthesis.

The post-Cartesian literature that challenges Descartes' traditional individualist and static perspective on knowing which dissociated knowledge from its embodiment and its social context is characterized by the Hegelian posture of theorizing dynamics. Most notably, Cook and Seely-Brown have called attention to the legacy of Cartesian epistemology for organization theory and have argued that a dynamic epistemology based on interaction is required to move beyond the static Cartesian idea of knowledge units "owned" by people.

Dialectics has also been supported by social psychologists as a theory to explain knowledge dynamics. They have shown the value of a dialectic approach in highlighting the processes of knowledge change in the reciprocal and intersubjective construction of the social. Authors often aim to identify the knowledge linkages people build via communication and to explain social change through the dialectic processes of social formation through conversation and debate. The underlying premise is that new knowledge arises through the evolutionary development of ideas in contentious discussion, much as organizational theorists believe. Argument and counter-argument, as well as the synthesis of many notions, are considered to be the only patterns that can be used to describe how new knowledge originates[5].

## **DISCUSSION**

In this, I propose that we need to set aside certain presumptions about the nature of knowledge dynamics that we have tended to depend on to explain knowledge generation if we are to capture and investigate knowledge dynamics in the modern context of post-dot-com-crash networks. This specifically relates to the dialectic model's approach to understanding knowledge dynamics. Undoubtedly, dialectic processes in network interactions might lead to new insights about networking. Dialectics, however, is no longer the only pattern we can use to handle the dynamics that networking engenders.

There are two concerns at play here. In order to understand how to account for innovation in the knowledge economy, we must first be able to conceptualize the emergent nature of knowledge. In other words, we must be able to capture not only how existing knowledge changes but also how new and unanticipated aspects emerge that could result in new knowledge. Innovation often results in the emergence of "something" that has no relation to any previously existing socially mediated idea that we may have in mind. Instead, this "something" represents the possibility of a brand-new idea emerging. Second, we must be able to consider the imaginative patterns that support such an emerging process if we are to comprehend the dynamics of such novel and unprecedented elements arising. I refer to patterns that might vary each time as being innovative. Innovations don't adhere to a tried-and-true pattern or technique; instead, they "happen" in a variety of "different" ways. Both characteristics highlight how innovation is unpredictable and unexpected. The unpredicted and the new in emergent patterns cannot be addressed because the dialectic logic focuses primarily on the realignment of a pre-existing, familiar concept or pattern with the novel, even though the dialectic perspective is useful to highlight how people collectively reconstruct existing meanings and identities.

### **Developing as Rhizomic**

Deleuze and Guattari, post-structuralist philosophers, contend that rather than being explained by an epistemic logic of dialectics, emergent phenomena are a part of a much bigger, more varied, and plural becoming. They contend that dialectics lowers our conception of dynamics to conceptual difference, which only considers discrepancies between pre-existing ideas and focuses emphasis on the novel's formation solely in respect to those concepts. Radically rejecting dialectics, Deleuze and Guattari focus on an ontological idea of being that is perpetually generated by the recurrence of difference-in-itself. According to Deleuze and Guattari, a system advances not via conceptual difference but rather through a complex and varied form of difference that avoids the pre-existing since it has no bearing on it. Unprecedented, many, and most crucially, one that "makes itself" is a difference-in-itself.

This becoming philosophy places emphasis on the fact that the dialectic of thought is not unfounded. It relies on an ontological division of the universe that makes it possible for it to clearly display the scars caused by continuing communicative engagement. Using the metaphor of the rhizome, Deleuze and Guattari depict this task of division. Deleuze and Guattari describe non-parallel evolutions as jumping from one line to the next amongst entirely diverse entities in their landmark book *A Thousand Plateaus*. They also describe fractures and undetectable ruptures that cause the lines to break even if they restart elsewhere. Everything of this is the rhizome[6].

The rhizome opposes the idea of a singular route of development; instead, it depicts a dynamic that expands in parallel, numerous directions. The rhizome also has neither a beginning nor an end, nor does it have a central or controlling structure. A rhizome is always in motion and expands continually without beginning or finish. It does not follow a linearly progressing or unidirectional channel of thought. The dialectic presumption that emergence proceeds linearly in tree-like patterns of thesis, antithesis, and synthesis is starkly contrasted by this.

For the time being, the rhizome gives a logic for seeing emergence as a collection of combinations of several becoming streams. Deleuze and Guattari refer to this as the development of new assemblages via the entanglement of several becoming lines. Assemblages may be thought of as "multiplicities," expressing the possibility of variously enmeshing many

differences without a preexisting predetermined notion or pattern of how they should be connected. According to Deleuze, all life is composed of assemblage processes, unexpected linkages, and rhizomic patterns. Each human body or item, in general, is the outcome of a process involving many connections.

Eco observes that the rhizome image's advantage its ability to handle unanticipated connections and inventive patterns of emergence is also a drawback since the idea of connections and assemblages is prone to become endless. Every route may be linked to every other path because of the way the rhizome is built. Due of its possible infinity, it lacks a center, a perimeter, and an exit. So, in order to recognize and communicate about new connections, people inside and those making them must use methods of "cutting" that stop the rhizome's movement. It is crucial to keep in mind that Deleuze and Guattari's philosophy is an ontology of becoming, which suggests that we are interested in flow and movement in the natural world as well as not only the socially relevant world.

According to Deleuze, humans are an integral component of both the material and ecological worlds as well as the social world of knowing. But, sense-making and understanding do not provide the central and supreme capacity that governs all sensory experiences in the material universe, according to Hegel and other traditional metaphysics. Deleuze proposes an unbalanced rather than balanced operation of the capacities of human reception. This implies that various human abilities like comprehension and emotion play an equal role in the creative process of movement. Various capacities of reception are engaged, such as intuition disturbing cognition, and distinct sense impressions continually interfere with one another.

In order for rhizomic becoming to be absorbed into the social realm of meaning, the faculty of knowing would need to disrupt it. Next, I'll examine several networks to demonstrate this: They integrate interpersonal relationships and technological components in novel ways, creating a rhizomatic dynamic that challenges preexisting conceptions of friendship and technology. The interpretation then focuses on the different ways that affect and people's knowledge of technology are cut by affect and by people's affect, respectively. The idea of rhizomic becoming, which is differently sliced at the example of an investigation of two post-dot-com collapse networks, is shown in what follows. I specifically offer the personal profile page, a novel individuation that resulted from new linkages being made between different lines of technology and lines of affect[7].

Using participant observation, interviews, and a focus group, interpretive research was carried out to investigate London's e-business networks. The investigation took place over the course of four months and included 33 e-business owners and seven e-business networks. The research was conducted at a period of company reevaluation after the dot-com crisis in the e-business entrepreneurship sector. It was a moment when fundamentally new forms of contact were taking shape, making it especially pertinent to an investigation of emergent knowledge dynamics.

In this paper, I provide a specific participant observation finding that came to light when investigating rhizomic becomings in networks. Throughout the interviews, networks had become the most crucial area for observation. A snowball technique was used to establish the direction of the observation. This was a two-stage purposive sample that, in the first stage, looked to a social environment that revealed the essential elements of the context in issue. In the second stage, respondents contributed to round out the sample by suggesting other places to conduct observations.

The natural environment of social life in the relevant area may be replicated via snowballing. This was crucial in demonstrating the caliber and transparency of our qualitative investigation. According to Gaskell and Bauer, it is essential for qualitative research to guarantee the research is open to the discovery of local surprise and originality, allowing the investigation to emerge in accordance with the local environment under study rather than the researcher's expectations. This was effectively handled using the snowball method, which produced a total of seven networks, of which I will describe here two.

### **Using Deleuzian Theory**

Deleuze and Guattari's concept of rhizomic becomings suggests a method of analysis that enables us to "think beyond dialectics" and channel interpretation in a manner that allows the formation of innovative new assemblages to be surfaced. Deleuze and Guattari essentially develop a new lexicon for discussing dynamics and emergence. Their approach to philosophy as a toolkit from which to draw selectively in order to think about being in the light of the analytical work at hand is what they mean when they say that their philosophy inspires analysis to "think differently." To accept this reasoning, Deleuze and Guattari were prolific notion creators. Nomadology, deterritorialization, pathways of escape, assemblage, intensity, rhizome, becoming, machinism, plateaus, heterogeneous series, body without organs, and plane of immanence are just a few of the notions that their work is rife with. While critics often label the Deleuzian method as "artistic," writers are starting to pay more attention to Deleuze because of his ability to challenge preconceived notions.

In what follows, I specifically use three concepts lines, linkages, and individuations that are appropriate for the current goal of accounting for emergent knowledge dynamics in e-business entrepreneurship. The motivation for this is not a desire to fit in with the latest fashion; rather, it stems from the recognition that, particularly in an investigation of the dynamics of innovation, we want new words to represent this in order to account for the creation of new conceptions. I went beyond the dialectic categories of similarity and opposition in order to shift my mind into "rhizomic mode" while interpreting. Instead, I wanted to draw attention to the surprising occurrences I had seen throughout my observation, which included happenings that did not fit into any preconceived notions about networking and new relationships that seemed to be at odds with one another but still functioned very effectively[8].

Initially, lines provide the rhizome's primary paths. These lines will overlap in some places, combine in others, and then randomly multiply. Every non-attribute micro-becoming that we can track and that travels between sites is referred to as a rhizomic line. Rhizomes are de-rooted because of the lines that define them. The following is how Deleuze and Guattari define lines. These lines are continually overlapping, briefly intersecting, and moving in the same direction. It should be remembered that these lines are meaningless. It has to do with cartography. Just as they construct our map, they also compose ourselves. They change, and they could even merge with one another. Rhizome. There is no doubt that they have nothing to do with language; on the contrary, writing must follow language and must borrow substance from them inside their own lines.

While lines may link to anything, they can also be broken at any time and then restart in any direction. A line might be a movement, an event, a nonsense, or anything else. Crucially, lines do not operate in terms of lines having a beginning and an end, unlike dialectic lines of development. They move "in-between" existing conceptions rather than translating into them. "In

rhizomatic-styled becomings," according to Ansell-Pearson, "becoming symbolizes the movement by which the line frees itself from the point and makes points indiscernible." Thus, in my interpretation, lines were about attempting to focus on the "in-betweens," or on those aspects that were ambivalent to already-existing evaluative dimensions, such as the current networks that were dismantling existing categorizations of business versus private life and of online versus offline networking.

Second, I concentrated on relationships. New combinations and assemblages created by "lines twisting, converging, and crossing as well as diverging; not aborescent but rhizomaniac" are referred to as connections. A connection might be a rupture, divergence, rupture, disturbance, or convergence. The crucial characteristic of links is that they "work well together," since this is what generates movement dynamism. Moreover, links and lines both have ambivalence about pre-existing categories. These are brand-new, diverse events that don't lend themselves to interpretations based on coherence, similarity, or contradiction but instead give rise to novel orderings. An ordering by similitude has been characterized by Hetherington as a conceptual, non-dialectical ordering: Similitude is all about an ordering that happens via the juxtaposition of indications that are either new or unexpected and are not often recognized as coming together in culture. What is being conveyed is difficult to link to a referent. Unexpectedly creating similarity is known as the bricolage effect. Innovation is centered on this unanticipated bricolage impact, which is often only seen in retrospect. These are the new linkages that may not make sense in terms of the categorizations or notions that are already in use, yet they nonetheless function well together.

Finally, by concentrating my analysis on ambivalent lines and non-dialectic linkages, I was able to focus my overall interpretation on the cutting of becomings. To do this, I searched for developing patterns that resembled what Deleuze and Guattari refer to as haecceity. A method of individuation exists that is significantly unlike from the individuation of a person, subject, object, or material. For it, we retain the word haecceity. Even if their uniqueness differs from that of an item or a topic, a season, a winter, a summer, an hour, and a date all have immaculate individualities that are devoid of any flaws. They are haecceities in the sense that all of their interactions with other molecules or papers their capabilities to effect or be affected relate to their movement and rest. A haecceity is an intensity and new ordering that is developing into a new idea but was not initially defined by its relationships to other existing concepts.

Instead, by individuating, it progressively increases the energy of the lines that go through it and entangles connections in new orderings to create a dynamic that enables the capacity of understanding to comprehend them since it can be called and interpreted in meaning. The personal profile page is the specific illustration of such individuation that I focus on in the next section. It was especially on the verge of developing a haecceity: It was an intensity that came about as a result of lines of emotion and lines of technology crossing and cutting each other in novel ways, acting in opposition to the preexisting dialectic between the virtual and the real worlds as well as between work and personal life. The personal profile page was at the center of a dynamic of movement that created new opportunities for connection. These fresh cuttings blended exceptionally well. To further explain this, I've included excerpts from traces of the dynamics of the personal profile page, including postings, visualizations, and announcements on networking sites, as well as private messages, guestbook entries, and other micro-events I personally experienced while networking, throughout the remainder of this paper [8].

## CONCLUSION

In order to design and manage large-scale projects, the critical path approach (CPM) and network crashes were first created. If the project's length has to be reduced, network crashing in CPM aims to identify which activities should be crashed with the use of extra resources. By allocating more resources to a particular activity, the completion time of that activity may be shortened in the expectation that the project's overall completion time would be shortened, although doing so risks changing the critical path. No matter how many resources are used, there comes a limit when no more time reduction is achievable for any particular task. The minimal time for an activity is known as crash time, and the time for the activity at which the cost is the lowest is known as normal time.

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## CHAPTER 11

### INNOVATION AND B2B E-COMMERCE: EXPLAINING WHAT

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#### **ABSTRACT:**

Many people thought that a fundamental shift in how businesses purchased and sold items was just around the horizon because of the enormous surge of excitement for B2B e-commerce that the "dot-com" boom produced. Real-time, Internet-driven trade would result from the transition to the new "wired" world of business, with important ramifications for, among other things, the structure of buyer-supplier relationships, pricing, and the management of industrial capacity. Although there has been some adoption of B2B innovations, the basic nature of B2B trading has mostly stayed intact. Despite the enthusiasm, such a shift has largely failed to materialize. This aims to explain the discrepancy between the predicted and realized degrees of innovation by drawing on a multi-stranded empirical investigation.

#### **KEYWORDS:**

Business, Customer, E-Commerce, Innovation, Network.

#### **INTRODUCTION**

Personal Profile Page and New Emergent Orderings in Networks. Two of the seven networks examined throughout the snowballing process Ecademy and Ryze did not stack up against the others. The networking sites of Ecademy and Ryze offered free member personal profile pages that were incorporated in online introducer systems, unlike other networks that would utilize their Web site as an online arena to promote forthcoming face-to-face networking events. In the current survey, almost all respondents had a personal profile page and belonged to one or both of the networks, demonstrating the enormous popularity of the personal profile page among business owners.

In 1998, Ecademy was launched in the UK. It had 20,000 members in 2002 and was growing. Its stated aim is to "create the greatest Trusted Business Network by linking individuals to each other allowing information, connections, and opportunities to be exchanged for World Wide Wealth." Ryze has been around since 1996, started in Silicon Valley in California, and has 80,000 members in 2002. Its membership is also on the rise. Expanding members' business networks was its stated goal. They both offer members monthly in-person networking events in addition to online networking opportunities. In 2002, Ryze held its first in-person networking event in London[1].

Both networks provide free memberships that may be obtained by registering online. For a monthly cost, membership may be upgraded to a more sophisticated service. After registering, a person is given a personal Web page where they may post a variety of information about

themselves and their company. 1 depicts the upper portion of a Ryze user's personal profile page. One may explore the sites of other company owners in relevant business categories or sub-networks after they are linked to the network and have a personal profile page created for them. All other network participants may visit a user's own page, which is also searchable via a search function. One is provided with a wide and vibrant variety of "personal worlds" of knowledge, aspiration, and experience while browsing through personal profile sites. The majority of the personal profile page, apart from a minor standardized section, is up to the entrepreneur's content choices. Members of the network add their bios, photographs, vital statistics, favorite quotes, hobbies, prior employment, and potential career interests on the personal profile page.

Also, members have access to a variety of profile and communication management options. Entrepreneurs may "manage" existing relationships and keep an eye on prospective new network contacts using these tools. Examples include private messaging, the "list of friends," and a guestbook function where a member's note is placed in public on the addressee's personal profile page. Both users must have sought and verified their friendship online in order for their names to show on the list of friends.

So, one frequent method of communication was to get in touch with other business owners by looking through their personal profile pages, followed by writing a remark in the guestbook or a personal message. In exchange for my involvement in the research, I would get networking messages like the one in the example below. Importantly, contacts made in this way bridged the gap between business and personal communication because they could be made for any reason and had the feel of online chats with close friends, but they also frequently included some kind of promise that they would keep each other in mind for potential business opportunities. As we'll see, this kind of relationship had mixed feelings about being corporate or private as well as virtual or real.

To use Deleuzian terminology, the personal profile page connects two threads of becoming: the friendship-becoming-technology and the technology-becoming-technology. As a result, friendship turns into a networking technology, and technology becomes a component of entrepreneurs' socializing tools. Both the technological lines that run through the different contact and communication technologies and the affective lines that emerge from online connection crossed each other in novel ways and fused to form one another. Combined, this enables the emergence of the personal profile page as a phenomena that is "different-in itself" and that intensifies around a significant amount of creative energy, given the almost infinite ways in which technology and emotion may interact through this page[2], [3].

Due to its ability to influence or be impacted by others, the phenomena of personal profile pages is strikingly similar to a "perfect personality" in the sense of a Deleuzian haecceity. It first gave off the impression of being a technological image, but it was really far more diverse: As a result of new links between technological and affective lines, a dynamic was developed in which "that which becomes" and "what each becomes" both change at the same rate. This indicates that there have been both fresh intersections between emotion and technology and internal reorganizations within each of these lines. The personal profile page emerged as an individuation from the various ways in which these lines trimmed each other; each of these orderings of technology-becomings and affect-becomings did so in a different way, but it nevertheless emphasized the significance of their difference from one another for the dynamics the personal profile page engendered.



## DISCUSSION

Friendship as a Technology of Networking: The dynamic created by two lines crossing may be used to depict how friendship is evolving with technology. Secondly, as the Ryze tagline makes clear, there is the almost infinite possibility for growing one's personal network thanks to the technology of the personal profile page. At the same time, a number of mechanisms that make a user's connections available to the public on their personal profile page restrict this possibility for limitless expansion in different ways.

The key instrument in this becoming is the list of pals. It is shown on each page of a person's personal profile and integrated into an automatism that monitors online activity, as we saw in example 2 above. More specifically, the list of friends is an automatically produced area on the personal profile page that adds contacts to a list once a new acquaintance is verified. One may engage with an infinite number of contacts thanks to their friend list. There are no restrictions on how many connections may be made between people or how large a person's personal circle of friends should be. Take into account what the user of the network said below.

The sentence also shows how friendship isn't defined by the idea of face-to-face interaction: This is the picture of friendship as a network, as well as the image of friendship as a technology. While one's private network may develop indefinitely due to the technology-enhanced friendships, the network's rhizomatic growth was stunted by the technology that made connections apparent. On Ryze, for example, the entrepreneurs' connections to other network members are visually shown on the personal profile page, complete with thumbnail photos of one's contacts, in addition to the list of friends as a list of names.

With the help of this function, Ryze provides a visual representation of the connections inside the network, showing the relationships between individuals and other business owners. While, once again, this function encourages one to network with new people to strengthen connections with other business owners, the exposure is crucial since it limits the potential of this line. A technology that coupled "making relationships online" with one's "actual" reputation allowed it to make sense in the "real world" of entrepreneurs. This technology included the guestbook, photos, and friends list. Have a look at the following passage from an Ecademy networking message that was sent to all members.

In other words, it creates an ordering of the lines of connection "established by their difference in a relationship between sites rather than their Otherness deriving from a site itself." The visibility of one's friends creates a relationship of similitude, seen from the outside, "from the standpoint of another perspective." In this approach, the network comes to life for business owners in a way that makes the network's technology a part of their socializing tools. This is how technology is developing its friendship.

### **Technology in the Social Lives of Entrepreneurs**

The lines of technology that run through the network overlap lines of impact in a different way: friendships also become technologies as they develop. The technology for visualizing one's friends gets ingrained in how people interact with one another on a daily basis. In a previous paper, I claimed that the ways people connect on social networks are equivocal about the idea of virtual vs. real. Several new technologies have strengthened how closely entrepreneurs' everyday lives are "entangled" with technology. An example would be email alerts alerting network

members to a "movement" on their individual profile page. This might be a notice of a profile visit, a guestbook post, or a friend request, for example. Another example is a weekly summary email that includes information on the number of visitors and traffic to one's personal profile page[2].

There are more ways in which technology is becoming a friend. On their personal profile sites, entrepreneurs often included pictures of their pals. These photos often include friends and acquaintances in casual settings, such houses, vacation spots, restaurants, and even weddings. The crucial point here is that the majority of these friends are those from the network who are visible in the entrepreneur's private environment. The friendship technology has started to influence "real life"; there is no longer a separation between the real and the virtual. I have particular demands for business relationships since I was just named CEO. I appreciate you making Ryze. I've developed a ton of fantastic personal connections in addition to commercial ones! Bob Glass, CEO of Creative Science Systems Extract from "Member Testimonial Section": "You did a fantastic job.

I contend that in the current networks, the new ways in which lines of technology and lines of affect become entangled create conditions for rearrangements in lines of affect that depended primarily upon technologies rather than the face-to-face aspect of human interaction. While some authors have drawn attention to problems of establishing trust via online communication, focusing attention on the lament absence of proximity in online networking or "virtual networking," I suggest that this is not the case. The more a member can demonstrate via a list of friends, guest book sign-ins, and photos that they "have" friends, the more trustworthy and successful they are seen to be.

Together, these new links between work and home, between the actual world and the virtual world, establish the framework for a new network ordering and new creative assemblages. The personal profile page opened up new opportunities for "trusted" communication and permitted lines of affect that lie between the flow of real life and the virtual world, fusing the two together in a novel, distinctive, and ground-breaking way for corporate and private communication. The idea of networking has been transformed by this previously unheard-of mode of connection, which also presents itself as original and unique in its own right.

It was not the first speculative boom of its sort, and it is likely not the last, to see an astonishing rise and crash, as did the late 1990s technology bubble. The frenzy was accompanied by an astounding explosion of rhetoric, folklore, and intellectual and managerial fashion, or, to put it crudely, "hype," similar to the successive railway booms of the 19th century. This sparked a significant flurry of innovation, especially in the establishment of numerous Internet-based intermediaries. Large quantities of money were invested in these projects by organizations and investors, who mostly lost their money. The revolution that consultants and investment banks loudly claimed would change interorganizational commerce never happened.

In this, I address two key issues. The first is a straightforward inquiry: Why didn't the revolution occur? The second is: What valuable business practice concepts may be gleaned from the rubble? This is a crucial duty since, to paraphrase George Santayana, "those who do not know the past are bound to repeat it." One aspect of this field's published work is the dearth of strong empirical data, which contrasts with the abundance of generalized commentary and unsubstantiated conjecture on the origins and effects of the B2B bubble bust. Day, Fein, and Ruppertsberger

highlight the parallels between this "shakeout" and previous disruptive technology-related "shakeouts" in their research[4], [5].

This paper presents the findings of a multi-pronged examination into the patterns of life and death of B2B exchanges as well as the degree to which organizations are willing to utilize the Internet for buying and selling. This focuses more on the potential and challenges that "regular" organizations confront as well as the ideas that failed, in contrast to most of the literature in this field, which has generally concentrated on leading firms or the few successful hubs. The reasoning for this is because the ordinary and the average frequently have a lot to teach us about the creative process. This study's objective was not to record the organizational triumphs of top companies; such work has already been done, and the potential advantages of B2B e-commerce are widely known. Understanding the truth of organizations' experiences and identifying the major problems and barriers they confront was a difficulty for this research.

### **An overview of the B2B phenomenon**

The well-established technologies of electronic data exchange serve as a straightforward entry point to the complicated roots of the B2B e-commerce phenomena. Direct system-to-system data transmission across proprietary networks while adhering to industry standard protocols had already established itself as a common practice for several sectors by the beginning of the 1990s. In some cases, the technology was progressing to more advanced uses where buyers and suppliers could not only manage routine transactions but also "see" into each other's systems, enabling such operational innovations as collaborative planning, forecasting and replenishment, and vendor managed inventory. The technology allowed for significant savings by increasing the speed and accuracy of data transmission. Electronic links were also being developed to make it simpler to share technical and design data across firms, promoting inter-firm cooperation in technical design. The disadvantage of these "inter-organisational information systems" was the high "hook up" costs incurred by the parties, which prevented smaller suppliers from adopting the technologies because they frequently had to cover the costs of connecting their own systems with various customers' differing requirements. Parallel to this, there was a small amount of discussion in academic literature about the long-term effects of these technologies on firms' switching costs. There were solid reasons to expect both a decrease and an increase in market "stickiness," as well as a resulting shift to purer "markets" or expanding "hierarchies," respectively. With the exception of a few scholarly periodicals, the discussion was mostly theoretical and was not given much attention[6].

But, the advent of the Internet and corporations' use of it as a serious business tool fundamentally altered the nature of the discussion. The boundaries of potential were expanded by three crucial aspects of the Internet and two inventions. The Internet was accessible, affordable, and relatively straightforward for businesses to embrace since it was designed around a set of uniform and basic technological standards. The online auction and the search engine were two breakthroughs that created a variety of new opportunities for online B2B business. Regarding the possibility for a novel approach, two fundamentally interconnected perspectives gradually became apparent. The first was the idea that the Internet might drastically alter the purchasing and selling procedures, bringing down the prices and trade times. Potential suppliers might display huge amounts of searchable information on their offerings and skills, and prospective customers could find prospective suppliers extremely quickly. Additionally, utilizing multilateral reverse auctions, buyers might utilize online tools to instantly find the lowest provider. Thus, suppliers

could be more flexible with their price. It was generally acknowledged that these novel techniques had the potential to provide significant advantages.

But, the second viewpoint saw these new possibilities as portending something far more substantial than just some money saved on administrative transaction expenses. The Internet, in the words of Bill Gates, "will carry us into a new world of low-friction, low-overhead capitalism, in which market information will be plentiful and transaction costs low." This vision of the future initially stoked enthusiasm for online business-to-consumer retailing, but after a while many observers realized that the B2B market was of a vastly greater scale. B2B e-commerce was seen to represent a "fundamental shift in the nature of capitalism." E-markets "can dramatically affect the power balance in today's value chain," according to a report by AT Kearney. Partially motivated by an almost ideological faith in the nature of "markets," this position assumed that supply markets for corporate purchasers would change: The features which stopped industrial markets from behaving like the theoretical, equator-based markets. New market institutions would be required to function as "hubs" between buyers and sellers in order for these advantages to be realized, and these — even if just charged a small portion of the throughput — stood to enjoy extraordinary economic benefits. The "killer application of the B2B Internet revolution" was supposed to be these hubs. A "land grab" on the Internet resulted from businesspeople and current market players trying to take over control of their respective markets or industries. Several of these new intermediaries have disappeared over time and a later section of the explores their destiny. The use of e-procurement and the use of so-called "private exchanges" has enabled some organizations to significantly advantage themselves, but many organizations have struggled to develop their e-procurement or e-marketing activities, and it is interesting to explore why this might be the case[7].

Several research techniques were employed in the inquiry detailed here. First, 240 usable responses to an email survey addressed to more than 4,000 enterprises that service the main UK utilities supplied details on these businesses as both buyers and sellers. Second, follow-up phone conversations with a dozen of these companies helped to elucidate their experiences more fully. Finally, nine case studies covering various organizations from the public and commercial sectors were added to this. Fourth, Meakin's database of 663 e-marketplaces and B2B hubs was employed in the research. There is no way to know with certainty what proportion of the population this vast database represents, but it does represent a sizable portion of the population. Levaux "estimated a thousand or more" B2B exchanges had been developed, according to Grubb's estimate, while Caspar referenced a research by Andersen Consulting that said there were 7,500 by late 2000. Day et al. assert that the high was 1,520. . Businesses in the Achilles Group's Utilities Vendor Database, a B2B business focused on public and regulated procurement, made up the sample for the email poll. A wide variety of businesses provide the utilities industry in the UK. Our strategy included using a very short questionnaire at first, then using the promptness of email feedback to adjust the format and test the impact on response rates by changing the order and quantity of items asked. We emailed little over 4,000 organizations to conduct the poll in the fall of 2001, and we received over 240 viable responses. Unfortunately, because of our adaptive design, we were unable to obtain information from each responder on all of the questions. Participants had a chance to win a £50 gift card by entering a drawing.

The way the questionnaire worked was by sending a plain text email, which allowed respondents to simply overtype their responses in the reply and send the email back. By doing this, we were able to avoid utilizing e-mail attachments and save responders from having to visit a website.

Also, we provided each participant with access to the research's conclusions as well as a short benchmarking analysis that contrasted their answer with those of other businesses. We have not used formal scaling or rigorous hypothesis testing in the interpretation of the data since the study is exploratory; the complete analysis is still being done. Here, we provide a summary of the descriptive data, which, in this instance, we think is more illuminating than trying to find complex score relationships. We were able to include additional information about the organizations from the public domain, such as financial statistics and information from the original database, into our analysis since we were working with non-anonymous returned questionnaires.

With 124 people on average, the respondents had a median turnover of £11 million. The qualitative aspects of the research involved a series of visits to nine organizations in order to determine which issues and aspects of B2B e-commerce were at the top of their agendas. We sought to include as many organizations as we could, and we tried to let managers and staff in these organizations largely determine the course of the discussions. We did not gather comparable or matching data from these organizations as a result of our rather unstructured approach, but it did assist us in engaging with some of the underlying B2B and e-procurement issues that we suspect would have been lost had we framed the meetings too strictly in our own terms. Given that managers frequently discuss aspiration in these areas as though it were current reality and that interviewees' responses occasionally capture what they have read in professional magazines rather than the actual experience of their organizations, we believe that this trade-off is especially crucial. The significant drawback to this strategy is that a lot of the content produced has nothing to do with the current problems, and generalizations are, of course, far more problematic than with survey data.

The examination of the B2B hubs also required methodological trade-offs. Levaux anticipated that only 200 of these efforts would still be in existence in 2003, and most of the material on them has been written with the assumption that very few of them would succeed. This part of the study used data from the previous database and traversed 302 e-marketplaces using a highly organized search approach that included looking at the website and utilizing two search engines to compile news and PR-agency coverage. These secondary sources are obviously not entirely accurate or dependable, but on the other hand, for some of the efforts we looked at, these reports represent the only material that is still available. Email messages were made to the exchange to request further information where required and practical.

The systematic study of the data pertaining to each of the efforts was made possible by this highly organized approach, which also made it possible to make an intelligent choice to stop looking for information on one exchange and go on to the next. This Taylorist method of data collection was particularly successful because experimentation revealed that without a set cut-off point, a lot of time could be wasted looking for exchanges that were the equivalent of "vapourware" initiatives that were announced in the media but later vanished without a trace. The categorization of the B2B initiative in accordance with a number of parameters was a crucial component of the data collecting procedure. They included whether the website was active, dormant, or had survived by merging with or being acquired by another venture. Emails were sent to websites that seemed to be inactive, but if the connection broke and the email wasn't returned, it was presumed the operation had shut down. When a site looked to be "yet to go online," it was ignored until the project's completion and then checked again. If it was still pending[8].

It became evident throughout the data collection that it was difficult to assess the amount of activity, or in certain instances, the sincerity of purpose, of the efforts. Several of the marketplaces gave general descriptions of what they offered but provided no proof that the website or the services were really in existence. This turns out to be a significant issue when looking at organizations that may or may not be successful and that operate in a setting where it is not in the players' best interests to be entirely honest about their level of success right now. We ultimately decided on a straightforward proxy for being "genuinely alive": if there was any disclosed quantitative indicator of the transaction volume or throughput. The fact that they were labeled "Actives" does not mean that the projects were profitable; an exchange might have throughput but still not turn a profit. In circumstances when an Active site has just not gotten around to disclosing certain suggestive figures or there is some other tactical reason for obfuscation, there is obviously a possibility of "type one" mistake in this categorization. A "type two" mistake also exists for markets that exaggerate activity. Yet, because projects would often be encouraged to highlight their viability in order to draw participants, this seems like an acceptable standard to use. It is difficult to understand how Büyüközkan's method may be operationalized in reality given the knowledge gathered from the present research. Büyüközkan recounts another effort to "score" the activity of e-marketplaces[9].

## CONCLUSION

According to Manuel Castells' interpretation of modern society as a heavily technologically mediated network society, a culture of "actual virtuality" is emerging in informational networks. In this world, "appearances are not just on the screen through which experience is relayed, but they become the experience." The results in this paper have shown a specific mode in which two post-dot-com collapse networks develop into such a true virtuality. The processes that give these networks their mobility and creative force were revealed by the Deleuzian study. Its focal point is the individual profile page, which organizes networked entrepreneurs' experiences in novel ways. The social lives of entrepreneurs are no longer primarily influenced by the neighborhood of enterprises in their area, but rather by their list of friends, network messaging, and other technological advancements that interact with friendship in novel ways. Business credibility and reputation are no longer primarily built via face-to-face interactions. The implications of these new links in the future are now being called into doubt by these results. The shifts in affective and technological lines go beyond what would be reflected in dialectical relationships between the actual and the virtual, as well as between corporate and private. They are distinct in and of themselves; they do not just translate into a synthesis between these traditional boundaries. The personal profile page, which assembles aspects like the guestbook, the list of friends, and photos of close friends, has arisen as a new concept in networking. Instead, they are more likely to create new ideas. This has served as an example of what may be turned into a new technique for interpreting the circumstances for innovation in situations including know-how. This has just represented a first step in that direction, and is far from finished. This has itself been something of a rhizomic trip linking parts of a tale that is seldom recounted as such, somewhere between the ethno-methodological and the sceptical, the social psychological and the ontological.

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## CHAPTER 12

### E-ENTREPRENEURS OPERATE IN THE CONTEXT OF OPEN-SOURCE SOFTWARE

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#### **ABSTRACT:**

It is sometimes difficult to comprehend how we ever managed without the Internet since it has become such a crucial component of our daily lives. In this paper, two entrepreneurial businesses are profiled, one of which managed to survive the "dot-com bubble crash. Describes the present and potential online business settings, particularly in light of the widespread use of open source software. Unlike proprietary software, open source software (OSS) allows for the flexibility to update and redistribute this source while also making its internal implementation details public to both consumers and developers. We investigate the important ramifications of this unusual method of software delivery for e-business owners. The advice given by the e-entrepreneurs who were questioned included having a flexible strategic plan, having managerial abilities, offering outstanding service, and having patience. These suggestions, if included in the decision-making process, would help existing and prospective e-entrepreneurs maintain their businesses.

#### **KEYWORDS:**

Business, Customer, Entrepreneurs, E-Commerce, Selling.

#### **INTRODUCTION**

Sudden Birth and Lingering Death of B2B Exchanges. The modest difference between websites that passed the Activity Test and those that failed was interestingly not statistically significant. Markets that can report throughputs seem to have an equal likelihood of being "alive" as those that cannot. Two theories may be used to explain this: Due to the "pure play" Internet-based enterprises' very inexpensive startup and ongoing expenditures, even sites with low levels of actual activity may be able to maintain an online presence for a while as they just recoup their original investment. Second, charging low fees or offering desirable but expensive-to-provide services would be one method to draw enough buyers and suppliers to an exchange, rendering continued operations unprofitable. With the prevalence of hybrid and unorthodox techniques, categorizing exchanges turns out to be a complicated process. Nevertheless, we discovered that the complete sample in this research, where categorization was feasible, was divided nearly evenly between the categories and the status of these categories; once again, there is no statistical significance between the different forms of trade.

The key takeaway from this is that, contrary to what was often believed in prescriptive and speculative literature at the time, no certain trade model ended up predominating. The late 1990s technological boom must be understood in the context of the rise of B2B, and Figure 3 charts the



initial announcement date against the value of the NASDAQ composite index. The lifelines of exchanges are shown by category in Figure 4, which provides a more thorough illustration of this structure[1].

The information in sections 3 and 4 leads to some intriguing hypotheses. On the one hand, the close resemblance of announcements to the NASDAQ index suggests that much of the enthusiasm for B2B intermediaries was driven less by the desire to create genuinely viable businesses and more by the possibility of making money from investors during the height of the technology investment boom. Creating a B2B intermediate organization is not capital intensive in and of itself. Consequently, it appears doubtful that the difficulty of getting financing when the boom ended totally explains the fall in the introduction of B2B operations. The dramatic decline in announcements between April 2000 and February 2001 makes more sense if, on the other hand, the driving force behind many of the businesses was merely to access the investment markets as soon as possible.

### **B2B E-Commerce Experiences: Early Observations**

It is important to note some incidental characteristics of the study that we found fascinating before moving on to the core data obtained by the survey and the cases. Secondly, even though we utilized contact e-mails given by the businesses themselves to a database to which they paid a fee, a significant portion of the survey's emails were returned as undeliverable. Investigating these situations further leads to the following possible issues: A surprising number of addresses were based on non-company e-mail systems and were no longer functioning. Several businesses had altered the format of their e-mail addresses; people had departed the organization. We believe this to be an important result for the reasons we explore next. Another interesting finding was that eight of the answers were returned through regular mail as opposed to email. Due to limited space, we will only focus on three of the major study findings: how e-commerce affects purchasing, selling, and the nature of the buyer-seller relationship[2].

We had a sneaking suspicion that most of the marketing for B2B e-commerce was based on an uninformed understanding of corporate procurement. For instance, a lot of B2B evangelists overstate how much corporate purchasing consists of purchasing commodities or highly standardized goods for whom price is the only important element. We requested information from supplier organizations regarding the two elements of the nature of their sales: Secondly, how much of their production was "commoditized" that is, whether the products or services were "off-the-shelf" commodities or custom-made for a specific client's requirements. The degree to which customers participate in the formulation of their own needs was the subject of our second question: In some instances, customers are quite clear about what they want; in other instances, the seller describes the answer after determining the buyer's wants; and in many others, the transaction necessitates a process of communication between the buyer and seller.

Many of the papers on B2B e-commerce that have been produced have assumed a certain model of inter-company trade that emphasizes standardized items chosen by the clients. This equated to less than 19% of revenues from the providing companies who participated in the research and answered to the email questionnaire. This is a major study because it shows that more than 80% of B2B commerce cannot be accommodated by the impersonal, price-focused, online catalogue mechanisms that have traditionally served as one of the most important archetypal representations of B2B. The diverse mixes of products, services, and works that different businesses provide set them apart from one another. The businesses in the email poll offered a

solid variety in this regard, with 60% offering some combination of works and services and the other 40% either supplying items alone or in some combination with them. Three-quarters of the businesses that sold things do so as a component of a more intricate bundle that includes more intangible features. Once again, a lot of B2B talk has only considered straightforward "products," while the reality is considerably more complicated.

## **DISCUSSION**

### **Buying: Use of the Internet**

When we questioned businesses about their usage of the Internet throughout the purchase process, we discovered that it was widely used, particularly when looking for information on suppliers' websites. Telephone interviews provided further evidence that respondents saw "internet markets" in a fairly wide sense; organizations often think of distributors in this way. However, it seems that a key function of suppliers' websites is to just provide additional contact information, such as postal addresses and phone numbers. Using common search engines to locate, for instance, news coverage on a supplier is part of the "other info" answer. In our case studies, we observed that the opportunity for "finding new suppliers" did not seem to excite much enthusiasm among the organizations; the Internet could make getting information slightly more familiar, but this mundane but valuable facility transpired to be the main current impact of the Internet on the procurement function, and is a significant observation only insofar as it falls considerably short from the idea of a "closely-coupled supply chain" or a "virtual community." This is a seemingly unimportant but important discovery since much of the early enthusiasm about the Internet's potential was predicated on the idea that it would lower search costs. This doesn't seem to be much of a problem, or if it is, there isn't much to gain from a market-based approach over a straightforward Google™ search.

### **Inter-Organisational Systems, for purchase**

We discovered that barely half of the providing businesses had computerized buying systems, with the same percentage having centralised purchasing systems, despite the B2B hype emphasizing the electronic connecting of organizations' procurement systems to those of their suppliers[3]. These results are intriguing because they imply that, at least for smaller organizations, the concept of interconnected systems throughout the supply chain is likely to remain a dream in the absence of significant innovation in information technology and business practices across many enterprises. This is not to suggest that this cannot or won't happen, but if these results are indicative, it would seem that those businesses who want to cascade integrated supply chain techniques have a significant burden of supplier development ahead of them.

### **Purchasing: Measurement and Control of Purchases**

The great potential for lowering the expenses of buying bureaucracy and transaction processing has garnered most of the excitement for electronic procurement. The death of internal buying departments has been anticipated by many B2B enthusiasts as a consequence of "users" being able to purchase what they need directly from their desktops, with automated budget controls limiting spending below specified bounds.

Although this analysis does not discount the enormous potential for these kinds of reductions, it does highlight some key limitations. This is due to the fact that buying involves more than just transaction processing. First, higher-level, strategic management of external concerns, including

supplier development, cooperation on business processes, and supply strategy, is necessary for successful procurement. In other words, making successful purchases involves far more than just looking for the best deal. The control of fraud is a key role of procurement systems, and in the public sector in particular, organizations' procurement systems are bound by a complicated legislative framework. As a result, there are more complicated internal difficulties than basic budgetary controls. So, even if e-procurement might result in substantial cost savings on certain aspects of the procurement process, it does not eliminate the need for specialized procurement workers that have actual buying experience.

The issues of measuring are prompted by these organizational and structural factors. All of the research participants had difficulty estimating accurate expenses for the actual buying process as well as assessing the performance of purchasing. For the implementation of e-procurement and B2B, this problem has two significant repercussions. First off, the attractiveness of leveraging Internet-based innovation to save costs is somewhat muted in the absence of useful indicators of how effectively a purchase process is functioning. In fact, rather than a desire to save costs, managers at several of the study's organizations were more driven to maintain adherence to a system of bureaucratic controls. We observed organizations whose buying managers' primary objectives seemed to be to prevent things from going wrong and to maintain a constant equilibrium. This appears to be a problem in particular if an organization's culture favors risk aversion. Mechanisms of measurement and incentive in such organizations prevent dynamic innovation in procurement systems[4].

Second, the assessment of buying in other kinds of organizations tends to place an unjustified emphasis on near-term savings. Some businesses have been so entranced by the B2B innovation's significant headline price reductions that they have forgotten that the real cost is the sum of the purchase and ownership costs. Procurement specialists are familiar with and understand the issue of suppliers "lowballing" to secure a contract, then working hard to claw back their margin by, for example, increasing post-contract complications. Similarly, expenses for delivery, product quality, warranties, and after-sale assistance may easily outweigh the cost of the original purchase. But, it seems that in certain organizations it has been politically expedient to ignore these worries and concentrate on impressive-sounding price reductions in the headlines. There is a real chance that such a strategy might ultimately backfire in these circumstances.

**Selling:** Connections with Customers and Communication. B2B has often been portrayed as being only about buying. But it's crucial to comprehend how it impacts selling organizations on the opposite side of the coin. We questioned suppliers on a range of facets of their interactions with clients.

### **Customers**

Although though only around a third of businesses utilized electronic linkages like EDI, email was widely used. While it is obvious that e-mail predominates in how businesses utilize the Internet, it is still important to take into account the preceding result about the poor quality of e-mail addresses at this point in the debate. While the companies in our research rely heavily on electronic communications, it is fair to argue that there are many instances where this management process is fairly unprofessional, and more especially where the organizational infrastructure for managing these systems is inadequate. . Despite all of its advantages, electronic

communication needs an administrative infrastructure, along with the corresponding financial commitment and professional development[5], [6].

### **Utilizing websites for sale**

The ways in which Internet sites were used to market businesses varied greatly, with many taking the chance to provide information and answer questions. Much fewer businesses utilized the Web for transactional reasons, and for many, managing orders consisted only of providing the sales department with an e-mail address. The research emphasized the several functions that the Internet may perform in the sales and marketing plans of providing companies. The majority of B2B literature portrays suppliers as playing a fairly passive role, limited to fulfilling orders made via online catalogs, engaging in price-driven auctions, and selling commoditized items. In contrast, we discovered that organizations use the Internet in a variety of proactive ways. In one of our case studies, a small producer of specialized architectural electrical equipment used the Internet extensively as a tool for marketing intelligence. A member of the marketing team often searched the Internet for news on large building projects in important foreign markets. Working with "specifiers" as opposed to the company's immediate clients was the most important marketing strategy for this business, and it was also important to steer clear of any marketing that portrayed their goods as commodities or readily interchangeable with those of other companies. The usage of online catalogues in this scenario was not at all a priority since it would be completely at odds with the relationship marketing strategy[7], [8].

### **Influence on the buyer-seller relationship**

The impact of B2B e-commerce on the power dynamic in supplier relationships is a crucial topic. S 9 and 10 show some intriguing inconsistencies in the individuals' viewpoints. The fact that a sizable portion of respondents anticipate lower supplier pricing but stable consumer prices makes for an intriguing contrast. The manner that businesses saw the expected changes in power also reflects this disparity. One interpretation of these statistics is that the responding corporations may be acting with an unreasonable amount of optimism and even complacency. This surprising and paradoxical conclusion is consistent with other research on enterprises' perceptions of the power implications of supply chain integration and partnership partnerships[9], [10].

This has given some of the findings of a multi-method investigation on the B2B e-commerce landscape. Its overall results suggest a picture that is much different from the incredible exaggeration produced about the potential influence of B2B by the business media, consultants, and some academics. The fact that a lot of theorizing about the possible effect of B2B has originated from an unreliable and seriously deceptive image of. The characteristics of organizational purchasing and selling, and B) the level of complexity of a large portion of the supplier base. Here, we discovered businesses that were a long way from "supply chain cybermastery" and didn't seem to be "surging forward on the crest of the Internet wave." For these businesses, the reality of B2B relationships is more complex and richly textured than the rather sparse and highly depersonalized images of the electronic marketplace.

There are many plausible explanations for the ups and downs of B2B e-commerce. Day and colleagues emphasize the notion that a lucrative opportunity draws many of participants, many of whom perish in the haste. Brilliant concepts get a lot of attention, but there isn't enough gold to go around, as seen by the fact that so many e-marketplaces have failed. Hundreds of vehicle firms were originally founded as a result of the advances around the start of the 20th century, but

only a select handful went on to become Ford and GM. The research presented here tells a different tale from what is presented here. It implies that the inter-organizational purchasing and selling process was fundamentally misunderstood, which is what led to the B2B hype, and that the rush was for fool's gold. As many of the assumptions behind the B2B model turned out to be false, entrepreneurs suffered significant financial losses. One may be able to recover a recall of the concept that innovators have a responsibility to thoroughly understand the nature of the markets they intend to join from this debris. These conclusions depend obviously on how representative the data acquired here is of other populations. Yet the triangulated approach's use in the larger study endeavor has convinced us that this line of inquiry is worthwhile pursuing.

The purpose of this is to examine how OSS is used in e-entrepreneurship and to determine the qualities and abilities required of an e-entrepreneur. E-Entrepreneurship is described as the idea of primarily using the Internet to deliberately and successfully carry out one's aims and objectives for their firm. E-business owners utilize the World Wide Web to communicate and carry out virtual transactions with both other companies and their clients. Both academics and practitioners have lately begun to acknowledge the concept of an e-entrepreneur. An "e-entrepreneur" and a traditional "entrepreneur" both share many characteristics, notably those necessary for success. Likewise, the primary distinctions between the two relate to the resources needed to launch the firm.

Most firms have seen significant transformation in the last two decades as a consequence of globalization and the Internet. Many businesses always struggle to maintain a competitive edge in order to even just exist. Regardless of the kind of goods and services that businesses provide to clients, the Internet has given them a wide range of opportunities. Nowadays, a lot of businesses utilize the Internet to provide customers information on their Web site, including shop opening times, locations, contact information, and a list of their goods and services. Yet, a substantial amount of sales income is still produced by operations carried out at the actual locations for the bulk of these enterprises. One such is Telstra, which does sales and online invoicing in addition to operating physical storefronts around the country.

The number of businesses doing business online is growing quickly, but many of them continue to have physical locations where buyers can "see and feel" their items before making a purchase. Many companies understand the need of catering to the demands of traditional clients who want to conduct "face-to-face" transactions. The bookstore chain Borders is one such. Then there are businesses that solely have an online presence and do all of their advertising, marketing, and business online. A prime example of this kind of business is Amazon.com. For every business, whether it operates exclusively as "bricks and mortar," "online," or a combination of the two, brand awareness, customer service, and customer happiness are the key factors.

For some time now, scholars have studied and developed the idea of "entrepreneurship." The writers sought advice and direction from the entrepreneurship literature since there is little material in the field of e-entrepreneurship in order to achieve the following goals:

1. Describe the characteristics of e-entrepreneurs.
2. Determine the parallels and contrasts between traditional entrepreneurship and e-entrepreneurship.
3. Determine if being an e-entrepreneur is preferable than just being an entrepreneur. Study e-entrepreneurship in the context of open source software.

4. To learn more about the idea of e-entrepreneurship, the chief executives of two e-entrepreneurial organizations were questioned. The following topics were covered in some of the interviews:

### Qualities of an online businessperson

Function of open source software in the information technology industry, effects of OSS on current and future e-business owners, and the government's backing of e-business owners. The part that outlines the research technique used to conduct the interviews comes after this. The case studies of the two organizations are then given, highlighting the several facets of being an e-entrepreneur in light of the contemporary technology environment, including OSS. The results and recommendations for further study are presented in the last section.

### CONCLUSION

The open source movement has developed into a powerful force in the modern computer world. Open source software has established itself as the de facto norm in several segments of the software business where it has grown to be a significant threat to proprietary alternatives. Code that is intended to be publicly available is known as open source software; anybody may view, alter, and distribute the code as they see appropriate. Peer review and community production are used in the decentralized, collaborative development of open source software. Being able to examine open source code makes it simpler for everyone to learn new programming techniques. By modifying the code and sharing it with their peers and the larger open source community, as well as by adding changes to already existing open source projects, students may also gain experience.

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## CHAPTER 13

# ENTREPRENEURSHIP AND ITS RELATIONSHIP TO E-ENTREPRENEURSHIP

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### **ABSTRACT:**

An entrepreneur is someone who identifies a need in society and attempts to fill it with an original concept. Yet, "entrepreneurship," which is the act of forming a corporate organization with the intention of making a profit as a return in the future. In this chapter author is discusses the proprietary software model. The "dot-com crisis," which resulted in thousands of enterprises throughout the globe losing their jobs and declaring bankruptcy, came with the dawn of the twenty-first century. Yet the rivalry amongst the surviving businesses has not lessened. The only thing businesses that have survived have done is "change their value offerings to match changing marketplace requirements." Success tales of businesses that recovered from the catastrophe and went on to prosper are no less incredible.

### **KEYWORDS:**

Business, Company, E-Commerce, Entrepreneurship, Employee.

### **INTRODUCTION**

Venture capitalists, investment banks and brokerages, as well as the Federal Reserve Bank, are just a few of the entities that have been accused of being responsible for the "dot-com crisis." The bulk of these companies were founded and controlled by young entrepreneurs who lacked the "necessary expertise in planning, organizing, and managing firms," which has been linked to the dot-com disaster. The New York Times and The Industry Standard research that point to a lack of human resource planning as a major reason to sexual harassment and legal actions against the corporations, further hobbling them after the collapse, support these findings as well. Too many rivals, short-term attitude, undisciplined expansion, unrealistic revenue forecasts, inexperienced management, underestimated expenses of developing a national brand, and lack of customer-centered focus are the seven errors Duck highlighted as contributing to the collapse. According to the authors, entrepreneurs and investors alike failed to prepare for contingencies and allocate long-term finances in contrast to previous approaches[1].

The "dot-com disaster" has not resulted in a decline in the usage of the Internet for doing business; rather, it has increased. No matter when a business began using e-technologies before the crash or after it is critical that they provide security to their clients and keep hackers away from their websites. Conry-Murray and Dvorak have outlined security concerns that businesses should address to safeguard their clients, including routine site debugging, sparing cookie use, and limiting the amount of adverts they post online.



Businesses have used the Internet much more during the last ten years, mostly as a tool for marketing. Even tiny firms with little resources may now instantaneously convey their goods and services to target markets and audiences throughout the world thanks to the Internet. Companies from all around the world are urged to participate in this trend. Speakers at the Dubai Strategy Forum, for instance, emphasized a variety of qualities needed to boost economic success. This included the need for embracing information technology as well as the creation of a "strategic framework that eliminates bureaucracy and promotes entrepreneurialism, where managers manage, innovators invent, and the teams are rewarded for their accomplishments. The following part lists the characteristics of entrepreneurs and analyzes the relevant e-entrepreneur literature.

From the early 18th century, the idea of entrepreneurship has been present in economics and sociology studies. In the literature, a variety of definitions of entrepreneurship have been suggested. Mulcahy defines an entrepreneur as "a person who conducts or runs a company or venture and carries the risk of profit or loss," referencing the Oxford Dictionary. Entrepreneurs are those who "identify possibilities and take risks in the face of uncertainty to establish new markets, design and develop new and better goods and processes," according to Thompson and Randall.

The literature lists a variety of characteristics and competencies that entrepreneurs have. Business expert Chris Dyson lists nine characteristics that make someone an entrepreneur. Personality, honesty, initiative, dedication, drive and determination, directiveness, confidence, self-direction, selling, and leadership are some of these qualities. According to Cherwitz and Sullivan, a "intellectual entrepreneur" is characterized by qualities like "realistic and achievable goal, taking risks and grabbing chances, utilizing existing resources to realize the vision by leveraging cooperation, teamwork, and inventive techniques," among others. It follows from these descriptions that successful entrepreneurs need qualities like vision, opportunity-seeking, leadership, and managerial abilities.

As was previously said, the writers have described e-entrepreneurship as a concept that primarily leverages the Internet to fulfill vision, business goals, and objectives in a strategic and competitive manner. E-entrepreneurs are those people who utilize the World Wide Web to communicate and carry out virtual transactions with clients and other companies. Since the dot-com crisis, which caused thousands of people to lose their jobs and the closure of hundreds of firms, e-entrepreneurs have attracted attention.

## **DISCUSSION**

E-Entrepreneurs Operate in the Context of Open Source Software. Investigations into the reasons of this catastrophe, which hampered several other information technology-dependent companies for months, are being conducted by practitioners, consultants, academics, and governments. To prevent future collisions like this one, emergency steps are already being implemented. The London School of Economics and Political Science studied 42 entrepreneurs who were headquartered in the Greater London Business region and had survived the dot-com meltdown in the fourth quarter of 2002. The research, which using a triangulation approach, discovered that entrepreneurs were "in the process of collaboratively establishing a new stance of what success and decision-making means through e-business networks" and, as a result, developing coping mechanisms to prevent such setbacks in the future.

The absence of human resources and communication between sellers and consumers was one of the issues that led to the death of many e-entrepreneurial businesses. Several multinational organizations are now collaborating with their future workers with the goal of giving them an in-depth grasp of company operations in order to solve these difficulties and provide potential e-entrepreneurs an awareness and practical knowledge of the business world. Hewlett-Packard Ltd. has begun one such initiative under the name "Media Entrepreneurship." Users may accept that there are no restrictions on software development since the application largely employs Linux, which is open sourced. While commenting on the initiative, Robert Miller, national business development manager for HP who is in charge of education and healthcare:

Several technologically savvy individuals were given enormous sums of capital backing during the dot-com boom and crash, but many lacked the commercial acumen or financial management abilities to adequately execute their ideas. Some of them were astute enough to recruit business professionals with that level of know-how, but the clash of two very distinct cultural mindsets made for a very problematic culture fit. Companies and people are urged to use the Internet to their advantage to get a competitive edge around the globe. For instance, the e-Business Forum Working Group D5 highlighted the main obstacles to Greek enterprises' entry into the e-business space in June 2003. Greek commercial and public sector businesses engaged in online commerce were contacted by WG D5, which also offered a number of recommendations to streamline the process. They included increasing communication, being cognizant of privacy concerns, safeguarding personal information, and educating e-business owners[2].

How much new information is needed to construct a collaborative business plan depends on a person's past expertise and knowledge in business courses as well as their cultural background. By examining the effects of individual students' learning in e-business and e-commerce contexts, Foster and Lin came to this conclusion. Busenitz and Lau discovered that certain cultures created more entrepreneurs than others by employing cognitive perspective in the study of pupils from various cultural backgrounds. A recent research conducted across eight nations, including Australia, Slovenia, Mexico, North America, Finland, Scotland, South Africa, and Kenya, revealed similar findings. As part of the McKinsey model-based e-entrepreneurship competition, business plans of new companies in New Zealand were examined to determine the proportion of Internet use. It was discovered at the conclusion of phase two of the competition that individuals with prior IT experience, education, business experience, or personal interest had a much higher Internet component in their business plans than competitors with conventional business experience, such as those for the fields of accounting, retail, entertainment, and games.

### **Exclusive Software Model**

The program is provided in "compiled" or "binary" form, which means that a computer may read and execute it directly. Recently, many high-profile software has been given under a license that regards the software as a "black box." Programmers are unable to examine the internal workings of the software, however. They are not allowed to change the program's functionality, they are not allowed to fully comprehend how the program operates, and they are not allowed to disseminate the software in any of its original, derived, or modified forms. For the most part, a single business or person is in charge of copyrights for proprietary software. In combination with license agreements, these copyrights are used to prevent the "freedom" or "openness" to alter and distribute the software. "Software that is proprietary is neither free or partially free. Its usage,

transfer, or modification is illegal, needs permission, or is so severely constrained that you can't do it without interference[3].

The proprietary software paradigm, as seen from the perspective of the software provider, uses rigorous licensing and secrecy to protect intellectual property. The creation of the program may be seen as entrepreneurial endeavor.

Nevertheless, because modification and resale of current proprietary software are prohibited, proprietary software may not appear like an appealing alternative from the perspective of an e-entrepreneur trying to exploit existing technology. Additionally, the absence of the internal source code may prevent important services connected to the proprietary software from being provided. Another issue is what is known as "vendor lock-in," when a proprietary software vendor is the only company with the legal authority to expand and improve their proprietary software products. As a result, an online business owner who wants to use proprietary software is "locked in" to the provider. No other group or person may provide enhancements or specific adjustments. With the exclusive Windows operating system, Microsoft is the only company capable of releasing security updates and bug patches. Each user of Microsoft Windows effectively suffers vendor lock-in. Users must hopelessly use the program in whatever state it is in until Microsoft chooses to provide a security update or a bug repair. This claim is further upon in the section below that addresses OSS[4].

The writers have utilized the Open Source Initiative definition of OSS wherever they mention it. Access to the underlying source code is required for OSS. In order for software published under a license to be deemed open source, the license must also allow for redistribution of the program without enforcing a fee. Redistribution in source and compiled forms must be allowed. It must be possible to alter the program and produce derivative creations. For a certain software program to qualify as OSS, a few further requirements must be met. The criterion, however, may be the most innovative and basic to someone who is unfamiliar with the OSS paradigm. The word "free software," which is used by many organizations and websites, has a meaning and interpretation that is very similar to that of open source software, with "free" denoting the freedom to read and alter the source code as well as redistribute both unmodified and modified copies. Even if some software may be OSS, strictly speaking, the notion of "free software" may prevent it from being regarded as such. Since all "free" software would be OSS, we will refer to it as such for the sake of simplicity and to avoid any confusion that might arise from using the word "free" in the sense of "at no cost." However, e-entrepreneurs should be aware that it is entirely possible for OSS and "free" software to be "commercial." As an open source example, Red Hat creates Red Hat Enterprise Linux, an operating system that is marketed by yearly subscription. For as long as their membership is active, subscribers are eligible to get regular security updates, bug patches, and new features.

### **Research Techniques**

Since the use of the Internet and other technical means to conduct business continues to rise, we have chosen the exploratory technique to discover the patterns of how OSS has been and will effect the entrepreneurs. Academics have acknowledged the use of interviews as an exploratory research technique. Murray, for instance, utilized the case study approach to determine the function of venture capital investments in newly founded technical enterprises. A number of benefits come with using interviews as a research methodology, including flexibility for both interviewers and interviewees in arranging a mutual time, increased control over the direction of

the questions and a chance to further explore issues, the interviewees' undivided attention, and, last but not least, insight into non-verbal observations like body language[5].

As e-entrepreneurship is a relatively new and understudied field, the authors were operating in uncharted territory. While seeking to get beyond the uncertainty of not having a clear measuring instrument, case study has been approved as a research approach.

In September 2004, chief executives from two entrepreneurial organizations were questioned about their experiences starting, operating, and preserving their companies in the face of rapid technological development. Business A may be categorized as "micro" by the Australian Bureau of Statistics since it only has four workers, whereas Company B can be classed as "small" because it has 25 full-time employees. In today's entrepreneurial environment, where much emphasis is put on using the Internet to carry out commercial operations, the conversations centered on the role of OSS. The interviews were tape-recorded with the participants' permission, followed by transcription and case study writing. They were then submitted back to the interviewers for content verification, and any necessary adjustments were made in accordance. This action was performed to lessen the case study methodology's limitations. Please take notice that the interviewees' identities have not been released and that they are referred to here as Company A and Company B, respectively, in order to preserve their and their organizations' anonymity. Nonetheless, the following parts have included as many verbatim statements from the interviews as feasible[6].

## **Case Study Results**

### **A Company**

The firm, which has its present headquarters in remote New South Wales, Australia, was founded and registered as a partnership corporation in early 2003 before changing its legal status to a proprietary limited company in January 2004. The company has successfully secured and completed projects in both the open source and commercial worlds for both Australian and foreign-based businesses, including those in the UK and the United States. The company is "focused on developing and deploying Web commerce and Linux-based network solutions." On the SourceForge dot-net site, which has over 8,000 projects and downloads listed on its Web site, the company's open source content management system is among the top 2% of the active projects. The firm offers software solutions for pocket PCs, the Palm Operating System, and Microsoft Outlook while having a strong heritage in and concentration on Linux.

Interviewee A defines embedded media as "employing devices and solutions on single chip computers running on open source software." The mission and vision of Company A include generating and growing its revenue in addition to moving toward the field of "embedded media." Each of the Company A directors has expertise in programming, administration, and management, respectively, and is on the path of growing the business. One of the reasons the interviewee decided to start his own business was the drive and freedom it provided. The respondent also want to be able to swiftly adapt to changes in the outside world and technology without having to through the bureaucratic hoops sometimes present in a huge organization. The firm is passionate about technology. This continues to be a driving force for all parties involved, propelling the business forward consistently. According to the interviewee, this is also true for other businesses like Adobe and Apple, where he thinks that the company's mission and the dedication of its technicians kept it running in spite of management changes[7].

One of the topics that interested the interviewers was how the idea of OSS, which entails sharing your expertise for free, may lead to the creation of new revenue for the organization. The "source code" for the software product is released together with the finished, ready-to-use version under an open source license. The interviewers were interested in learning how the individual or organization may benefit from this apparent transfer of intellectual property. These challenges are becoming more important, particularly for e-entrepreneurs, since OSS seems to be gaining speed and acceptability on a global scale. A responded to the question by saying that the authors of a program are often regarded as possessing the most authoritative expertise. He used the following example to illustrate his point: If a program is published as OSS, the writer not only gives information, but also shows it in a way that can be examined by specialists. Also, other organizations may get in touch with the author to have the program customized for them if they need it for their particular purposes.

Dollars enter the scene in this situation. Similar experiences have been experienced by the interviewee. The interviewee was called by a London-based business when they needed him to modify the program's source code to make it work with their accounting system. The company's specialists could theoretically do the customization themselves since they have access to the product's source code. They would need to familiarize themselves with the software's internal workings first, and only then could they alter it. According to a cost-benefit analysis performed by the organization, asking the respondent to use his knowledge and skills to produce the changed code was both simpler and more cost-effective. The interviewee calculates that the task took him around 20 hours to complete, but it may have taken his clients several man-days to do the same task. Consequently, without spending money on marketing or PR services, the candidate was able to obtain a highly specialized, successful company. As opposed to if they had done it themselves, the customer was able to acquire a software solution that met their demands in less time and for less money. So, it was a win-win scenario for all parties. According to respondent A, MySQL AB, the well-known open source database software seller, is a perfect illustration of how the Internet can be utilized extremely successfully as a marketing medium owing to its pervasiveness and almost universal accessibility. The MySQL database server has gained widespread acceptance and usage, even in customized versions, in less than ten years. High-profile customers include Sabre Holdings, Suzuki, and Sony.

It should be noted that not all of Business A's software is open source. Some software is OSS because it is distributed under the "general public license." In other instances, customers may buy software from Company A under a "commercial licence agreement," which includes the supply of routine services by Company A like offering further customization and additions and allows the customer to use the product and examine the source code. Clients are prohibited from altering the source code under the terms of this license. In essence, this is Business A's plan for providing efficient customer assistance. If too many changes are made to the code, Company A would first need to thoroughly analyze the new version in order to provide improvements. It may also be seen as a safety measure adopted by Company A to evade legal consequences brought on by allegations of failing to offer enough assistance in accordance with the licensing agreement of the customized application. But, Company A is not required by law to be able to support the altered version of the code if the purchasing organization modifies the source code without first getting its permission. Of course, the customer is free to contact Company A and/or other suppliers of software solutions to work together on customized versions at a fee[8].

**An intriguing aspect was raised during conversations with Interviewee A:** Business A uses open source software tools in addition to producing open source software. Red Hat Linux has provided commercial services for Company A's open source Linux-based operating system. Also, they are creating some embedded system software, which may end up being a derived and open modification of already existing open source software. Whether a person is thinking about starting their own business or transitioning from being an entrepreneur to an e-entrepreneur, they must first weigh their options and then make the best choice possible. One must choose between deploying brand-new software and using already-existing applications. Further license agreement considerations would also be necessary. According to interviewee A, "Open source is a real alternative for what people are doing. According to statistics, Apache, the most widely used Web server in the world, is typically operated on more than 50% of all Web servers. The finest or most often used database for Web-based applications is MySQL. Business A continues to use proprietary software, such as MYOB, for its accounting requirements since it helps them abide by the necessary standards and laws. The exclusive Microsoft Windows operating system powers MYOB. Business A typically licenses its software as OSS and thinks other organizations should do the same, with the exception of situations when the customers desire that the delivered products remain closed source.

Interviewee A made the observation that whether or not to make their software open source is a business choice that is based on its vision, present market position, ongoing/existing new code development, and future goals. The business decision should take into account the possible life of the code in accordance with the fact that software and code, like any other material product, have their own life cycles. Also, interviewee A added two points that are directly related to e-entrepreneurship. Secondly, as an e-entrepreneur, you may concentrate on the entrepreneurial elements by employing current, dependable open source software rather than "re-inventing the wheel" if you're attempting to design a fresh solution. Second, because businesses are not "locked-in," an e-entrepreneur who offers cutting-edge IT solutions has a more fair playing field. As a result, they can rely on e-entrepreneurs to support, maintain, and improve OSS.

The interviewers also wanted to know whether Business A received any government assistance and if its location in a regional area qualified it for any particular government grants. Interviewee A said that he had requested help from the state administration and that there had been some progress. Nevertheless, the answer has not always been prompt, which may be difficult for small, struggling businesses seeking help since they could not be running after a few months. The bureaucratic setup of the governments may sometimes make the issue worse. Regionally based organizations struggle to persuade authorities of their creative ideas since sometimes they are hesitant to grant funding for new ideas that may be seen as being too risky. A typical illustration is attempting to seek money for open source projects, as government representatives ask the same question the authors do: How can one earn money by sharing their knowledge and expertise?

## **B Company**

Since the late 1980s, the business has been offering its clients cutting-edge, cost-effective solutions built on open systems and open source technologies. To "create strong, continuous connections with its customers and long-term collaborations, based on mutual development and respect with industry suppliers," the firm says in its mission statement. The company's services meet the demands of its clients in a variety of fields, including consulting, application

development, training, and systems administration and network management for software platforms including Unix, Linux, Windows, and Web-based solutions, to mention a few. Company B not only serves a number of small and medium-sized Australian businesses, but it has also successfully completed projects and given training to a number of large corporations, such as Hitachi, Telecom Australia, Kodak Australasia, University of Melbourne, Mobil Oil Australia, CSIRO, RACV Insurance, Rockwell Areospace, ANZ Bank, Schneider electric Data Australia, and VDO Instruments.

In addition to the fact that the computer industry was just getting started and had machines that were enormous, many fewer individuals had access to computers back then than there are now. During the time, young guys who may be considered "geeks" made up the bulk of those working in the business. Computers were only used by big, established businesses like banks and insurance organizations. In the late 1980s, the interviewee first learned about the possibilities for online cooperation and the principles of OSS. Just a tiny group of professionals had access to the Internet at the time. On an internet forum where he participated, he recalled asking questions about the C++ programming language and sometimes getting answers from Bjarne Stroustrup, who developed the language. Yet, due to the state of technology at the time, only those with a strong technical background could benefit from this online community's and communication's near-instantaneous nature. If the general public could access the Internet using methods that they could learn to use pretty simply, interviewee B realized that there was a "huge commercial potential" in this area. Sadly, preliminary feasibility studies showed that the amount of capitalization available was insufficient to pay for the infrastructure required to take advantage of such a chance. Doing consultancy work based on cutting-edge Internet technologies and the associated open standards and software was the best way to get into the industry.

Due to its role as a pioneering company in the OSS industry, Business B enjoys a competitive edge in this field. The business has a strong reputation for offering excellent customer service and attending to the unique demands of its customers. As a result, the company receives a lot of its projects through referrals, as it did in one of its most recent projects when an Australian University contacted the company on the advice of another university to customize its student database to comply with the federal government's reporting guidelines by using the ERP system. The firm successfully completed the project in this case in less than half the time and expense compared to if the company had to build the source code from scratch by using pre-existing codes from "open source framework called Open for Business" and their programming knowledge. The business may lower the cost of its goods by using existing OSS codes, making it more competitive than its rivals. The organization is also able to provide rapid assistance in comparison to other major software companies that may not have their own service offices in Australia since they have access to codes and research and development at their disposal. The business does not tie its customers to a lifetime contract, and those customers have full access to their codes and are free to choose another vendor or business if they so want, without suffering any consequences or disadvantages.

Interviewee B's reasons for continuing to be an e-entrepreneur include his desire to contribute to the "betterment of humanity" through educating others and working in a stimulating industry. While attempting to promote their goods to customers and enterprises, the firm and others in the information technology industry face difficulties. It has been highlighted that the majority of technical professionals lack business and marketing abilities, which may often work against them in the industry.

Interacting with the government sector was a distinct experience for interviewee B and his business. Interviewee B was working with the federal government to develop a document or database that would provide all government "agencies on the purchase of open source software" access at the time of the interview. In the event that a third party chooses to use the OSS modules from the paper, the text would explain the legal repercussions. The database would serve as a networking platform for people and organizations looking to employ OSS modules properly. As a result, the federal government is aiming to "eliminate obstacles to the adoption of open source." The emphasis continues to be on industrial growth at the state government level. One of the biggest Linux projects in the world, at \$40 million, was recently revealed by the government of New South Wales.

The writers were curious to know how Company B, which had been long before the dot-com catastrophe, had managed to endure it as compared to many of its less fortunate rivals. Interviewee B observed that whereas other new businesses at the time hired hundreds of workers within weeks of opening, Business B's personnel count had stayed mostly constant. Several individuals who were thinking about increasing their fortune had also made significant investments in their newly founded businesses. Yet Business B didn't get any of those monies. This in no way implies that the goods and services offered by Company B were any less dependable or competitive. But, their experience had taught them to avoid accepting or investing in impetuous ventures and money. The firm was preserved through strategic thinking, tactical operations, and the use of experienced people, whereas other companies that survived the dot-com meltdown collapsed within days. New information technology companies invested a significant amount of resources in an effort to compete in an already crowded market, which contributed to their failure. They also failed to conduct adequate market and competitive analysis, which is a requirement for starting and operating any type of business.

Interviewee B advised established and aspiring business owners to be aware of any programs and software codes that are covered by current patents throughout the world since even if they are unaware of it, a programmer might be held accountable for possibly copying other proprietary software. He said that the software patent system needed to be either eliminated or made more flexible with clear principles and a database for examining all of the current patents in order for growing economies and enterprises to succeed. Interviewee B predicted that e-entrepreneurship will grow over the next several years in response to a question regarding its future. He used the music business as an example to drive home his argument. Up until recently, gaining fame in the music business required performing in front of a larger audience, and in most cases, it took years to establish a name for oneself and start earning money. But, in the modern day, the performer may create hundreds of CD copies of the song and simultaneously disseminate it globally utilizing technology and the Internet, thereby dominating the global music market. The conventional production and distribution system would not have made this feasible. Interviewee B is certain that the rules governing patents need to be altered for present and future e-entrepreneurs and information technology enterprises, since failure to do so might result in stagnation of growth. Entrepreneurs must also be aware of the circumstances, exercise caution, and seek out full legal advice and protection.

## **CONCLUSION**

Recognizing change, seizing opportunity, accepting risk and responsibility, inventing, making better use of resources, producing new value that is valuable to consumers, and repeating the



process again and over are all characteristics of entrepreneurship. Entrepreneurs are crucial to market economies because they may drive the nation's economic expansion. They encourage new employment by developing new goods and services, which eventually accelerates economic growth. The purpose of a business plan conclusion is to persuade the reader of the company's success by summarizing the plan's advantages. The conclusion should highlight how the firm produces money and why it is a smart investment since businesses often produce business plans in order to get financing or investors.

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## CHAPTER 14

### A BRIEF DISCUSSION ON CUSTOMER SERVICE PERSPECTIVE

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#### **ABSTRACT:**

Consumer perspective is a strategy that looks at a business from the standpoint of the people who use and buy its goods and services. This perspective takes into account an organization's clientele, which is essential to its financial well-being and product sales. In this chapter author discusses the personalized relationship e-marketing and the small medium-sized enterprise. The software tools used by an e-entrepreneur are probably what makes it possible to provide the innovative service that is being offered. In actuality, the product of the entrepreneur can be software or a hybrid of hardware and software. It's crucial for someone who wants to start their own business to learn from the errors of others and not repeat them. The themes that keep coming up in the literature and among the interviews support one another.

#### **KEYWORDS:**

Advertising, Business, Customer, E-Commerce, Entrepreneurial.

#### **INTRODUCTION**

While comparing and contrasting an entrepreneur and an e-entrepreneur, Interviewee B pointed out that both have comparable qualities and abilities. One major difference between the two is that while working in the information technology sector, an e-entrepreneur requires relatively less funds and infrastructure when starting a business and, consequently, less total investment dollars. Both must be able to "visualise future potential above and beyond just the vision for making money." After the service to be provided has been decided upon and a thorough research of the market and competitors has been completed, all that is needed to launch the company, which can be done from any place, is connection to the Internet[1].

Andal and Yip contend that for businesses to succeed in e-business, their business models should include both conventional and new-economy grounds of competitive advantage. Community impacts, first mover advantage, fulfilment/delivery, technology, collaboration, and scalability are some of the widely regarded "e-bases." However, they contend that some start-ups in the e-business sector failed to successfully use these advantages or discovered that they needed to be supplemented with conventional bases of competitive advantage. For instance, combining conventional product/service advantages with the e-base first mover advantage is a good idea. Like in the cases of Amazon.com and Yahoo, being the first to market with a new product or service may have a big impact. Also, even though using cutting-edge technology is regarded as a source of competitive advantage, the majority of it is very simple to duplicate. Despite this, certain businesses, most notably Google, have been able to sell technology by turning it into an asset.

According to the respondents' statements, they are at least oblivious to these consequences. With relation to a developing technology, namely embedded devices and the Internet, both interviewees A and B saw a commercial potential. At the same time, they realized that overcommitting themselves solely on the basis of new technology did not make business sense, so they turned to other revenue streams like consulting and Web development to help them raise the necessary funds and build the necessary infrastructure for the development of their e-business ideas.

Interviewee B emphasized the first-mover e-base of competitive advantage by mentioning that they were the industry pioneers of open source solutions as a significant source of competitive advantage. While possibly less conventional, Interviewee B views their usage of OSS as a source of competitive advantage. When a vendor tells its customers up front that a solution is built using open source software, the customers are comforted that they may turn to other suppliers for maintenance, support, and development if necessary. There is also a strong undercurrent of openness at play; when a business chooses to provide an OSS solution, its whole system may be open to customer inspection. This might instill trust in the customers since a vendor that offers a totally open solution that can be checked by outside technical professionals must unquestionably have faith in the technical quality of their offering.

The relative simplicity with which certain technological capabilities may be duplicated suggests that the inherent worth of the program that delivers such capability is not very high. In situations like these, OSS gives an e-entrepreneur the chance to concentrate on services that are supported by or based on technology rather than squandering resources on building technology that will soon be widely reproduced and accessible anyhow. It is still conceivable, as Google has shown, to attempt to sell technology. Yet to do this, one must make sure that their technology is developing quickly enough to consistently remain ahead. According to Interviewee B, such research and development might be unaffordable for e-business owners, especially in the Australian market where financing can be more difficult to come by than, say, in the United States[2].

Another often mentioned element of competitive advantage is teamwork among a broad group of individuals with a range of skill sets and expertise. Making software accessible as open source enables for engagement from the larger community in addition to team members inside the firm. A virtual user community has developed around one of Interviewee A's open source projects, where some users are able to participate by reporting bugs and asking questions that helped Business A improve the quality of their product. They may even be able to provide "patches," which are little pieces of software code that add features or fix bugs. Interviewee B is also aware of this impact and indicated that Business B is a company that works to donate its knowledge and experience to the development and advancement of the OSS that they use. In this sense, releasing software created by an e-entrepreneur as OSS is not giving away something for free; rather, it is an offer to exchange and share expertise, knowledge, and time with the potential of mutual benefit to the developer of the software and the larger community. Interviewee B refers to the process as a way of "bartering IP." Trading IP with the world successfully has the potential to be a highly effective method of using the synergy that results from a group of people with a variety of skills and experiences. The following three essential characteristics for becoming a successful e-entrepreneur in the OSS industry have been determined by the authors based on their comprehension of the experiences of the respondents[3].

### **Having Technical Competence**

The value of technical proficiency was acknowledged by both interviewees. The degree of knowledge needed and the "wiz-ards" on Company B's personnel were highlighted by interviewee B. By definition, e-entrepreneurial activities are largely reliant on the underlying technology, and interviewee A is passionate about the necessity to be "technically sound" as well. In order to analyze trends and spot possibilities, an e-entrepreneur has to have a solid awareness of both the state-of-the-art of the applicable technology and the underlying concepts. Interviewee B does caution that in the context of Company B, high quality technical ability is often found in people who are unable to communicate well with customers; consequently, the latter can act as a marketing challenge when "tech experts" need to explain their product to their customers in layman's terms.

Although highlighting the product's technical prowess, interviewee A stressed that the emphasis should instead be on what the technology can achieve for the user. The technology should ideally be clear so that the consumer may benefit from it without having to comprehend all of the specifics. They shouldn't often even have to be concerned with whether the solution is open source or not. The customer should understand what the technology can do for them and what the e-entrepreneur can do for them via the services associated with the technical product. These opinions apply to Interviewee A's e-business ideas for embedded media, which are compact, portable gadgets that must by necessity be consumer-specific. These are also pertinent to Business A's offerings for its online content management system. Everyone may use the underlying product, but the real source of income comes from customers who desire services based on the current offering. These services include upkeep of the clients' internet presence and modification of the basic product to suit the clients' particular needs[4].

Surprisingly, while being in a somewhat different sector, Business B strongly identifies with the problems with customer service and technical transparency. They provide a device called the small business server, for instance. This is supposed to be a fully functional solution that can be put up without difficulty or delay. It offers the most often required features for small organizations, including Internet connection sharing and acceleration, email, antivirus, fire walling, and file and printer sharing. Unsurprisingly, all of the software that is installed on the server is open source. But, according to Interviewee B, as long as they are given instructions on how to use and administer it, the customer does not necessarily care or need to know that this is the case. Furthermore, according to interviewee B, the open source nature of the software in this product guarantees that they have total access to and control over every aspect of its functionality. As a result, they are in a position to offer maintenance and service, provided that the client is prepared to pay for such services.

### **Understanding the Motivations for Going OSS**

Both interviewees reject the idea that OSS is a cure-all. It is evident from both of their interviews that a variety of variables affect their decision as to whether or not to make a solution OSS. In fact, Interviewee B remembers being expressly requested to deliver proprietary software-based solutions while doing some consulting work, which Company B felt confident in accomplishing. Hence, e-business owners shouldn't think of OSS as the latest "bandwagon" or as something that has to be used for simply ideological reasons. The interviewees and some of the material already in existence warn against this. Yet, major corporations like IBM, Sun, Red Hat, and Novell show that there might be good commercial reasons for focusing on OSS. In actuality, offers and

services based on both proprietary and open source software are provided by or have been produced by both Companies A and B. Firms A and B both choose to adopt open source for one or more of the following reasons[5]:

Interviewee A made the decision to make Business A's content management system available via the Internet under an open source license in order to take advantage of the distribution and marketing potential of the Internet. The goal was to make downloading and using the software simple and obligation-free for potential clients. They may also check the source to confirm that the product was technically sound if they were technically interested. While a significant portion of users have chosen to use this for free, they have at least learned about the product and Company A; additionally, some of the users have requested services and support for which they have paid Company A. Interviewee B made the observation that the fact that one's software is open source provides additional motivation for commercial entities to test it out. This is because if the original seller is not immediately accessible, a prospective client is still guaranteed to be able to use the program since they have access to the source code and may alter it as necessary.

Don't try to reinvent the wheel. The software itself is the means to a goal when the functioning of the goods and services is crucial. Consequently, using the freely accessible OSS makes more sense for an e-entrepreneur than spending significant resources to redo what has already been done. This may be a key driver for e-entrepreneurs looking to grow swiftly and provide innovative services. Interviewee B discovers that they are able to provide affordable solutions by eliminating a lot of redundant R&D.interaction with the neighborhood. Interviewee A admits that the online community that utilizes Company A's open source content management system has in fact helped the company by asking and offering questions, recommendations, and contributions. Building solutions based on current OSS is seen by interviewee B's company as exchanging intellectual property. Business B gains from the intellectual property created by the creators of OSS already in use and contributes knowledge to these open source initiatives[6].

get the upper hand over producers of proprietary software. A software program could be able to support an e-notation entrepreneur's for a brand-new product or service. The e-entrepreneur often faces competition from large corporations that provide comparable goods and services based on proprietary software. The e-entrepreneur may attract some prospective clients who are turned off by the higher pricing or the closed character of the proprietary suppliers by releasing their product as OSS. Based on bespoke alterations and other support-related actions, these prospective clients might generate income. Of course, the e-entrepreneur should try to come up with a different idea if there are already a number of OSS solutions available.

In addition to the abovementioned commercial factors, several of the problems mentioned by the respondents did seem to have a strong ethical subtext. For instance, Interviewee A believed that making a private product available as OSS after it had reached the end of its useful life would show customers they were not being abandoned. Users of such software would be able to use and maintain the product long after Company A announced it to be discontinued, if they so choose, by being given access to software that Company A had previously created under a proprietary license. Making money isn't as essential to interviewee B as attempting to "make the world a better place."

The love of technology and the joy that comes from creating new technology or following and maybe cooperating with the open source software community as it develops are additional frequent traits[7].We concur with Mahoney and Naughton's assertion that certain organizations

may use OSS as a strategic asset as a consequence of their research. While both respondents claim that it is challenging to discover the "ideals of freedom, volunteering, and a common community of values in today's environment of Monetized Open Source," we can't fully concur with them on this point because of their idealistic inclinations.

### **Flexibility in the workplace and strategic planning**

No of the size of the organization, flexibility is necessary while doing business. The organization has to have a flexible structure, especially in modern technologically advanced corporate climate, in order to be able to adapt to the constantly changing and dynamic environment. Long-term strategic choices that support the company's strategy should also be made concurrently.

### **High Levels of Service Provision**

The need of consistently delivering top-notch customer service must be emphasized. The ability to retain current customers and draw in new ones depends in large part on a company's image.

### **Building Foundational Management Skills**

A successful e-entrepreneur must have fundamental management abilities, including negotiation, leadership, and company planning. Also, a balance must to be maintained between the technological requirements of the organization and its business requirements, particularly those pertaining to the management of its people, including its customers, suppliers, and workers. Regardless of the sort of organization, motivating people will always be a management priority.

### **Considering the Big Picture**

Setting up a new firm demands a major time and money investment, as well as tremendous work. As a result, motivation shouldn't come from short-term gains. It takes time to build a strong and successful company. Making sure that everyone engaged has an open mind and enjoys the trip, which may present multiple obstacles and extremely fulfilling endings, is one method to retain motivation over an extended length of time.

### **Paying attention to technology**

As they will be the ones with personal knowledge of what is occurring in the technology world, managers must routinely connect with their technical staff in order to preserve a competitive advantage. Our grasp of OSS and e-entrepreneurship has improved as a result of this. The literature emphasizes the need for more study in this field, especially in relation to small enterprises using the Internet. Further research is required to fill in the gaps in the literature on OSS and e-entrepreneurship. Further qualitative research integrating in-depth case studies and focus groups to analyze the experiences of e-entrepreneurs in the present technological environment might be one method to start this. It's also important to investigate the experiences of entrepreneurs who are now e-entrepreneurs.

## **DISCUSSION**

Personalized Relationship E-Marketing and the Small Medium-Sized Enterprise. Several small companies are starting to use, at the very least, tactical measures to improve connections with their clients. This paper focuses on a marketing communications firm headquartered in the UK that has created a novel customized relationship e-marketing tool using mobile technology that is targeted at the SME industry. It is explored if SME adoption of current marketing techniques,

such as database marketing and CRM systems, and whether the tool Sign-Up.to is a viable alternative to current CRM systems. The case study firm has created a platform that will help SMEs with their relationship marketing, however the authors draw the conclusion that the relationship marketing ethos must already be ingrained inside the SME. The authors' goal is to demonstrate how technology can be used in the SME sector and to investigate how marketing and technology may complement one another. It is acknowledged that the tiny firm has several traits that make long-term strategic planning difficult. In fact, many small firms believe that the degree of risk involved with marketing and marketing choices is prohibitive, and whatever marketing that they do wind up doing tends to be more tactical than strategic in nature.

Yet, studies show that small and medium-sized businesses are quickly realizing the potential for a competitive edge that may be obtained via e-marketing. According to research, SMEs are creating Web sites to provide basic product range information, which will have an initial major influence on the business-to-customer interaction. The findings reveals that, despite some SMEs' strategic thinking regarding the potential use of the Internet, it is still predominantly focused on marketing communications and sales techniques. Technology improvements in the area of marketing, such the employment of particular software, have undergone substantial adjustments as a result of changes in the broader corporate environment. A large portion of these changes coincided with the change from the transactional to the relational elements of doing business with a client. With the advent of sophisticated measurement systems, lifetime value-based customer targeting, and defection analysis, organizations now have the capabilities to gather and manipulate the consumer data that will help loyalty management. Zineldin's statement that "Relationship marketing will not be built without IT-based connections employing modern technology tools" demonstrates this. CRM software solutions are consequently being used more often as a result. In the meanwhile, smaller companies are beginning to take advantage of the larger e-marketing prospects, and many are starting to use at least tactical solutions to strengthen client interactions.

This case study focuses on a unique customized relationship e-marketing tool created by a UK marketing communications business and targeted at the SME market. Most of the modern technical solutions created to support businesses' marketing initiatives are aimed at bigger corporations rather than the SME sector. The study's objective is to determine if the new e-marketing tool Sign-Up.to can assist SMEs in using technology to further their relationship marketing initiatives without running into the problems and expenses associated with installing the more "established" CRM systems. The paper discusses database marketing and customer relationship management (CRM) before moving on to the experience of SMEs and the use of technology. There is a section on CRM and SMEs. The case company's e-marketing tool is then discussed, with examples of its use provided. The efficiency of it in assisting SME relationship marketing tactics is then concluded.

As the SME starts to benefit from technology advancements, many of these tactical solutions have been centered on marketing communications. If we take a closer look at these developments, it becomes clear that the manipulation of customer data is crucial to satisfy the current measurement obsession, which is supported by the claim made by Buchanan and Gillies that what can be measured or lends itself to measurement is likely to be put into practice. Data manipulation is necessary for measurement; in the context of marketing, this involves consumer data. Although though it is essential to many parts of marketing, the use of particular consumer data has historically been linked to database marketing and direct marketing. It is appropriate to

focus on these words in-depth at this stage given the ambiguity that surrounds their difference. Database marketing, according to Fletcher, Wheeler, and Wright, is the process of using market data to the greatest possible effect across all media. Three objectives are listed for database marketing: strategic improvement through better use of marketing information; identification of strategic advantage through use of customer and market information; and development of long-term customer loyalty demonstrated by a decline in brand switching and an increase in cross-selling. A relational database, a query language for access, software for market segmentation study, forecasting, merge/purge features, and other essentials for database marketing are also discussed. Thus, it should be possible to alter the database in a beneficial way. According to Peters, businesses must utilize consumer information in an organized way if they are to make the most of it and develop connections with their clients. For relationship marketing reasons, customer information files should have profitability data so that the customer lifetime value may be predicted.

Sisodia and Wolfe identify the utility of database marketing and refer to it as "automated transactional marketing." Murphy adds that databases are often product-oriented rather than customer-oriented, highlighting its functional as opposed to strategic character. Database marketing is seen by many as a technique to help keep touch with a client since Morris, Brunyee, and Page said even earlier that it is nothing more than "creating extensive consumer information files, that allows continuing, tailored interactions." Relationship marketing, on the other hand, goes far further than that, emphasizing the growth of a continuing, long-term connection.

Direct marketing is the other marketing discipline often linked to focused data manipulation. Fletcher et al. regard it as a technique of leveraging direct media for a target market. Bird defines it as "any advertising action, which builds and exploits a direct connection between you and your prospect or customer as an individual." Measureability and return on investment are heavily emphasized, which often promotes a short-term focus[9].

While still viewed as tools primarily used for marketing communications, Long et al. acknowledge the part database marketing and direct marketing have played in the growth of relationship marketing: "Companies have identified personal data as the foundation of direct marketing and database marketing, which are two of the immediate forbears of relationship marketing in consumer markets." As a result, there is growing recognition in the academic community that relationship marketing is a product of both database marketing and direct marketing.

Customer relationship management is a new technological advancement that, if only by name, seems to be even more closely related to relationship marketing. In CRM definitions, the company driving the connection is emphasized. CRM, for instance, is described by Galbreath and Rogers as "activities a business performs to identify, qualify, acquire, develop, and retain increasingly loyal and professional customers by delivering the right product or service, to the right customer, through the right channel, at the right time, and at the right cost." CRM maximizes each customer interaction by integrating sales, marketing, customer service, enterprise resource planning, and supply-chain management tasks via business process automation, technology solutions, and information resources. Another description provided by Hamilton describes CRM as "the process of storing and analysing the massive volumes of data created by sales calls, customer-service centers, and real transactions, presumably offering deeper insight into consumer behavior." The use of CRM software systems appears to be a



potential solution for small businesses, and it is understandable that the SME may consider exploring CRM developments as the next stage on from database marketing and direct marketing. CRM also enables businesses to treat different types of customers differently, in some cases, by responding more slowly to those who spend less or charging more to those who require more expensive hand-holding. The SME industry has been acknowledged as the breeding ground for innovation, creativity, and ingenuity. Among SMEs, innovation and company success have been positively correlated, according to Smallbone, North, Vickers, and Roper. When establishing findings and recommendations on how to embed organizational learning to stimulate and maintain innovation, SMEs may not be treated equally across industries, however. In addition to sectoral variations, there is also the matter of size. For instance, the microbusiness owner/manager may be entirely responsible for maintaining innovation.

A devotion to the principles of customer orientation might unfortunately be subordinated or excluded by the owner's or manager's desire for the creation of novel thoughts and ideas, or "innovation orientation." The concept comes first, followed by a market acceptability assessment. So, without the use of marketing, creativity and entrepreneurial spirit may not only prove ineffective in the short term but also fail to embed the knowledge and cultural shifts required to maintain performance over the long run. So, marketing and entrepreneurship should work together harmoniously. Doyle confirms the widely held belief that the two are closely related by citing Peter Drucker as saying that "management have just two primary tasks: marketing and innovation." It is crucial to think imaginatively about markets since they serve as the foundation for effective strategic innovation, as Geroski shown.

It is commonly acknowledged that advancements in communication and information transmission create important prospects for competitive advantage. According to Kanter, encouraging innovation is essential to ensure that businesses stay competitive and dominate their markets. Kanter lists the following qualities and talents as relevant ones: ability to adapt to change, directionality, thoroughness, participatory management methods, persuasiveness, tenacity, and discretion. Quinn created a similar list of the qualities that innovators and entrepreneurs must possess in order for their small businesses to succeed. While SMEs are still surviving, organizational learning is often investigated as a potential reason for why they are unable to maintain their competitive edge in innovation. Being too busy operating the company to care about such changes is one of the concerns related to the time they required to dedicate to innovation, which may be a reflection of the nature of the issues faced by smaller organizations. The problem here is not whether innovation is valued or not, but rather the availability of human resources to commit to this task and get familiar with new technologies. Smallbone et al. noted that technology "may be underutilized" and is more often employed in medium-sized businesses than small businesses.

According to research, SMEs may employ e-business technology less effectively than larger companies since there are less opportunities for organizational learning. A point of view backed up by Dawn, Bodonik, and Dhaliwal, who noted that Canada is an example of poor e-business readiness owing to the low adoption of e-business applications; otherwise, how can SMEs take use of the advantages of the existing technology? Similar to Houghton and Winklhofer, Brown and Lockett also point out the limited involvement of SMEs in e-business. They contend that SMEs must have faith in a third party in order to implement e-business systems with increasing levels of complexity. Trust is a crucial precondition for adoption, whether it comes from the Business itself or its clients. Similarly, Smallbone et al study .s showed a delayed take-up of

online selling within their sample of SMEs, indicating that this may be related to customer hesitation in terms of trust/security. This is what Houghton and Winklhofer describe "a trusting and committed relationship." It appears important to investigate Smallbone et al.'s claim that supply-chain initiatives may boost innovation possibly what Dawn et al. refer to as opportunities to co-commercialize ideas if it is thought that there are hurdles to innovation inside SMEs. According to Smallbone et al., there is a direct correlation between a SME's predisposition for innovation and its participation in external networks. External linkages that might lower risk and increase efficiency. Nonetheless, Freel, Chell, and Baines noted that smaller businesses often have fewer external links. Coviello et al. point out that concentrating on the tactical approach restricts marketing to its conventional transactional marketing framework. They note that a small firm might take a relational strategy and may be more inclined to apply an interaction and network approach to marketing because of its very nature.

As a result, there is a conflict between SMEs being creative and them necessarily being so in other areas. For instance, they could create an innovative product but not an inventive process. Dawn et al. provided background for this position by arguing that SMEs naturally foster innovation and that the Internet may support clusters of SMEs where supply chain participants collaborate.

When one thinks of e-business innovation as a continuum, the problem is exacerbated. Sign-Up.to is functioning as a portal cluster in this case study. It is argued that innovation networks allow communication facilities to reach the right people, creating partnerships of stakeholders and aggregating their competencies for greater chances of innovation success. According to Dawn et al., it is SMEs that "create and commercialize evolutionary new technologies and directly output new innovations." These alliances and networks might be seen as different kinds of relationships. CRM systems are created in a similar way to facilitate contact between suppliers and customers.

## CONCLUSION

Strong commitment to resolving customer complaints and fostering a favorable perception of the business. Excel both in group settings and on your own. Demonstrated capacity to interact with callers in a professional manner, listen intently, and handle issues promptly and effectively. Customer care requires the application of fundamental ethical principles, and any business that wishes to succeed and expand must keep in mind that in order to do so, it must first develop a code of ethics for its employees to follow while interacting with clients. Bad customer service may completely destroy a company. It may lead to the disgruntled client defecting to the competition, resulting in a decline in income and an increase in expenses. Businesses must provide excellent customer service to prevent these effects.

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## CHAPTER 15

# STRATEGIES FOR VIRTUAL LEARNING AND E-ENTREPRENEURSHIP IN HIGHER EDUCATION

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### **ABSTRACT:**

This author presents higher education institutions' plans and how the balanced scorecard technique may be used to characterize them. In higher education, virtual learning and e-entrepreneurship are described under the pedagogical ICT approach. To explain what management thinks must be done to succeed and accomplish the intended results in virtual learning and e-entrepreneurship, strategic themes are provided. A graphical depiction of the strategy is provided by strategy maps. The research also provides an example of collaboration between a university and a spin-off business. These aids educational administrators in better describing and putting into practice solutions for online education and e-business.

### **KEYWORDS:**

Advertising, Business, E-Commerce, Entrepreneurship, Learning.

### **INTRODUCTION**

The adoption, efficiency, and performance of CRM systems have lately come under fire, and Gartner Research estimates that failure rates for these systems hover around 65%. User discontent is largely a result of vendor hype, immature products, and high prices. For the SME, where resources are often few, the risks might be significant given the possible expenses, both monetarily and in terms of the time required to execute properly. These problems help to reinforce small firms' misgivings about marketing, particularly given that their areas of expertise are often unrelated to marketing. Since marketing is not always a top priority, efforts to start using technology from a more strategic perspective may fail.

If we adopt a more philosophical stance, we may identify other issues with how CRM is being used now. According to Law, Lau, and Wang, such a strategy is out of date and consumers shouldn't any longer be categorized and treated as passive groups. According to them, CRM should be approached differently, with the customer as the primary consideration. The notion that relationships should be two-way is one that many businesses may agree, but putting this into reality is challenging. The technology offered under the pretense of CRM only makes this issue worse. Wright and Hurlstone's research questioned whether CRM systems were really customer-focused since many do not provide solutions that directly concentrate on advantages to the end user but instead "sell" benefits based on greater organization efficiency. Another critique is that CRM systems are far from the "customer controlled relationships" described by Law et al. since they often incorporate typical notions of relationship management procedures[1].

### **Business in the Case: Sign-Up.to**

This paper presents a case study of a marketing communications business from the UK that has made an effort to identify and solve the risks and problems with current CRM solutions for SME while taking use of the advantages that technology advancements have brought. In response, the business created a unique tailored relationship e-marketing solution targeted for the SME market. This application, Sign-Up.to, was created to start a personal conversation with prospective consumers and progressively introduce them to the company's messaging. With the help of the web tool Sign-Up.to, anybody can handle data collection, processing, campaigning, administration, and analysis across all channels without needing any technical knowledge. This tool clearly shows and discusses the connections between database marketing, direct marketing, and relationship marketing.

According to Fletcher et al., the Sign-Up.to model clearly demonstrates the fundamental needs for database marketing, including a relational database, tools for market segmentation research, forecasts, and a merge/purge function. Many pieces of the customer's information, any of which may be changed at any moment by the consumer, may be included in the Sign-Up.to database. Consumers do not need to remember to update their information with each business they are enrolled to since every member company database is instantly updated once it is changed. This promotes cross-selling among the participating businesses. Data may be imported from an existing database or gathered using SMS and Online forms. The registration procedure may include any survey questions or other information, and all information collected is automatically confirmed via a double opt-in. Targeting of the database may also be done in great depth. The Sign-Up.to approach manages and organizes data by categorizing it into "products" and "consumer profiles." Although a "consumer profile" just includes a person's name and contact information, the "product" is a potent mailing list. People "subscribe" to items that are developed in the system. This is how information is gathered, enabling the organization to ask the user's consent before contacting them. Each of the goods has a list of consumer profiles because when someone subscribes to one of the products, information from their profile is shared with the company and associated to the product. The contrast between items and profiles enables a company to target its database in extremely specific ways. They may adapt to individual demands by sending subscribers relevant and customised information thanks to this targeting[2].

The impact of direct marketing is particularly evident since Sign-Up.to is intended to be a communication tool that uses direct media to reach a specific target market. Directly to the target market, messages may be produced and distributed by mobile and email. Based on the receivers' Preferences, the right kind of message may be delivered to them, making it simple to keep in touch with thousands of contacts on a regular basis. It is possible to choose the time and date of shipping up to a year in advance. On the surface, Sign-Up.to seems to fit the standards of direct marketing since tracking and data manipulation are key aspects of the platform, a point that Bird brings up as a characteristic of direct marketing. The tracking tool enables the business to preserve a copy of each message delivered, information about who it was sent to, and statistics about the message whenever an email campaign or an SMS is carried out. With the use of these analytics, the company can learn which topics and types of content resonate most with various customer segments, when they read the messages, and even how alternative content formats effect click-through rates. By paying attention to this data, the company may continually enhance campaigns and make them more relevant to the target demographic.

## **CRM Systems vs. Sign-Up.to**

According to the study, the Sign-Up.to platform has advanced toward CRM since communications are now more tailored to the requirements of specific individuals. Sign-Up.com should be able to ensure this loyalty with authorized, suitably targeted messaging and move the small business in this way since CRM and RM are about creating loyalty and loyalty has been highlighted as one of the lasting aspects of a strong relationship. Targeting by area is a tool that small companies can make advantage of, and doing so can often make an advertisement seem much more personal. The likelihood that a customer will utilize a lunch special offer sent by, say, their favorite restaurant that is only around the corner from their place of business on Monday is high since they have already shown interest by signing up. In fact, since mobile is such a personal medium, local offers perform much better because they are less invasive when the recipient is known to the recipient. Another aspect of relationship marketing is that people are more inclined to utilize word-of-mouth recommendations when the sender is nearby.

Also, the tool has fixed a few problems with CRM systems. As previously indicated, a CRM system would be prohibitively expensive for a small company, but the Sign-Up.to solution is considerably more affordable, with a one-time setup fee, no fees for emails sent, and reasonable SMS rates. Another issue is the client's apathy and lack of participation in what ought to be a mutually beneficial relationship. Sign-Up.to, on the other hand, is a permission marketing system, thus it makes sure that the clients it is communicating with desire the connection since they have agreed to receive it. As a result, the company may start a conversation with each customer and make sure that messages are tailored, timely, and relevant. This provides customers with a motivation to provide additional degrees of permission as the conversation develops—more information about themselves and consent to offer them more services and information about offerings. Hence, Sign-Up.to starts to transform customer relationship management into customer controlled relationships in this sense[3].

While Sign-up does solve some of the concerns stated about CRM systems and their disadvantages for small businesses, it has also brought attention to an intriguing oddity in innovation. While being seen as innovative, the SME sector has not embraced the Sign-Up.to product's possibility to the extent that was first envisaged in its business strategy. While the product has been widely promoted to the small company sector and got positive feedback, a significant proportion of SMEs have not yet accepted it. What is intriguing, however, is the kind of company that has embraced it and done so with great success. V2 Music, the record label owned by Richard Branson, is one such company. V2 Music, the label behind artists including Paul Weller, Stereophonics, and Estelle, acquired the Sign-Up.to platform after a very successful trial to handle their global e-mail and mobile marketing and fan engagement. The Sign-Up.to platform has made it possible for V2 to combine more than 100 different databases into a single, globally used system. This gives V2 staff members access to a global view of fan data and enables them to manage localized e-mail and mobile campaigns without the need for specialized training. V2 has already saved an estimated £150,000 thanks to this integration. The adoption was very effective in integrating V2's databases and enhancing fan communications. The features have allowed V2 personnel to be innovative but, more crucially, have allowed them to assess the success of their communications case-by-case, fostering a responsive community.

The solution was successfully deployed by BT and their Mobile Commerce Platform, another company. For BT, Sign-Up.to created, built, and is now maintaining the Click&Buy mobile

commerce platform. This makes it possible for BT's micro-payment systems to securely accept and approve orders over SMS by using a system built on the Sign-Up Mobile Marketeer platform. The Thai government and Duracell are two other organizations that have used the Sign-Up.to platform.

These aren't businesses that were initially targeted as possible clients; instead, they discovered Sign-Up via an Internet search and saw the opportunity for their own company. V2 and BT must be aware of technical advancements if they want to maintain a competitive edge and appeal to their target audiences, who are more likely to be progressive innovators or early adopters in the case of V2 than they are in the case of BT. Some organizations may have been able to see the potential of such a tool because of their knowledge of it and their desire to embrace cutting-edge methods. In response to this change in their target audience, Sign-Up.to created a tool called FanBase that enables artists and labels to gather and store fan data, run email and mobile marketing campaigns, track results, and even directly generate revenue using premium SMS from what is likely their most valuable asset their fans. Contrarily, despite the fact that a significant technical or training investment is not required and is even a feature of the tool, the organizations for which it was designed and those with the know-how and resources to adopt more expensive and technical solutions have welcomed Sign-Up's simplicity and efficiency[4].

## **DISCUSSION**

The creators of Sign-Up.to saw the potential for future advancements in terms of functionality, and recently made a feature that permits accepting mobile payments optionally accessible. This might represent another step for SMEs on the road to e-commerce. The concerns that have been brought up in the context of small businesses must still be addressed, as does the need for a more planned approach to e-marketing. Therefore, it's possible that the following developments will involve advancing SMEs along the e-marketing development pathway by providing comparative data, or they may present a greater opportunity to advance the idea of customer managed relationships by gathering more customer feedback, making the customer the ultimate starting point. Further message integration may be possible, not only between mobile and email but also via additional channels. As McDonald said, a single integrated process, shared data, and a shared technology platform all work together to provide a complete customer experience, lower the likelihood of "experience disconnect," and boost the likelihood of customer retention.

There might be three factors at play in the apparent lack of small company interest in this product. Secondly, it is possible that buyers' unfamiliarity with the technology might prevent them from making a purchase. Smallbone et al. noted that "technology may be underutilized" and that medium-sized businesses are more likely to use it than small businesses, which may indicate that Sign-target Up.to's market has to be reevaluated. Another factor to take into account is the owner's or manager's technical proficiency; those who are comfortable with technological advancements may be distinguished from those who are not. Take-up can be constrained by the SME sector's usual owner/manager dependency[4].

In their sample of SMEs, Smallbone et al study 's found a sluggish uptake of online sales, although they hypothesize that this may be related to consumers' lack of trust or security. So, in order for the example firm to succeed while demonstrating the innovativeness acknowledged by the DTI, it must operate as a reliable link with its supply chain partners. The business reflects a lot of creative best practice traits in that the entrepreneur is a visionary, passionate change agent who is familiar with his clientele. These qualities connect the marketing and entrepreneurial

worlds. Nevertheless, since the product is offered online, bigger businesses that may already have the required technical know-how are more comfortable with the technology, but a smaller business requires a reliable source to sell them the idea in the first place. Taking the proprietor of Sign-Up.to out of the picture makes it harder to build trust.

The next task is to move Sign-Up.to clients along the adoption continuum. Early Sign Up.to users who have experienced its advantages are one group of clients that are receptive to more creative apps like "Fanbase" and V2. These early adopters trusted Sign-Up.to as well, and today they saw the firm as a component of their supply chain. As a result, these clients become the product evangelists who may spread the innovation among the people in their own networks. As a result, the Sign-Up.to product's poor take-up indicates that its advantages are not trickling down to the SME network.

Moreover, because technology is known for its "me too" offerings, Sign-Up.to must keep innovating. The owner of Sign-Up.to is responsible for the product's invention, and as long as he demonstrates the inventive traits outlined by Roffe, it is probable that product improvements will continue. According to Roffe, specific skills are required for each stage of the innovation process, including those of idea generators, gatekeepers of information who are in touch with knowledge sources, product champions who push for new practices, project managers who keep the work moving along, and leaders who inspire and support.

After completing the first three steps, Sign-Up.to must now concentrate on the last two stages. Indeed, on the one hand, these leaders may be seen as other SMEs or SME support organizations, or, on the other hand, the owner of Sign-Up.to must be willing to sell the product in person and hire staff to serve as demonstrators to keep the work on schedule and instill confidence that necessary support is available online[5]. Higher education institutions often make an effort to adapt their tactics to the surrounding area, society, and educational policy. HEIs work to guarantee that their students are competitive and employable. The competitiveness is largely built on strong information and communication technology capabilities. They are associated with entrepreneurship, which the community's stakeholders and educational leaders believe may spur economic development and wellbeing.

This study's main goal is to investigate e-entrepreneurship and virtual learning methodologies in higher education. A specialized functional strategy known as the pedagogical ICT strategy specifies the strategic frameworks for online education and e-entrepreneurship. Finding effective and intelligible ways to communicate and execute the approach is another goal. Development of the organization and its current operations is necessary for strategic management to help the organization reach its future goals. The previous HEI strategies, which are adapted to the demands of the organization and its stakeholders, are often reflected in the new strategies. While the solutions are often very simple, they take into account societal, economic, and educational policy changes.

According to the demands of the local community or society, the plans often concentrate the efforts on certain educational disciplines. The topic of operational excellence is another common tactic. HEIs often work to raise their standards, do more, and cut expenses. The emphasis and general cost-efficiency measures that Porter has described may also be found in business literature[6]. This paper describes a pedagogical ICT strategy using the balanced scorecard method created by Kaplan and Norton. Before the plan can be put into action, it must be understood. Since it transforms the strategy into measurable goals and balances them into four



distinct goals customer and regional development; funding; internal procedures and structures; and learning and growth the balanced scorecard fosters a common understanding of the chosen tactics. The purpose of the current research is to demonstrate how balanced scorecards and competitive tactics may be used at HEIs.

Based on the ideas of strategic planning and the balanced scorecard method, a qualitative analysis is undertaken. The power of qualitative research lies in its emphasis on interpretation how the participants make meaning of these rather than numerical precision. Qualitative data are necessary to explain and exemplify the significance of results in a qualitative investigation. The originality of each of the instances is often preserved when just a limited number of examples are analyzed.

High-quality learning is a focus of Turku Polytechnic's overall strategy. The pedagogical strategy, which offers guidelines for the advancement of education to support the overall strategy, is a functionally specific approach. The educational ICT strategy is centered on the educational approach to online learning and e-entrepreneurship. The functional strategies are in line with the educational departments' plans. Both the broad and targeted plans may be communicated and put into action using the balanced scorecard[6], [7].

A successful method of transferring new information from higher education to the local environment is via the development of new enterprises. The transfer of personnel and expertise from the HEI leads to the spin-off activities. This method of transferring technology and knowledge differs from technology sales, licensing, joint ventures, and alliances in that it transfers the skills and tacit knowledge that are embedded in human capital. E-entrepreneurship and spin-off activities are tools HEIs use to carry out their strategic goal.

This is structured such that the following part discusses the HEI's overarching strategic goals and explains how the balanced scorecard may be utilized to convey and carry out the plan. The ICT pedagogy plan is then provided, with virtual learning and e-entrepreneurship included. The strategy is described using strategic themes and strategy maps. Afterwards, e-entrepreneurship and a spin-off firm example are provided. In the final part, the study's findings are summarized and analyzed[8], [9].

## **CONCLUSION**

The notion that Sign-Up.to is a tactical tool used to replace the more strategic approach that is sometimes absent in small firms persists, despite the fact that it gives small enterprises the chance to acquire competitive advantage via new technical breakthroughs. Also, the platform prioritizes commercial communications above fostering more strategic thinking about possible Internet applications. Notwithstanding these drawbacks, the tool answers some of the complaints about the expense and consumer participation of CRM systems. Using technical advancements, it has modified database marketing and direct marketing to make them usable and accessible. The technology gives the small firm the ability to strengthen client connections and maybe begin to address the larger opportunities connected with e-marketing. The tactical tool will assist in the execution of the strategy and help SMEs accomplish their goals if they are encouraged to think strategically. Nevertheless, Sign-marketability Up.to's is hampered by a lack of strategic thinking, innate technophobia, and the trust problem. Since that Sign-Up.to competes in a fiercely technologically driven business, the owner's challenge is to retain an inventive edge. Organizational learning, both inside his own business and within the businesses of his clients,

seems to be a significant impact. The has debated whether Sign-Up.to is a viable alternative to a CRM system or even whether it is. It is undoubtedly promoted as a relationship marketing tool, but the authors contend that calling it a CRM system is misleading since it does play a part in putting relationship marketing strategies into practice. Nonetheless, it may be claimed that because Sign-Up.to employs permission marketing, it can lead the SME down the relationship marketing road. Does Sign-Up.to provide SMEs a greater opportunity to use technology to foster relationships than other CRM systems do? Insofar as it is technically straightforward and cost-effective, this is undoubtedly a cutting-edge relationship development tool, but its effectiveness relies on whether the SME that uses Sign-Up.to has an RM philosophy in place. Sign-Up.to can face the same criticism as well-established CRM systems if it is just utilized as a tactical tool.

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## CHAPTER 16

### STRATEGIC PLANNING IN HIGHER EDUCATION

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#### **ABSTRACT:**

The procedure an institution uses to achieve its desired future state is known as strategic planning. It serves as a route for getting there. When concrete objectives, demands, and activities are defined, your vision becomes a reality. In this chapter author is discusses the balanced scorecard describes the strategy. To take an organization from its current position to a desired but unknown future position, strategic planning is required. The strategic plan outlines the path that will take us from where we are now to where we want to be in the future. The strategic plan is a comprehensive account of how a company changes to fit its environment and expands its operations for a better future. Porter's competitive strategies provide a broad strategic framework for designing a company's strategy across a variety of organizational types. These methods have also been effectively used in educational institutions. The emphasis approach, chosen by Turku Polytechnic, focuses on the most promising clusters in Southwest Finland. Combining the focus approach with the cost-efficiency strategy makes it possible to allocate resources for high-quality education, research, and development.

#### **KEYWORDS:**

Advertising, Business, E-Commerce, Education, Organization.

#### **INTRODUCTION**

The focus approach calls for the organization to choose a market segment and forge relationships with the segment's most significant partners. The goal of Finnish polytechnics, which are higher education institutions, is to notably benefit their local geographic areas. Each polytechnic has chosen the professional fields in which they instruct professionals. The emphasis approach allows the polytechnics to deepen their understanding of their particular market niches. IT, biotechnology, the metal and marine sectors, as well as these growth clusters, are the most promising in Southwest Finland. As the IT business is largely dependent on the information that graduates have acquired via their education, ICT is particularly well suited for entrepreneurship training and incubator operations. ICT does not have a significant entrance hurdle for most graduates and is not a capital-intensive business[1].

When a company chooses a cost-efficiency strategy, it offers a price and quality combination that is valued by consumers and stakeholders. For educational institutions, which normally have fixed unit-priced financing and yearly budgets, it is an obvious option. To save costs, the technique seeks to eliminate overlapping tasks. Although not being its primary goal, the cost-effectiveness method succeeds in concentrating on certain tasks as well. The cost-effectiveness and focus techniques complement one another.

Balanced Scorecard Describes the Strategy. The balanced scorecard is used to transform the strategy and vision into attainable goals and benchmarks that can be explained and communicated to internal stakeholders as well as external stakeholders. The balanced scorecard methodology may be used to the planning and assessment of strategies. The balanced scorecard uses a balanced mixture of goals from several viewpoints to represent the approach. The demands of the organization might determine how the viewpoints are defined. The following definitions apply to perspectives in higher education:

**Regional Growth and Consumer:** The targeted goals for regional development are included in the viewpoint. It also explains how the internal procedures provide value for both students and companies.

**Finance:** Public financing and external results are described from a financial standpoint. The money is coordinated with the organizational budget's internal systems and procedures.

**Internal Systems and Architecture:** The viewpoint on internal sequential processes and structures of organizational units explains these underlying mechanisms. These procedures provide consumers value.

growth and learning. The learning and development perspective outlines the factors that will affect future performance as well as the knowledge and skills that will be needed for internal operations. Several different organizations in the business and public sectors have discovered that these viewpoints are both required and adequate. The balanced scorecard was first created for commercial organizations.

Yet, in public sector organizations, the financial outcome is often not the main goal. The targeted goals of the private sector are typically in the financial viewpoint. The client or consumer of the services should thus be at the top of the hierarchy[2].

What value do we produce for our customers in the internal processes? is the first question to consider when establishing the goals of regional growth and the customer viewpoint. The next step in the process is to question, "What are the financial goals to support the internal processes?" likewise, "How may the services be produced most cheaply?" The procedure then asks, "What skills and knowledge are needed to accomplish the goals in the internal processes?"

### **The ICT Strategy for Education**

Turku Polytechnic's educational ICT strategy is based on the growth strategies of the Finnish Ministry of Education. In order to improve competitiveness, the goal is to expand pedagogical research and create virtual learning. Skills for implementing, overseeing, and assessing the information flow of contemporary e-networks and the knowledge society should be taught in schools. The plans place a strong focus on the value of local networks that integrate ICT, contemporary collaboration techniques, autonomous learning, public and private partnerships, regional development, and entrepreneurship.

The educational ICT strategy is a component of Turku Polytechnic's pedagogical approach. The pedagogical approach is a useful technique that offers broad guidelines for how education should progress. The growth of virtual learning and e-entrepreneurship is emphasized by the pedagogical ICT approach. The departmental and functional strategies are in line with the pedagogical approach.

The European e-business Report defines e-business as automated business operations through computer-mediated networks. It has been completed in strict line with the OECD's definition. E-entrepreneurs are essentially businesspeople who use the Internet to their advantage. Many of them may be interested in integrating an online component into a more conventional firm, even though they may not be experts in ICT or internet technology. E-entrepreneurship and virtual learning are related in the realm of education.

## **DISCUSSION**

New working and learning environments, new content production techniques, content creation, communication and collaboration in e-networks, guidance and assessment, information security, and copyright are all part of the pedagogical evolution. The evolution of pedagogy results in a broad diversity of instructional strategies, subject matter, and workplace integration. The goal is to deliver the necessary skills to public and commercial sector partners on a local, national, and worldwide level. As virtual learning is established, new types of communication and online communities arise in e-networks. A popular strategy for creating virtual education has been implemented by the Finnish Virtual Polytechnic, a cooperative development network of all 31 polytechnics in Finland. At first, assistance and direction are crucial. Independent learning and assistance come after this. Lastly, instructors and students may use a range of adaptable virtual teaching and learning techniques. The following is a description of the methodology used to construct virtual learning:

Facilitated and supported online learning. The foundation of guided and assisted virtual learning is group collaboration in the classroom, where the instructor and students communicate with one another utilizing a variety of digital tools. Education activities that include debates and agreements on e-networks in pairs and groups are possible[3]. Using e-networks for independent learning. With the aid of the instructions and virtual material in e-networks, the students study and resolve issues on their own. Autonomous learning excludes contact with other students or interactive help from the teacher. Many ways to learn. Implementation incorporates a variety of adaptable teaching techniques. Both remote and in-person sessions are used for instruction. The study has several different forms. The students may attend lectures, study alone, in pairs, big groups, or autonomously. Students utilize electronic networks, and learning may occur at school, at work, or at home. Both in-person sessions and online meetings must include student participation.

### **Tactical Themes**

Strategic themes outline the actions management thinks are necessary to take in order to succeed and provide the desired results from each viewpoint. They explain the causal connections between them and are consistent with the aims. Each organization has a distinct collection of strategic themes that are related to the ability for the organization to provide value to its surroundings. Since the actions constitute the core of the strategy, the strategic themes are also connected to the organization's internal operations.

The pedagogical ICT strategy's strategic topics have their foundations in educational policy, local community requirements, and development work in e-commerce and virtual learning. At Turku Polytechnic, the definition of strategic themes generated a lot of thought. The following may be used to express the broad strategy statement and strategic themes[4]:

1. Skills for e-entrepreneurship and virtual learning in the workplace:
2. Virtual learning makes use of a variety of educational techniques.
3. The program includes virtual learning.
4. The study modules are designed and implemented by teacher teams.
5. The educational materials are used in a wider environment.
6. There is an upsurge in the exchange of virtual learning materials amongst HEIs.
7. It promotes the HEI's entrepreneurial and intrapreneurship culture.

With a focus on the students' interactive abilities and capacity for self reflection, problem-based and virtual learning are particularly prominent among the educational techniques. Working together as a team, instructors must have a common concept of virtual learning. With the National Virtual Polytechnic, the virtual learning materials are portable and utilized in other degree programs, the Open Polytechnic, and other polytechnics. For the creation of online learning materials, collaborative teams are present. The partners of the production teams buy and sell the materials among the various institutions. This encourages instructors to pursue their own businesses.

### **Strategic Plan**

The organizational structure is shown graphically in the strategy map created by Kaplan and Norton. The strategy map enables stakeholders and workers to comprehend the rationale behind the organization's goals as well as the means by which they might be met. It acts as a simplified road map that highlights just the most important aspects of the approach[5].

An intelligible "organisational theory" of value creation is necessary for the explanation and communication of strategy. The strategic themes may be converted into goals situated in various viewpoints using strategy maps. They also provide resources for describing the relationships that relate the goals causally. Via a series of linkages between performance drivers and result metrics, the measurement system identifies the strategy.

The goals of an organization are clearly stated in the strategy map, along with the rationale behind why they were chosen. Before putting the plan into practice, it must be understood. The organization's strategy and vision serve as the foundation for the goals, accompanying measurements, and performance targets, which are balanced among four distinct viewpoints. The effectiveness of organizational components and employees is closely related to the strategy.

### **Customers' perspective and regional development**

The primary goal of this viewpoint is to provide all students with effective virtual learning skills so they may use them in both adult education and the workplace. Turku Polytechnic is transitioning from a closed learning environment to an independent and open expert organization and network that supports continuous learning, in accordance with the pedagogical philosophy. Along with businesses and other organizations involved in the working world, the polytechnic creates and offers learning and working settings that encourage experimentation and the study of novel practices.

Developing entrepreneurial skills is another goal. The entrepreneurial training includes a variety of learning modalities, including projects, practical training, and theses, which are shared with spin-off businesses and other client organizations. Methods for contemporary entrepreneurship

training and incubator operations are developed via research and development. Moreover, e-entrepreneurship training and virtual learning are included in continuing education.

Moreover, achieving client satisfaction via e-networking is the goal. Achieving customer happiness is a goal that almost all businesses have. The Polytechnic's mission is to assist its clients' abilities for online study, working life, and e-entrepreneurship. The goal is to create enduring connections with customers that support ongoing collaboration between the educational institution and client organizations and lifelong learning.

### **The Financial Viewpoint**

The Ministry of Education must provide enough financing, which is the primary budgetary goal. The Ministry provides funding for the lengthier educational programs for continuing education and degree programs. Moreover, it contributes to the funding of certain significant national or regional development initiatives as well as research and development. Obtaining appropriate funds from the City of Turku is another budgetary goal. The City of Turku, the proprietor of Turku Polytechnic, receives the money from the Ministry of Education. A small portion of the funds is contributed by the City of Turku. Turku Polytechnic uses certain software that is supported by the city. For instance, it funds and develops the municipal organizations' common intranet and extranet solutions[6]. The growth of outside money is another goal. The majority of the money that the Polytechnic receives from outside sources goes into services, research and development, and continuing education. The European Social Fund, additional money, businesses, government agencies, and the Finnish Virtual Polytechnic are some of the financing sources. The money from outside sources is utilized to produce new materials and raise standards in schooling.

### **Viewpoint on Internal Processes and Structures**

The creation of virtual learning material and methodologies uses research and development. Through collaboration and networking with other educational institutions, content is also necessary. The curriculum is often developed along with the production of the virtual learning material. Infrastructure, library, and information service development are all supported by research and development. The Turku Polytechnic's Pedagogical Support Unit works to further educational advancement in a variety of methods. The creation and adoption of fresh virtual learning strategies are examples of support activities. Other additional growth philosophies, such as problem-based, work-based, and research-based learning, are also a part of educational development. These methods may be coupled with online education.

Quality control is based on established protocols. The European Ministers have agreed on the Bologna Process' development of quality assurance. By 2010, the establishment of the European Higher Education Area will be centered on quality assurance. Each HEI is in charge of quality control, which reflects their academic and organizational autonomy. This gives the national quality framework's accountability a foundation. The EHEA's goal is to encourage staff and student mobility throughout Europe[7].

The ICT infrastructure is made up of various hardware, software, systems, and data networks. They consist of mobile learning tools for individuals, wireless networks, and contemporary audiovisual solutions. The Polytechnic's ICT Unit is creating an electronic learning site based on the departments' already-existing network services, virtual learning environments, digital

information sources, e-business tools, and information services. Information security is addressed while physical and virtual learning environments are designed collaboratively.

For students and employees, the library offers the primary electronic sources and databases. They get assistance from the library in locating pertinent material as well as tools for information processing. In addition to actively participating in virtual learning initiatives, librarians also actively teach in degree programs and staff training. Collaboration is required between the members of working life organizations, instructors, students, and researchers. The production of printed books and periodicals is decreased by using electronic versions.

In Finnish HEIs, virtual learning is growing. Each bachelor student must get at least 30 credits in virtual education, according to a goal established by the government. Other methods of learning are available via virtual learning, particularly for people who work while they are in school. The substitution of virtual learning for face-to-face instruction helps working students avoid dropping out. The online learning environment may also be utilized for additional tasks including study guidance, international projects, tutoring during practical training, and ongoing education[8].

An significant trait of the internal procedures and structures is cooperation with other HEIs. Turku Polytechnic takes part in a number of the Finnish Virtual Polytechnic's production teams. Normally, a legal agreement is made by the production team of numerous universities to generate virtual learning materials. The contract also specifies how the institutions will conduct their financial dealings. In order to join the production teams, an institution often needs cooperative and entrepreneurial teaching teams.

Large study archives may be created by networking from tiny virtual learning resources. The network itself is utilized as a tool for guiding, allowing teachers and students to choose the information that best suits their individual need. The goal is to use the learning content several times in various learning contexts or educational levels. The different demands of adult education in working life conditions are often best met by the smaller courses.

### **A view of learning and development**

As the expert team for virtual learning produces the strategic plan with the experts and management team of the polytechnic, strategic awareness is established. To update the plan, the current approach and any environmental or technological changes are assessed. The Turku Polytechnic Board has given its approval to the plan. The balanced scorecard is then used to communicate and execute the plan.

An essential means of introducing new techniques and software for virtual learning and e-entrepreneurship is via personnel training. The Polytechnic's departments are in charge of the personnel's short-term training and working lives. Longer staff training is provided by the Polytechnic's People Development Unit, which also establishes the prerequisites for the pedagogical ICT strategy's execution.

When Turku Polytechnic's quality system was being established, the capabilities of quality assurance were also continuously expanding. Virtual learning uses quality assurance techniques that have been established. The methods and materials include input from students and employers, internal audits, internal target talks, and assessments from the Finnish Higher Education Evaluation Council. They also contain the institution's quality handbook.



## **Entrepreneurship online for a spin-off business**

### **A Partner Business from a Spin-Off**

The transfer of personnel and intellectual property from educational institutions leads to the spin-off businesses. Technology transfer differs from technology sales, licensing, joint ventures, and alliances in that it involves the ongoing transfer of skills and tacit knowledge reflected in human capital. An efficient strategy to translate HEI knowledge into the working world and make it marketable is to promote start-up businesses. The Mansoft Tietotekniikka Ltd. case is used as an example to show how the Turku Polytechnic's educational ICT strategy is executed and how technology transfer occurs. A spin-off firm in the software industry and application development is called Mansoft Tietotekniikka Ltd. One of the senior lecturers at the Polytechnic started the business. He continues to serve as the company's managing director.

Mansoft Tietotekniikka Ltd.'s mission is to acquire the knowledge necessary to satisfy customers. The items are customized to match the demands of the clients in order to accomplish this goal. According to Adamsson and Puukka, Mansoft Tietotekniikka Ltd.'s plan also includes working with Turku Polytechnic. The business has developed solutions to address certain requirements of knowledge-based organizations. Moreover, it provides consultation, upkeep services, and a number of packaged goods with a fixed service. It seeks to be a successful and secure partner in enduring client relationships as a financially independent and customer-oriented business.

The business has grown in a sustainable manner. Profit from the business has always been invested in expanding the firm and creating new products. All eight of the company's young, permanent workers are Turku Polytechnic graduates. Offering young specialists beginning their careers in the IT industry permanent work has been one of the primary tenets of corporate philosophy. The managing director of Mansoft Tietotekniikka Ltd. is a representative on the Advisory Board for Turku Polytechnic. The Finnish polytechnics' advisory boards, which include people from the working world, assist them in developing their curricula to fulfill the demands of businesses and other organizations. The advisory board is a group of professionals that assist the polytechnic and the participating businesses in adapting to environmental changes and developing new development ideas.

The company's recruiting efforts are concentrated on Turku Polytechnic final-year students. The educational program at Turku Polytechnic has been designed to allow students to take part in business ventures. Another method of collaboration between Turku Polytechnic and Mansoft Tietotekniikka Ltd. is the organization of the ICT expo. At Loimaa, home of Turku Polytechnic, the ICT Fair is held. Small local businesses benefit from the fair's assistance with marketing, hiring new employees, and participating in regional development.

According to the business owner, some customers have stated that in order for the company to gain credibility, it should hire more experienced professionals. However, the managing director believes that young employees bring more flexibility, new ideas, and fewer preconceived notions about the company's culture. The managing director, who handles client relations and project management, runs the firm. The younger team members are in charge of developing the software and systems. The manager's extensive knowledge and the youthful employees' innovative ideas compliment each other in the workplace. This is a crucial aspect of the company's social capital and competitive advantage.

## **Development of Software in Collaboration**

Project management software was created by Turku Polytechnic for itself and other knowledge-intensive organizations. Mansoft Tietotekniikka Ltd. collaborated in the development of the Projektori software. Projektori was first developed to oversee intranet development projects. The usage of the program was then extended into other project-related tasks by Turku Polytechnic's R&D section. For instance, it may be used to provide project information online and manage project planning. The software is an asset in many initiatives that get public funding thanks to these qualities. For cooperative projects to use various intranet and extranet choices, the program was created to be utilized in data networks. The partners often agree on their respective responsibilities. Although Mansoft Tietotekniikka Ltd. is in charge of the database design and implementation, Turku Polytechnic is in charge of the content planning and production.

The Polytechnic's strategic goals and quality assurance manual provide the rules for collaboration. A significant trait of Finnish polytechnics is regional growth, and this collaboration with the spin-off company exemplifies this trait. Project management principles may be found in the quality handbook. The generally recognized requirements of databases and the action models of big organizations may be used to trace many of the fundamental principles of collaboration and software solutions.

The Projektori software transforms organizational behavior into excellent project management; it is more than just a technological tool for organizing papers. The software directs people and organizations toward a team- and process-oriented organizational culture. Moreover, it offers a virtual gathering space and an interactive connection for businesses in the public and private sectors as well as other organizations involved in the working world.

With the assistance of Mansoft Tietotekniikka Ltd., Turku Polytechnic has also marketed the Projektori software to a number of other significant knowledge-intensive organizations in Finland. Installing the program on the client's server enables the purchase of the software's user rights. By putting the database and application on Mansoft Tietotekniikka Oy's servers, it may also be hired as an application service provider solution. The program and its daily database backup are both included in the rental fee.

The Puplicaattori software, which is intended for e-publishing, is one example of another piece of software that may be linked with the Projektori program. The Publishing Unit of Turku Polytechnic and Mansoft Tietotekniikka Ltd. collaborated to create this software. Both pieces of software are available for purchase and may be used independently. The program contributes to the expansion of Web-based resources, which are used more often in educational settings.

## **CONCLUSION**

In today's information world, communication and informational abilities are essential. In most sectors, these abilities are among the fundamental professional competencies. The ideal person is one who is knowledgeable about information sources, has information reading skills, is adept at gathering and transmitting information effectively, evaluates the information they have learned, and uses that knowledge in a morally and legally responsible manner. Turku Polytechnic's general strategy statement is "high-quality and flexible learning." The plan focuses on meeting the requirements of Southwest Finland's expanding clusters. One of the most well-known clusters is the ICT cluster, which also includes the mobile phone, TV, and software industries.

Perhaps one of the most well-known businesses in this area is Nokia Mobile Phones Ltd. The plan also emphasizes training in entrepreneurship, which covers e-commerce, incubator operations, and other types of entrepreneurships. At Turku Polytechnic, the pedagogical ICT strategy is a particular functional strategy that is in line with the institution's overall strategy, other functional strategies, and departmental strategies. The virtual learning and e-entrepreneurship strategic plan is described in the pedagogical ICT strategy. The various pedagogical methods, the incorporation of virtual learning into the curriculum, the function of teacher teams, the use of learning materials in a broader context, interactions with other educational institutions, and an entrepreneurial culture are some of the strategic themes of the pedagogical ICT strategy. In order to achieve the strategic themes, goals, and metrics for online learning and e-entrepreneurship, the balanced scorecard technique is helpful. The balanced scorecard's many views were represented graphically by the strategy map, which accurately depicts the strategy's goals. It was used to outline the key elements of the plan to improve proficiency in online education and e-entrepreneurship. A case study of the instructional ICT approach in action was provided. This case study demonstrates the establishment of a spin-off firm and how it works with a university. Graduate recruitment follows project-based education. The spin-off company's competitive edge is built on ongoing collaboration with the HEI and the creative and original ideas of the graduates it employs.

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## CHAPTER 17

# BEGINNINGS OF A POSTAL E-MARKETPLACE: INNOVATION OR NATURAL EVOLUTION

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### ABSTRACT:

The corProcure company's e-business case study is useful because it illustrates three recurring elements of the dot-com era: First, in response to the demand from the corporate world to embrace the dot-com era, a number of significant corporate institutions developed the corProcure business model, which seems to be strong but is really rather weak. The fast realization that the founding corporate partners were not consistent with the original business plan. Australia Post, one of the partners, purchased the company and changed the course of corProcure to a more viable e-marketplace business strategy. This was seen as the best course of action.

### KEYWORDS:

Business, E-Commerce, Marketplace, Strategies, Services.

### INTRODUCTION

This evolution, learning curve, and redirection of the e-purchasing cartel was in one way just a snapshot at the macro-level of what happened to many ventures during the dot-com boom. At the micro-level, the change in direction was reflective of a more pragmatic business sense approach, when all the late 1990s hype was stripped away from the initial e-business model. The new business model incorporating an e-marketplace also reflected the need for the new owner to diversify into non-traditional products as part of new e-business and e-logistic strategies. These strategies were being examined globally by Postal Authorities. In 2001, the Universal Postal Union and the World Bank released a report that proposed that the Post Office was potentially headed for being a sunset industry unless it addressed the issue of its product erosion. A further international postal e-logistics report examined various ways that this “postal sunset industry mentality” could be addressed and the actual declines arrested through the introduction of some critical strategies. In Australia, however, since the advent of the dot-com wave, what was the local postal authority doing to stem the stagnation in the demand for its traditional postal products? Was it trying to leverage the new Internet-based technologies, thus enabling a range of new services?

What the Post Office did was change its focus to internal e-procurement and implement utility bill payments. As well, Australia Post instigated a warehousing and fulfillment business, which ran in parallel to the existing postal network. What was perceived to be the e-business “showstopper” was its partnership with 13 other major corporates, in a buying consortium called “corProcure”. This buyers’ club began life at the tail end of the dot-com hype in 2000. By January 2002, the 13 partners cleared the deck chairs and allowed Australia Post to purchase the

corProcure entity and technology. Why had the potentially largest buying cartel failed so quickly? What lessons were learned and what was the obvious e-business strategy that needed to be implemented?[1]

### **Background to the Evolution of a Postal E-Marketplace**

In 2003, a study into the impacts of e-logistics and e-business and what it might mean to the traditional post office was published through the Universal Postal Union. The research surveys spanned 40 countries with the summary findings being refereed by the e-commerce Unit, Postal Technology Branch of the Universal Postal Union. The UPU, which is a division of the United Nations, is the coordinating and representative body of all national postal authorities at the international level. The research findings were listed on the UPU's Web site in January 2004.

### **E-Postal Research Findings**

In a reassessment, the global post office needs not become a sunset industry, as was suggested, if it were to embrace new electronic products. Many of these products could be facilitated by the adoption of new Internet-based technologies and the processes that this technology may play in enhancing the traditional postal services. The first round of this research was conducted by the Centre for Freight & Logistics Research, as a Delphi survey through 28 interviews across some 11 countries.

The highest scoring strategy emerging from the survey was to embrace "new electronic products." With regard to the specific electronic and logistics products described in 1, the proposition for a postal e-marketplace scored highest in the future directions estimates with some 43% more important in future strategic and business focus than at the current time. In fact, 8 of the 12 options had a future importance factor of some 25% greater than their current perceived importance. This examines the history and potential for the launch of a major postal e-marketplace from Australia in what is a rapidly changing electronic and Internet environment.

Fundamental Business Issues for Markets and Even Postal E-Marketplaces. To be effective, markets require participants to share their business processes. Companies are increasingly unwilling to standardise these processes as they seek to maintain their uniqueness as a competitive advantage and control over their supply chain for purchasing direct goods. This is not the case, however, for indirect goods. For this reason, horizontal marketplaces have better success in connecting traders than do vertical ones[2].

### **The Need for New Services as Deregulation Grows on the Home Front**

While postal volumes were declining in many countries during the 1990s, on the Australian domestic scene, micro economic reform also was occurring. This meant continued deregulation across many industries including the Postal Industry. Following an Industry Commission review in 1992, Australia Post's monopoly was reduced in 1994 and more services were opened up to competition. Australia Post retained a monopoly over mail weighing up to 250 grams and with a minimum charge of \$1.80. This meant that couriers and freight operators could pick up and deliver much business and industrial mail, which was heavier or cost more than this price threshold. In 1995, "GiroPost," a multi-bank Eftpos option was introduced as part of a range of financial transactional services, such as utility bill paying, at Post retail outlets. In 1995 as well, a five-year postal network renewal program costing \$500 million began, aiming to equip Post with the latest technology for mail processing and delivery operations.

The Australian National Competition Council again reviewed Australia Post's operations in March 1998 and recommended an almost complete deregulation of mail services by 2000, except for standard personal letters sent by households within Australia. Australia Post would be exposed to competition in 93% of its services, compared with only 50% in 1998. Australia Post's submission to the Council had argued for the retention of the current position, with a review in 2003. Linda Nicholls, the chair of Australia Post, had commented that the report went further and faster than Post believed was practical. She noted that the NCC had no plans for any safeguard if the changes had unexpected outcomes. Graeme Samuel, the then president of the National Competition Council, responded that Post was abnormally profitable with returns double that expected from such a business[3].

## DISCUSSION

### **The New Focus at the Global Postal Level**

Due to the danger posed by technological alternatives to conventional income streams, Australia Post and other postal organizations throughout the globe are facing difficulties. Competitors of Post, such as other postal organizations, have expanding global aspirations and look for new markets and chances that take use of network economies of scale. Customers of Post want them to have a deeper understanding of them and their companies than ever before and to be able to communicate with them online. E-business is a catalyst for value development and innovation. Notwithstanding its difficulties, online commerce will continue to expand, giving Post a wide range of prospects. Personal bills are increasingly being presented and paid electronically rather than via the mail or in-person at post offices. Online shopping is also seeing a surge in popularity as businesses look for ways to save costs and improve the daily procurement process. E-business is primarily driven by increased production via efficiency benefits in numerous organizations, including Postal Authorities. Australia Post's 1999-2000 Annual Report quotes Thomas E. Leavey, director general of the Universal Postal Union, as saying that the challenge for postal services is to be completely immersed with customer concerns, proactively seeking to determine their needs, and paying attention to how they rate the services provided. Customers are now at the heart of every successful company's strategy, from manufacturers to banks, and they drive the dynamics of the new millennium business environment[4].

A postal e-market business is supported by an e-logistics and e-business front. The primary future "strategic and business" initiative, however, was to "offer an e-marketplace" to small businesses and to large businesses. This was in contrast to the major "operational" finding from the first round of Delphi analysis into future Postal e-business options, which was that some sort of "track and trace" mechanism should be available to customers for "selected postal products." The Postal Authorities have never heard of such an electronic marketplace. As a result, every selected e-postal marketplace model will have a wide range of applications and marketplace business regulations. For the conventional Post Office culture, gaining acceptability for such a novel product—be it an e-marketplace itself is rife with difficulties. Yet, if an e-marketplace is effective in a given nation, this idea will likely spark more interest outside than any postal product has in the previous 30 years[5].

### **E-Marketplace Fulfillment Overview**

An e-marketplace allows for the following fulfillment and delivery services: Via a variety of third-party logistics companies the buyer has chosen, via the fulfillment procedures and services

offered by the marketplace operator, and via logistical companies who also operate e-booths on the market. For overseas businesses looking to do physical commerce in, say, Australia, this third choice is a vital one. For service X, who do you contact? Attempt the market. This may be for a piece of office real estate, professional financial counsel, shipping services, a bottle of champagne for a birthday, and so on. Finding the correct balance in fulfillment often depends heavily on the consumer. Several markets provide B2B and B2C services through express and non-express transport providers as well as the postal service. Similar services for B2B and B2C customers should be provided by a postal e-marketplace, i.e., services that are also provided by other online trade hubs or other e-marketplaces.

### **B2B Fulfillment Via the Post Office Challenges**

B2B is a relatively general term, yet there are a lot of subcategories inside it. During the OECD/ECMT e-transport and e-logistics summit, this was brought up. The simplest approach to supply B2B services for a marketplace, however, is to list B2B service providers. In order to expand their postal parcels competence, postal authorities like LaPoste and Deutsche Post, through Danzas and AEI, as well as New Zealand Post, have all purchased a variety of premium and non-premium B2B logistics companies.

In terms of future strategic relevance, creating an e-marketplace actually came in second to the provision of a "warehousing and freight competence." Instead of a single channel provided by a long-term chosen provider, a typical postal authority that may be unfamiliar with the demands of B2B would likely benefit from having access to B2B fulfillment services via its own marketplace. By doing this, a considerably greater selection of fulfillment services may be made available to any client in need of these B2B services, with a great deal of flexibility.

In the initial investigation, a third B2B alternative was looked at: the postal authority may provide a B2B capability but with different customer service requirements than those provided for current postal goods. It was discussed as being relatively unfavorable to combine B2B with the current postal network with both Deutsche Post Logistics and La Poste's storage and fulfillment divisions. New freight organizations were bought particularly for the aim of providing B2B freight and storage at varying service levels. These activities often operated from separate terminal and distribution facilities.

B2B fulfillment agents and services have to be included on the e-marketplace from the standpoint of the marketplace as these services won't be sought from the marketplace owner but rather from specialized customers who may even be e-booth holders on the marketplace themselves. B2C may be made more prevalent in the market by using new delivery methods. B2C is regarded as each domestic Postal Authority's area of expertise. Might this, however, alter in the future? Twelve home delivery methods are shown in Table 1. Less than half of these alternatives were provided by the various Postal authorities that took part in the e-postal business study.

More specialized home delivery services, which will compete with the post office, are unquestionably to be anticipated on the home shopping front. More so than any one choice or delivery plan, new combinations of delivery techniques will develop and will give a better degree of consumer satisfaction. Undoubtedly, the precise goods being supplied will also limit many of the consumer's delivery options. For such deliveries when the population base is quite

vast, specialist operators have even been created for high value commodities and heavy goods like garden furniture[6].

### **Possibilities for International Fulfillment for B2C and B2B**

The following new demand patterns emerged from an examination of worldwide Internet buying needs. This change demonstrated that there was plenty of room for new international postal services to develop in support of both international B2B and B2C. In all situations, an international 5-business-day service, or even one that lasts fewer than 7 days, would be a very advantageous choice that international postal authorities should seriously explore. This "delayed express" service option often reaches both capital cities and significant regional cities in other nations. The service would be far more accommodating than the standard 10-day international air services that postal agencies presently provide for overseas goods. One of the biggest advantages of finding suppliers on the Web was and still is the ability to make purchases at a discount. This is presumably true in a business-to-business context. Consider a small- to medium-sized manufacturer in the US or Europe. This manufacturer obtains three inputs for the manufacturing process of his or her company. If the suppliers don't have a website, there may be hundreds of vendors that provide the inputs that this tiny business is unaware of. The suppliers can be in a neighboring nation or, in a European setting, a neighboring state. The supplier's website may be used with some trust and better business transactions can be made if language is not a barrier.

A small producer will almost definitely be familiar with all of the prospective suppliers for his needs in an Australian B2B setting. Australia is an island continent with just 0.3% of the population of the new Europe and North America but almost half the geographic area. B2B product sourcing is substantially more constrained than if this business were run from a European, American, or even Asian basis, unless the Web provides cheaper, or more dependable, foreign sources for the manufacturer's inputs. That is, until the base is relocated to one of these places where less expensive supplies can be procured, it is more constrained. Nonetheless, it may be argued that the buying power of B2B customers on the Internet is constrained if the manufacturing stays in Australia[7], [8].

### **Language Issues**

Just a small percentage of websites could be translated into the preferred language of a prospective web user, despite the fact that this has increased since 2003. Since the Internet site is only developed in one language, a possible supplier to a manufacturer who could be a close neighbor would not be able to let that potential client know about them. These choices are now included in software packages being provided by software companies since this has subsequently been identified as a barrier. Disintermediation is another another way that B2B and B2C differ. Since the Internet now offers connection where information linkages were previously non-existent, buying new products and services online is a reality. Every new selling site will undoubtedly be discovered by B2C users when they are browsing.

It is probably only marginally accurate to assume that a less individualized sales force for commercial items would be replaced by an impersonal Web site provider. Most likely, non-relationship-based B2B providers will not win out over the Web's "dis-intermediary" character. This was the main message of a presentation on Chinese business partnerships and collaboration that was given at the 5th International Conference of Quality Management and Innovation in 2001 in Melbourne, Australia. In a B2B setting, a website could draw short-term rivalry and



distraction, but long-term partnerships are also very valuable to all firms. Consider the balance with this contrast between an impersonal website and long-term personal business ties when entering the Chinese B2B market, for example. B2B interactions often promote the adoption and utilization of online marketplace trade activities.

### **Avoiding the Market Conflict of Interest: A Public Marketplace vs. Postal Owner Interest**

Even if it puts the post office itself in competition, the marketplace should make it easier for consumers and sellers of any business to exchange goods and services. Examples of new services that might be seen as a threat to current postal goods or services provided by the post office's preferred contractors include new courier services, express delivery services, competitive logistics services, and a wide variety of other services. Since they are "seen" as competing with current items, such existing products have the potential to be excluded from a new market.

This is a serious issue. The market's potential reach will be instantly reduced if it becomes possible for current favoured suppliers or the post office itself to choose which providers in different marketplace categories may or cannot advertise their products. Yet, as 95% or more of market income will originate from overseas sales, competition from the market for current postal items is sometimes more of a perceived danger than a real concern. The client, not the store owner, is supreme in the market.

### **An Early Look at the Postal E-Marketplace**

The clearing of checks and credit cards across a variety of e-booth holder currencies is a significant issue that has to be addressed early on in the internationalization process. Most nations where online trading takes place do not accept checks, and offering a single payment option in a single currency is also not acceptable. B2B and B2C customer transactions differ at the micro level. A B2C transaction has distinct dynamics. The basis of every customer-friendly business is a simple payment procedure. Online shops have begun accepting a variety of B2C payment options that promote themselves as "totally safe" and "simple to use." Despite the vast quantities of cash traded, the B2B community has shifted away from mostly paper-based payment methods toward credit cards or electronic money transfers. Banks, banking coalitions, financial institutions, and pure-play dot-coms all provide a variety of goods. The challenge is picking the best course of action. The majority of "payment processing vehicles" might be costly and have additional expenses that aren't always included in advertising and promotional materials.

Yet, a marketplace allows for the use of the same platform for both B2B and B2C customers. There aren't many differences between the two models when a smaller B2B supplier or buyer uses a credit card or EFT to pay for their goods. Nevertheless, the bigger customer observes that their electronic transaction is being pushed right into their enterprise resource planning system. When accessible via a marketplace, this reduces the cost of selling by freeing up significant resources for both firms.

**Consumer Readiness for an Online Marketplace:** The historic client base of Australia Post may be divided into three fairly general categories: majors, SMEs, and consumers. The "majors" section is the one that Post values the most[9]. Any new e-business ventures that Post needs to capitalize on include: The Post brand is renowned for being trustworthy, dependable, and marketable; Australia Post's retail locations: Post's "bricks" provide it access to a network of

stores that is unparalleled;The system for processing payments that underpins "GiroPost" and bill payment;The capacity to provide clients with end-to-end solutions;

The size of the delivery network, as well as: The "addressing" and database capabilities of Australia Post. Customers of Post are generally happy with its performance. Australia Post's National Major Customer Monitor does point out several areas where they might improve their service to significant clients. These possibilities consist of: Enhancing Post's operational procedures, Expanding adaptability, Enhancing and streamlining account reconciliation and invoicing. While there are just 360 members of the significant customer group, they account for about half of Post's total revenue and are thought to contribute considerably more to the company's profits. The top 50 clients were thought to have contributed 26.3% of sales but 42.5% of profits. This category of clients is crucial to Post for a number of reasons, including the fact that they are the most probable targets of other businesses in a climate where competition is on the rise. But more crucially, since they are more likely to be potential alliance partners in new services and might provide Post access to new income streams or value chains, these clients are of crucial strategic significance. Financial institutions, billing companies, and postal offices may be examples of this in particular.

## CONCLUSION

Security concerns cross national boundaries as rapidly as an email may be delivered from Nigeria to the United States because to the global marketplace and environment that e-commerce offers. Systems must be available to criminals in order for them to conduct crimes. International criminals and criminal organizations have access to systems through the Internet in ways that were before unimaginable. The thief needed physical access to the bank in order to carry out a physical bank robbery. Criminals may, however, access a financial institution's assets in cyberspace from any location in the world. As customers and, in some tragic instances, as employees of financial and E-commerce merchants, criminals, criminal organizations, and terrorist groups now have access to these businesses' logical resources. It is quite difficult to determine if a certain nation will cooperate in the investigation of crimes involving Posts. The difficulties include the availability of government resources to investigate crimes, willingness to collaborate, and foreign government legislation (such as whether it is unlawful to possess 5,000 U.S. identity profiles or to send SPAM email from the nation). A number of bilateral and international concerns need to be resolved in order for law enforcement to confront these crimes.

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## CHAPTER 18

### AN UPRISING STAR OF E-INNOVATION AND E-ENTREPRENEURSHIP

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#### **ABSTRACT:**

A new paradigm for Internet searches that produces relevant, high-quality local and international results is introduced by Sensis Search, a young, entrepreneurial dot-com that was established in 2004. Sensis Search is the first mover in changing the Australian search industry. This focuses on examining Sensis Search's experiences and finding the most important problems with how it operates. Material for this qualitative case study was primarily gathered from two major sources: a thorough interview with a senior management of sensis.com.au and documentary research into business reports, online newsletters, memoranda, agendas, and other official publications from Sensis. The case study demonstrates Sensis' management style, its formula for success, and the takeaways from it.

#### **KEYWORDS:**

Business, E-Commerce, Entrepreneurship, Environment, Economy.

#### **INTRODUCTION**

Consumer E-Technology and the Australian Internet Environment. The National Office of the Information Economy released a thorough study titled *The Present State of Play* in November 2000. Australia's online performance in the global information economy is portrayed in the study. The report's highlights include: According to the ABS, 6.6 million Australian adults, or 48% of the population, used the Internet between August 1999 and August 2000. In Australia, business-to-business e-commerce is expected to have generated \$5 billion in revenue in 2000. Of the 20 nations examined, Australia came in at number eight. In Australia, the proportion of small firms that were online climbed from 48 to 60% between February 1999 and February 2000 [1]. Jupiter Communications reported that there were more than 1,000 trade centers worldwide in 2001. By the end of this year, it is anticipated to quadruple, reaching 20,000 by 2002. A new postal e-marketplace may be a timely new strategic choice due to internet connection. When Australia Post joins the corProcure business venture, the challenges are evident right away.

A purchasing cartel called "corProcure" was founded on July 5, 2000, by 14 of the biggest firms in Australia. The new e-marketplace was introduced as evidence of the "big fourteen" working together, or was it? Amcor, ANZ, Australia Post, BHP, Coca-Cola, Amatil, Coles Myer, Fosters, Goodman Fielder, Orica, Pacific Dunlop, Qantas, Telstra, and Wesfarmers were named as the 14 companies. The businesses said they will all be shareholders in the corProcure project in a joint announcement to the Australian Stock Exchange.

The value of their yearly indirect expenditure on goods and services was over A\$300 billion, according to the eCommerce Report. Office and cleaning supplies, gasoline, electricity, telecommunications, facilities management, human resources services, legal services, marketing and advertising, computer services, insurance, and capital expenditure items were among the expected commodities and services exchanged via corProcure. According to the report, corProcure is dedicated to creating a multi-industry, open-platform regional trade network that is built on standards.

Suppliers to the "big fourteen" became uneasy because this cartel may have interfered with agreements that some of the firms had previously signed. Each of the categories of products and services was expected to have savings of between 5 and 8%. The "big fourteen" were employing a variety of technologies, therefore there were some questions about which technology should be chosen. They had no idea what an electronic marketplace was or that electronic procurement used a specific technology. The website for corProcure claims that a variety of online catalog types may be supported. According to the eCommerce research, "a common catalogue" is both the procurement industry's holy grail and no more reachable or accessible than the fabled cup has been for generations, Internet or no Internet.

### **Issues with the corProcure Group's history**

Australian procurement began using electronic procurement in 1998 and 1999. Ariba and CommerceOne, the two major competitors at the time who were engaged in severe competition in the offshore market, made the decision to expand into Australia in an effort to duplicate their success in the United States. What they overlooked was the fact that Australia has a limited supply of suppliers

Long-term relationships between customers and suppliers were not broken due to Australian business culture. In contrast to the United States, where procurement had started to gain strategic recognition, Australia's procurement function was less developed overall. The electronic procurement technology from the United States turned out to be excessively expensive for the "perceived" advantages it offered. Ultimately, the integration of the back-end systems perplexed the market and prospective customers. The two biggest software providers pulled down and significantly decreased their activities in Australia in 2001 and 2002 because the Australian market was not persuaded that the advantages would offset the installation costs.

Cyberlynx and corProcure, two Australian purchasing organizations, were created concurrently. Each of them possessed unique technology and had its own group of development-supporting businesses. It made sense to combine purchases and work together to find cheaper ways to acquire non-competitive goods. Nevertheless, what happened was that suppliers put up a strong fight since their negotiated prices no longer made it worthwhile to work with those significant clients. Since supplier margins had been cut too far, each of those big entrepreneurs had already negotiated very low costs and was asking for a few more percentage points of savings.

This transformation was made more challenging by the fact that no significant sponsor was prepared to invest their whole budget in the game. Also, the desire to "link from everywhere to anyplace" turned out to be too challenging and expensive for the "perceived" advantages[2].

Although the two most coveted procurement groups in Australia were founded by the biggest Australian firms, most of them have now reverted to their previous procurement practices. For

instance, CBA and Australia Post have embraced Cyberlynx and corProcure, respectively. With additional companies entering the market, including ANZ ebiz, Optus Marketsite, Shell's "Opti-Buy," Australia-wide Loading, Smartbuy, and other government-sponsored agencies, how can corProcure and Cyberlynx both flourish in the new era? How can corProcure survive in a market that is all too cautious of the broken promises of electronic procurement?

About \$92 million in capital investment funds were given to Australia Post e-business projects between 1999 and 2000 and 2000 and 2001. 15 to 20 percent of these expenditures go into infrastructure that, although not generating income in and of itself, is essential to provide the availability, scalability, security, and flexibility needed for future e-business operations. That information should be known by developers[3].

### **January 2002: Australia Post purchases corProcure**

The corProcure cartel had made little progress in the home market in less than two years. In addition to the fact that technology was not standard, corProcure suppliers were selling cartel members externally rather than via the market. Australia Post bought the corProcure shell in January 2002. Nonetheless, following the Postal acquisition, the majority of the big enterprises have continued to trade in various corProcure categories. In 2002, Australia Post bought corProcure, mostly for its technology. However, it was believed that after purchasing corProcure, the technology would be able to address issues with the mail network, customer access to information and services provided by the Post, third-party logistics and collaboration with other parties, and a logistic push through physical parcel hubs.

Australia Post's technology strategy for 2002 and 2003 focused on delivering the best results for the company in the following areas: cost savings, accelerated time-to-market, technological advantage creation, increased secure, dependable, and flexible connectivity with partners and customers, and increased return on IT investments. For its whole company, Australia Post chose to adopt corProcure's technology as its preferred e-procurement gateway. Australia Post may now utilize the products and services that corProcure purchases by using new purchasing agreements. At the time, Australia Post wanted to boost both the number of online procurement transactions and the utilization of corProcure's services. By requesting that its contracts with suppliers utilize the Australia Post e-procurement gateway, Australia Post planned to change this[4]. It was also important to note that in 2003, 50% of the "e-cista" electronic marketplace operated by Deutsche Post was sold. In contrast to what had previously occurred to corProcure, this time around.

### **Unclosed Market**

The corProcure Board authorized a new e-business model for corProcure at the beginning of 2004. There may not have been a choice given the little commissions collected after the 2002 takeover. Contrary to original projections, corProcure was only directing less than \$100 million via the hub instead of billions of dollars. This sum was less than 1% commission. Any new course of action must center on creating a much larger, even global, e-marketplace rather than a close-knit buyers' club with an exclusively local emphasis.

The worldwide e-business postal study that was published on the Universal Postal Union's website the same month coincidentally changed tactics in the same way. A resurrected corProcure may and should realize a completely new income and commission stream, which is

anticipated to be 10 to 20 times larger than it had experienced in its prior form. The goal of "corProcure dot-com" was to draw "active trading Internet users" from more than 40 nations to its redesigned global trading platform. A low membership fee and minor transaction costs would be charged to new e-booth owners. Any Australian e-only market's chance for the future is to join a network of international markets. Dealing with a small number of buyers was no longer an option. The company would have shut down by the middle of 2004 if it had remained domestic. Australian e-businesses must have this global perspective. All Australian Internet firms should take note of this truth, which is all too obvious.

### **The Two Paths for E-Market Growth**

#### **Method 1: The Market for Global SME**

The population of Australia is less than 0.3% of the combined populations of the USA and the EU. Similar to other online firms, those from Australia make up roughly 0.4% of the top 44 trade nations' "active" online enterprises. CorProcure's connectedness would undoubtedly be much improved if it were to transition from being a tiny, local buyers' center to an international marketplace with global vendors finding worldwide customers[5].

The presumptions for each of these companies are: The presumption that they are SMEs is very cautious, whose Internet income is just 10% of their maximum trade revenue of \$A200,000, which is again a very cautious figure. Using a transaction cost of only 1.25% and a market membership fee of \$200 Australian.

As a result, the corProcure marketplace may produce a commission of around 4.5 million Australian dollars annually. The increased expenditure of over \$137 million is a significant increase when measured against the existing domestic spending via the market, which is about \$70 million. The barely \$1 million commission collected since the Post cartel purchase in 2002 would increase significantly with subscriptions and transaction fees. It should be emphasized that less than 8% of the anticipated total marketplace commission is likely to come from Australian domestic sales.

#### **Strategy 2: Domestic Medium-sized Business Advertising**

The second tactic was solely domestic in nature. It was directed at 1,000 medium-sized businesses with payrolls of 100 to 300 people and annual revenues ranging from \$20 million to \$50 million Australian dollars. According to responses from the 2004 telephone contact center poll, a startling 59.5% of all respondents were interested in trading on the market both locally and abroad. This outcome was almost 30% points better than the interest shown in conventional varieties of new postal offerings. On the domestic front, this discovery disproved the idea that the primary marketplace users would primarily be large B2B business firms.

In essence, the market will be biased toward medium business customers rather than the SME objective, with a potential revenue and related commissions ratio of around five to one. These will be confirmed in the first trade year.

What is apparent, however, is that both domestic and foreign medium business customers as well as global small and medium enterprise players have very meaningful roles to play in this market. Both clientele bases will contribute to the marketplace's overall success. It will be intriguing to monitor such projections.

## DISCUSSION

Pacific Access Pty Ltd, a fully-owned subsidiary of Telstra Corporation, Australia's biggest telecommunications corporation, was replaced in 2002 by Sensis Pty Ltd, a new corporate brand and business name. According to the CEO of Sensis, the name of the firm, Sensis, captures the core of today's business: keeping people in contact via leveraging various media, including print, voice, web, and wireless, to appeal to the three main human senses of sight, hearing, and touch. Sensis purchased CitySearch Online and BMC Media Ad Sales to expand its advertising portfolio and boost its strategic position in the online advertising market. Sensis has become one of Australia's top advertising and search firms after two years of operation, driven by an ambitious expansion plan. Sensis offers a range of print, web, phone, and wireless goods intended to connect consumers and sellers at any time and everywhere. Almost 3,100 people work for Sensis Pty Ltd, of whom 2,300 are employed directly by the company and 800 through its fully-owned subsidiary, the Trade Post Group of enterprises.

As shown, Sensis Search is an important part of Sensis's many business aspects and serves as the main hub for information search interfaces across online and print sources. This focuses on examining sensis.com.au's experiences and finding the major problems with how it operates. Data for this qualitative case study was primarily gathered from two major sources: a thorough interview with a senior management of sensis.com.au and a documentary analysis of business reports, online newsletters, memoranda, agendas, and other official publications from Sensis. The case study focuses on Sensis' management, success, and any lessons that may be drawn from its journey.

Sensis Search: Establishing a New Standard for Australian Internet Search. Sensis Pty Ltd introduced its search engine, Sensis Search, in July 2004. Sensis Search includes [www.whitepages.com](http://www.whitepages.com), [www.yellowpages.com.au](http://www.yellowpages.com.au), [www.citysearch.com.au](http://www.citysearch.com.au), and [www.whereis.com](http://www.whereis.com). Sensis Search is able to provide Australians fully integrated search results across local proprietary and international Internet material as a consequence. Sensis.com.au, for instance, allows Australians to search and buy a pair of shoes in New York as well as a local florist anywhere in Australia. Customers using the search engine may get integrated results from local Yellow Pages®, White Pages®, CitySearch®, and Whereis® data as well as international Web material for local, commercial, and worldwide queries. Sensis Search is the pioneer in changing the Australian search industry and develops a new method of doing online searches that produces accurate, reliable local and international results.

Sensis Search, unlike other search engines like Google where these services are available but under different URLs, integrates Internet Web page content and structured content into a "one-stop shop" for searches, represents a "world first" among search engines. As a result, searches may be carried out throughout the Sensis sites as well as locally, regionally, and internationally. The success of Sensis and Sensis Search is a result of the company's strategy to create synergies across its companies. Sensis Search's emphasis and pursuit of relevant, nearby, and high-quality return results signal the development of online search services. The amount to which particular users' search demands are met now determines the success of an online search, not the volume or size of the Internet index. Sensis Search also makes it very simple for Australian consumers to access commercial content online. Products, services, people, locations, events, jobs,



automobiles, residences, and "consumer ads," which may include searches of Sensis directories like the Trade Post, are divided into nine categories.

Sensis management made the decision to grow the company further as a result of Sensis Search's initial success in providing the most cutting-edge and comprehensive internet search engine in Australia. In December 2004, Sensis purchased Universal Publishers Pty Ltd, one of Australia's most prosperous mapping and street directory companies. With the biggest and most recent database of accessible mapping material in Australia, Sensis Search now enjoys a much larger market share and a stronger competitive edge. Contrary to its rivals, Sensis Search offers nearly 100% geographic coverage of Australia as one of its business lines. According to the CEO of Sensis Pty Ltd, "its contents covers everything from urban streets, to points of interest, four-wheel drive tracks in the remote outback, and smaller roads you'd never see on a normal map." Sensis's ambitious acquisition-focused expansion plan intends to meet the rising demand from local Australian customers for localized advertising and map-based search to locate nearby businesses, goods, and services. Under its Whereis® trademark on the website at [www.sensis.com.au](http://www.sensis.com.au), Sensis Search's digital mapping division currently provides more than 18 million digital maps online each month

Sensis Search pursues two complimentary lines of business online advertising and online search — in order to survive and prosper in the harsh competition that exists in the search engine market today. Sensis Search presently has a market share of more than 23% in Australian online advertising, and it also controls over 70% of the country's combined search and directories industry. Internet advertising sales in Australia increased by 58% to AU\$300 million in the 2003/2004 financial year, according to the Online Advertising Spending Report published by the Audit Bureau of Verification Services. Sensis Search has both an opportunity and a difficulty as a result of the explosive rise in internet advertising. The firm develops its corporate strategy and direction with an emphasis on local internet search inside Australia. By delivering relevant and comprehensive localized business information, the company becomes the dominant player in local Australia's search. The success of Sensis Search's online advertising business, as well as the overall Sensis Pty Ltd. company, is boosted by its ability to provide relevant and high-quality search results to satisfy particular user queries. Sensis Pty Ltd's online/electronic portfolio, Sensis Search, saw a 40.7% rise in 2004 and a 34% increase in online use over the same year, but Sensis' print business only experienced a 5.6% growth over the previous financial year.

### **Essential Lessons**

The experience of Sensis Search offers some essential management lessons for the establishment and operation of dot-coms and e-businesses in the modern world. These teachings are examined and explored in this section. First off, Sensis Search's success in the e-business arena is a result of its combination of innovation and entrepreneurship. As there are little barriers to entry for new rivals and entrants into the market, durable competitive advantage is nearly unattainable in today's highly competitive e-business environment. Imitation and degradation are ongoing threats to innovation. Regarding the advantages of early adopters in the e-business industry, there are several opinions in the literature. "Does it pay to be first to market or should e-commerce enterprises wait for first movers to make an investment and then cannibalize the concept with lower entry cost?" is the issue posed by Mellahi and Johnson. In the e-business environment, where there are greater levels of technical uncertainties and a quick pace of technological innovation, there is a prevalent perception that it is safer and less costly to mimic the first mover.

This is what gives rise to the issues. For instance, many new dot-coms hurried to create an e-marketplace and opted for copying over invention as a business model.

According to this author, the failure of many imitators in the dot-com business was due to a lack of entrepreneurial and innovative skills. The core of innovation and entrepreneurship is bringing a new idea to market, not copying a new idea without considering the unique requirements of local markets, and being creatively and proactively responsive to environmental changes by launching a new product, process, service, or putting in place a unique business model. The first mover advantage has undoubtedly contributed to Sense Search's success.

Studies in both theory and practice demonstrate how innovation and entrepreneurship work together to create successful businesses. Risk-taking, initiative, and invention are three essential components of entrepreneurship. The three components, according to Slevin and Covin, are not enough to guarantee organizational success. They argued that there is overlap and reliance between entrepreneurship and innovation because "a successful business not only participates in entrepreneurial management behavior, but also has the necessary culture and organizational structure to enable such behavior." For businesses to be profitable and long-lasting, both are necessary. Entrepreneurship also has something to do with the creation of new goods and services. Innovation often involves doing things differently and better rather than just creating new items. Entrepreneurship is associated with working with novel goods and services, although it is not always about improving things. But, innovation focuses on improving something by doing it in a unique way.

As a result, due to the startup nature of the business, entrepreneurship has additional financial and risk concerns. The senior management of the organization who was questioned for the research claims that there are no conceptual or practical distinctions between off-line and online entrepreneurship and innovation. While the skill set needed is clearly different, the methodology is the same whether the setting is online or off-line. The corporation considers innovation and entrepreneurship to be essential to their success and thinks that innovation should be ingrained in organizational culture and fostered within. It entails motivating employees to engage with clients and work on research and development. Sensis Search is a leader in innovation as well as an entrepreneurial business due to its aggressive expansion strategy. Sensis claims that it was the first business to provide its directory offerings online[6].

Sensis Pty has adopted an intrapreneurship approach, which is entrepreneurship inside an organization, as its business model. According to Sensis' tale, the size of the business should determine how entrepreneurship and innovation are developed. For instance, the Sensis group consists of older, well-known businesses like Yellow Pages® and the much newer, smaller Sensis Search. In contrast to Sensis Search, which uses an altogether new business strategy, Yellow Pages® is based on a well-established, conventional business model. In order to avoid attempting to fit in with the outdated business models, it is necessary to divide the firms and provide new business units inside the group "quarantine space" where they may develop employing different personnel and receiving various incentives, funds, and other resources.

Second, Sensis Search can be seen as a successful start-up of a new breed of dot-coms that are more developed in terms of business models and information technologies, putting more of an emphasis on the justification and accountability of business processes and outcomes rather than just a "can do" attitude. The majority of the post-2000 e-business successes tended to be those who were first to market and had enough funding to survive the crisis. Also, these businesses

were able to sustain their workforces and maintain a sufficient level of concentration on their primary business objectives without over-diversifying. As a result, they stand apart from their contemporaries from the early days of e-commerce. E-commerce flops in the past have often been "Me2" brands, which simply copied successful e-commerce models on the basis that "build it and consumers will come" while completely ignoring the value of well-known branding.

Although having its headquarters in Australia, Sensis Search faces out against tech behemoths like Microsoft, Yahoo, and Google. As a result, they have determined two strategies for becoming competitive. The first is through offering more business and commercial content, and the second is by maintaining strong connections with international partners in order to supply their solutions in the fastest and most affordable way possible. For instance, the Sensis Search engine is powered by a partnership between Sensis Search and Fast, a Norwegian business that specializes in algorithmic search technology. For Aussies, it has continued to expand rapidly and provide cutting-edge internet search solutions. It gives its advertisers the option to post the print material they already produce online for little to no extra expense. For instance, companies may be discovered on Sensis.com.au without having a website by merely being listed in the company's online Yellow Pages [7], [8].

Finally, following the seven-step innovation strategy and having enough cash and people skills are essential for launching a profitable dot-com. Sensis Pty has invested a lot of money in growing its online and electronic operations as part of a long-term company plan. In Australia, there seems to be a shortage of workers with specialized knowledge in e-commerce. This might be as a result of the strong demand on a global scale and the length of time it takes for institutions to provide the necessary skills. Online entrepreneurship and innovation in Australia continue to be significantly hampered by the lack of human resources and skills. Sensis has created incentive systems that will bind its workers to the business and provide them with recognition, chances, and training since they feel that employee retention is a key factor in driving innovation. Also, the company has established connections with institutions and often invites lecturers to address the workers[9].

Fundamental are further insights from Sensis Search as well. The CEO of Sensis believes that the company's continual dedication to its employees and clients is one of the main reasons for its success. According to survey results, consumer satisfaction increased by 10% in 2004 while staff happiness has remained 10% higher than the Australian average for the most important satisfaction metrics. Also, it's important to be realistic and pinpoint the factors that set the business apart from its rivals as well as the durability of those factors. Companies should also have solid milestones to measure the success of their investment, which may be determined from a user perspective, customers, brand awareness, or advertising. Lastly, an internet firm has to do a determined risk assessment. To go to the next level, businesses must decide when to let go, significantly alter their model, or sell it to others.

## **CONCLUSION**

The expansion of e-businesses has been refueled by the general improvement in the global economy in 2003 and 2004, as well as the restoration of investors' faith in the high-tech and e-business sectors. In fact, the public's excitement in Google's August 2004 IPO debut is a sign of the recovery. Google's share price increased 27% after two days of trade, and the company's valuation matched that of Ford Motor Company. Forrester Research predicts that internet sales in the United States would increase by 19% year over year to reach US\$225.9 billion in 2008. Also,

there will be a considerable growth in the number of online consumers, and every year, roughly 5 million additional households in the United States will begin shopping online. A favorable and optimistic future for e-business exists in the mega economic environment, despite the many obstacles that must be overcome. E-innovation is clearly alive and thriving, as shown by organizations like Google, Yahoo, and Amazon.com as well as the study's example firm. Consumer behavior has evolved, and compared to five years ago, individuals are now more inclined to adopt new Internet technologies. An e-business may become profitable and sustainable with the aid of e-entrepreneurship and e-innovation. Dot-coms are nonetheless dealing with more difficulties than before. Due to a more unstable economic climate, the complexity of new technology, and a more worldwide economy, dot-com enterprises must first attain sustainability.

The commercial success and rapid growth of companies like Amazon.com, Dell, Travel.com, and others via e-business partnerships provide as more evidence of the significance of strategic alliances. Corporate e-partnerships will be a fundamental element and contribute significantly to the future growth of e-business operations. Few firms can depend only on their internal assets to obtain a competitive edge in national and/or international markets given the rapidly shifting competitive environment of today's business world. More multinational dot-coms will join strategic partnerships in e-business as a result of their continued development into foreign markets. For smaller firms that will follow the trend to become global, Yahoo, Google, e-Bay, and E\*trade serve as excellent examples of global growth utilizing partnerships with regional e-businesses globally. Last but not least, the primary cornerstone to the success of e-business will be the main concepts of overall quality management, which include customer focus, continuous improvement, and measurement to attain customer satisfaction. Several e-businesses' collapse and the dot-com bubble burst were mostly brought on by subpar customer care and services, issues with website security and technology, and inadequate change management.

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## CHAPTER 19

### USING E- AND M-BUSINESS COMPONENTS IN BUSINESS: APPROACHES, CASES, AND RULES OF THUMB

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#### **ABSTRACT:**

This chapter examines how to support and improve current companies while also developing new business innovations by using elements of e- and m-business. It is suggested to use a framework that shows the two various ways that businesses might incorporate e- and m-business components. We offer three examples of how Finnish firms have creatively employed e- and m-business components to assist, improve, and establish enterprises. Several general guidelines for utilizing e- and m-business components in business are suggested based on the illustrative framework and the situations. This is done to provide managers with practical information for budgeting e- and m-business component investments.

#### **KEYWORDS:**

Business, Company, Environment, E-Commerce, Internet.

#### **INTRODUCTION**

It is obvious that electronic and mobile commerce are here to stay and that they provide current firms with a variety of new business options as well as opportunity to launch new enterprises. E- and m-commerce may be broadly defined as the many means of facilitating and carrying out business through the Internet and/or using mobile devices. E-commerce examples include businesses that solely do business online or those that provide a very narrow range of services. M-commerce may be defined in a variety of ways, and there may be many definitions for both m- and e-commerce that are accurate. We refer to the application of e- and m-commerce approaches to business as employing e- and m-business components in this due to the likelihood of highly various perspectives on what e- and m-commerce are.

There are a lot of misconceptions about what e- and m-commerce are, what they are not, and particularly how and how much value they provide. These misconceptions have contributed to a number of notable failures, such those of the online retailer of apparel Boo.com and the online supermarket Webvan, which have made many managers hesitant to implement e- and m-business components in their organizations[1]. This is done to assist managers in determining the kinds of e- and m-business components that could work for their organizations. Understanding the firm's attitude in its approach to e- and m-business components is important in determining the applicability of e- and m-business components for a company. Managers may get a better understanding of their own company's direction by seeing how other firms approach adopting e-

and m-business components. This can also considerably lower the risk of misinterpreting the organization's requirements for e- and m-business component investment.

E- or mobile commerce are unquestionably powerful elements that ensure success. If such claims are made, they are unquestionably false. The effective use of e- and m-business components to improve and revitalize existing firms, such as the British retailer Tesco, whose online venture Tesco.com is profitable, has yielded a variety of beneficial experiences. Another example is early adopter of e-commerce Lands' End. Other companies have also been successfully launched, such as the online professional community Classmates.com. Insightful innovations, more precisely those inside the company's core business, are often the cause of the successful uses of e- and m-business components. A business innovation might be the introduction of a never-before-tried company concept or the replacement of an outdated business practice with a new one. The success of many successful e- and m-commerce examples has often been attributed to the clever use of already-existing technology by a firm to support, develop, or expand its core business.

There is a ton of literature on how businesses can adapt their operations and methods of doing business to the changing global environment. It also discusses how they should leverage their skills to obtain competitive advantages. One method to describe how firms might create competitive advantage is via the consolidation of talents and technology inside companies to core competence areas is core competence thinking, which is often credited to Prahalad and Hamel. This consolidation is accomplished by improved management participation in the areas that have been recognized as the company's strengths and improved communication. According to the core competency idea, a company's competitive advantage may be based on the methodical application of what it does well in all it does[2].

One problem is focusing on and strengthening key capabilities to gain competitive advantage; another is maintaining that advantage. Businesses must adapt in order to stay current with changes in their environment or risk losing their competitive edge. Several concerns within a company's organizational structure have been the focus of attempts made by firms to reform. The core objective has remained the same, regardless of the many strategies used: to fundamentally alter how business is performed in order to adapt to the changing environment. E- and m-business components may be seen as either a company's core competency area or as tools that can be utilized to modify business processes in order to maintain competitive advantage. E- and m-business components may really be seen like any other fundamental competency or instrument of company transformation. E- and m-business components are aspects of the core competency areas for businesses that build their business models on them, whilst for others, they are instruments to maintain competitive advantage.

Businesses that have a core business already should preserve their focus on that business and avoid being sidetracked when considering adding e- and m-business components to their operations. We want to emphasize that developing core competences from elements of the e- and m-business is highly tough and is comparable to developing any core capabilities. The revenue logic of the company must be severely examined if organizations use e- and m-business components to alter their core business. It is reasonable to assume that the business's valuation principles will stay same if the revenue reasoning does not change. In other words, there is no justification for assuming that e- and m-business components would somehow boost the company's profitability. The value of businesses and investments based on e- and m-components has in fact often been overstated[3].

One of the most crucial considerations when choosing to invest in e- and m-business component is value generation. Six alternative theoretical frameworks are used by Amit and Zott to analyze the sources of value creation in e-commerce, and they conclude that each of them proposes potential sources of value creation. E- and m-business have been claimed to provide businesses that employ them more potential for larger profits via the additional opportunities they permit owing to convenience, speed, simplicity of use, cost- and labor savings, and better communications. Companies may boost their chances of achieving bigger revenues in the future by using e- and m-business components. Using e- and m-business components, however, does not ensure that such increased returns be attained. Because of this, it's critical to comprehend how increased potential affects the value of the company, the errors that have been made, and the instances in which potential has been mistaken for value.

There are a few models that may be used to assess potential, such the real options approach, which is a set of techniques to comprehend, gauge, and evaluate potential. The real option method provides valuation principles that may be used in order to analyze the profitability of corporate investments in e- and m-business. The real options approach's techniques must be utilized properly, just like any other method. All techniques may be manipulated to produce the desired effects, but being realistic is ultimately in everyone's best interests.

We'll provide a framework in the next part to show the many perspectives businesses have on e- and m-business component investments. The use of e- and m-components in business is shown by the presentation of three instances from Finnish enterprises. Three general guidelines for the effective application of e- and m-business components are suggested and briefly addressed in light of the introduction, the proposed framework, and the instances. The ends by summarizing and drawing a conclusion[4].

## **The Business- and Technology-Oriented Approaches**

### **E-business and m-business**

In the beginning, we make the case that there are surely a variety of definitions for e- and m-commerce and that "e- and m-business components," which are business ideas or components based on e- and m-technology, may be used in many contexts. We draw attention to the fact that e- and m-business components may be utilized to support current core businesses by substituting outdated practices with cutting-edge e- and m-methods as well as to develop whole new core business sectors. Companies may maintain their competitive edge in each of these ways.

According to our opinion, it is critical to classify businesses based on their focus on e- and m-business component investments and e- and m-business startup. Businesses either generate business ideas and use existing technology to commercialize those business ideas, or they develop business ideas and use existing technology to commercialize those business ideas. We put up a framework that contrasts the two alternative approach orientations in order to analyze this intriguing problem. This framework helps to clarify the various methods and to pose issues about the various risks and opportunities they provide to the economic and financial success of e- and m-business component investments[5].

Businesses with core competencies in technical research and development of e- and m-business components often thrive in their e- and m-business by inventing new technologies to perform novel tasks or traditional tasks in a more technically sophisticated manner. These businesses



primarily use an innovative, technology-focused approach to e- and m-business. The businesses that employ the technology-oriented approach to e- and m-business finance the development and commercialization of the majority of new e- and m-technology under the premise that new technology will generate business, i.e., "this technology will make us money if we can figure out how to sell it."

Businesses that have a core competency in a field other than research and development (R&D) often conduct their e- and m-business using a business-oriented strategy and make use of current or upcoming e- and m-technology in their main business areas. They support their core business sectors with e- and m-business, and often, the choice to implement e- and m-business components is based on cost savings or sustaining competitive advantage. The idea behind the business-oriented approach is that in order to realize a successful business strategy and revenue logic, the appropriate technology must first be identified. The method is based on the idea that "We might generate money if we had this technology," and involves discovering cost reductions for an existing company[6].

The division between business- and technology-oriented methods may seem minor since, regardless of the strategy used, a firm has to have the proper technology and the correct revenue logic in order to succeed. While it seems obvious, it is much too often overlooked. It may be simpler to comprehend and recognize the possibility for failures of e- and m-business component implementations since it is simple to grasp the distinctions between technology- and business-oriented approaches. It is simpler to identify the hazards that management myopia and misconceptions related to the orientation may bring about if one begins by knowing the main skill areas and their impact on the orientation and attitude of organizations to e- and m-business developments. We will outline three business innovations based on e- and m-components that have already been put into practice by Finnish businesses in the following section. Finland, a country in Northern Europe with a population of 5 million, is one of the nations with the greatest Internet and mobile device penetration, according to several polls and researchers.

### **Some examples of e- and m-business**

We look at three examples of business innovations that improve current core businesses of organizations using elements of the e- or m-business. After a brief introduction to the firms and their operations, the invention is presented, and its viability is then covered.

#### **Omenahotellit - Hospitality Online**

The information systems and technologies used in the hospitality sector have typically been built to support or extend, but rarely to radically alter or replace, the existing, conventional business models, despite the fact that many players in the travel industry have been forerunners in the field of IT. With the adoption of new technologies and systems, the existing services and functions continue to exist alongside the new technological solutions, and the business models have a tendency to stay mostly unchanged. Hence, the main purposes of information and communication technology have been to increase market share, decrease expenses, and/or improve the effectiveness of a certain business activity. With the great advancements in ICT, the progress in the next generation of Web sites and services, and the growing positive attitudes among consumers to embrace the Internet as an advanced commercial medium, we will nevertheless continue to witness the emergence of many innovative and interesting business models even in the somewhat conservative accommodation sector[7].

The brand-new hotel chain Omenahotellit in Finland is a prime example of a firm that bases the core of its operations on an avant-garde, cutting-edge e-business strategy. By fully using the Internet and other ICT in its operations, the firm challenges the conventional service idea utilized by the majority of other competitors in the lodging industry. Omenahotellit has created an IT-enabled business model for the lodging industry that was previously unknown even on a worldwide scale. Its development was motivated by fresh insights as well as creative and successful efforts and ways to use IT and the Internet in the travel sector.

The fundamental tenet of Omenahotellit's business model is to provide guests with high-standard hotel accommodations in desirable areas at a really reasonable, set room fee. It may seem hard to have high-end pricing that are still affordable, but Omenahotellit's business model excels in cost-effectiveness by providing the essential component of hotel operations a room for the night without high-priced supplementary services. There can only be four people in a room at once. In terms of size, facilities, and interior style, all of the rooms are comparable and do not, in terms of amenities or room size, fall short of the average 4-star hotel rooms provided by the major rivals on the Finnish market. The low room rate Omenahotellit offers is in large part a consequence of the drastic cost-cutting accomplished by effectively using IT and the Internet in the reservation and payment processes, reception procedures, customer safety and convenience, as well as administration and maintenance chores[8].

Via the company's exclusive online reservation system at [www.omena.com](http://www.omena.com), the consumer manages the whole reservation/cancellation process themselves. The client makes a reservation, pays for it using safe online banking or credit card processing, and then gets a booking confirmation that includes the room number, the key to the room, and a personal door code with five digits that is good for the duration of the customer's stay. Upon renting a hotel, a client has the option to add other services like pay-TV and broadband Internet access. They may also pay for these services later using the in-room TV. Businesses and organizations who have a key customer agreement in place with Omenahotellit are not required to pay for reservations online but instead have the option of receiving an electronic invoice. Due to this, even conventional billing processes are now entirely automated.

As all conventional reception activities have been fully automated using Technology, all Omena hotels are run without a front desk or receptionists. There is no need for check-in or check-out processes like handing over keys or billing the client since all bookings have already been paid for and the room keys have been supplied electronically. Walk-in clients may make reservations and make payments using their credit cards via electronic service points (or "kiosks") that are linked to the Internet at the gates.

Moreover, IT strongly supports consumer comfort and safety without compromising security. Only visitors with a proper door code are permitted to enter the building, and all doors are always locked. The entrance and the halls are watched over by recorded surveillance cameras, and the security staff has remote access to the digital recordings. Guests may call the help desk or use the in-room TV to contact the security firm in case of an emergency or other difficulty. Customers may also get all the essential hotel information and get in touch with the service provider for maintenance, additional cleaning, and other services via the TV system.

Providing significant data to essential partners and government agencies is only one of several time-consuming management and maintenance duties that have nearly entirely been automated. Every morning, the housekeeping team receives an email with a list of the rooms that need to be

cleaned. This list is automatically created. Based on the number of rooms reserved and the total number of inhabitants, the system orders the hotel room linens directly from the laundry service.

While examining the corporate structure, Omenahotellit's business plan also stands out as unique: The firm is, to a certain degree, controlled by its customers and by computerized systems since the ordinary duties have been organized in accordance with self-service principles and mechanized utilizing IT. The managing director is the only employee of Omenahotellit. Instead, the business employs a somewhat extreme kind of outsourcing, depending on a vast network of partners to perform jobs like project management for new hotel openings, IT, cleaning, security, customer service, and marketing. The corporation has no physical offices; instead, "laptop management" is used to run a virtual, mainly paperless workplace. The unique online reservation and hotel administration system, which has been specially designed for Omenahotellit's remarkable, automation-based business model, serves as the cornerstone of the company's strategy. Omenahotellit has developed a comprehensive growth strategy: By 2008, the firm hopes to run close to 40 modest units, totaling 2,000 rooms<sup>3</sup>, across the 30 to 35 biggest cities in Finland. Beginning in 2006, the business will also pursue a worldwide growth, focusing largely on the nations nearby.

A firm cannot fully take advantage of the many potential advantages of IT and e-commerce by adopting new technology only to support current procedures and operations, which was the key determinant in Omenahotellit's decision to adopt this approach. It can be argued that this phenomenon, despite the fact that many large players have been able to establish a dominant position on both traditional and electronic markets, actually more accurately reflects online customers' lack of confidence and insecurity during the early stages of e-commerce than it does superiority in terms of online value creation. Maximizing the unique benefits provided by IT and e-commerce often necessitates pure e-business models and a lack of limitations imposed by current brick and mortar operations. For Omenahotellit, this means concentrating only on the electronic sales channel and excluding all other sales channels, including call centers, sales offices, welcome desks, and staff[9]. Value creation is a difficult process that is closely related to every facet of a business's operations and decisions. The main selling points of Omenahotellit are: real-time information, rapid satisfaction, high-quality apps and material available online, ease of accommodation, and particularly a set room rate and a highly appealing price/quality ratio. Several variables contribute to the cheap pricing, however the following are the most significant ones:

A complete automation of several processes, resulting in lower labor costs than hotels employing conventional business methods. Consumer self-reservations: Omenahotellit makes the case that online self-bookers may and should be rewarded with reduced rates since they significantly reduce supplier costs when compared to bookings handled by a sales staff, according to both intuitive reasoning and accepted theory. Disintermediation<sup>4</sup>: As there are no middlemen involved in the booking process, no commissions are due to them. Customers benefit from the cost reductions by paying low pricing. Four Omena Hotels are already operating in Finland, but numerous more locations will be added over the next two years, mostly by converting older office buildings in urban areas into fresh, contemporary hotels.

Omenahotellit's marketing efforts have been modest so far, but when there are 8 to 10 hotels by middle 2006, more extensive advertising campaigns will be launched. Despite this, the first year of operations has been encouraging, with hotel occupancy rates that significantly outperformed

the original projections and quickly passed the break-even point. Early adopters tended to be young individuals, parties, and families that value a cheap room that can sleep four people, as seen by the very high average number of visitors per room. But, as more and more businesses become aware of this fresh, intriguing option, there has been a noticeable rise in the number of business travelers in recent months. In this succinct case study, we have introduced Omenahotellit, a new Finnish hotel chain that employs a cutting-edge e-business strategy to challenge the traditional service approach utilized by the majority of other companies in the lodging industry. By doing this, we want to shed light on the possibilities that the Internet and IT may provide, even in a field that is legitimately classified as conservative. Also, we have emphasized a number of significant concerns that are fundamental to the process of creating consumer value in an online setting where new forms of competition develop.

### **Example 2: mTicket from The Helsinki City Transport Corporation**

For the Helsinki metropolitan region, public transportation is provided by the Helsinki City Transport Company. The corporation runs ferries to the islands outside the city center, as well as buses, trams, metro lines, and so on. The corporation collected 206.9 million fares in 2003 via the sale of 93.4 million bus, 56.8 million tram, 55.4 million subway, and 1.3 million ferry tickets. Customers need quick and simple methods to pay their fares for public transit to operate well. While utilizing public transit less often than other groups of consumers in 2001, they typically purchased their tickets from vending machines, service counters, or the drivers of the different vehicles, which added additional labor and slowed down operations. The business also made the decision to provide a mobile ticketing solution for its clients in 2001. The Plusdial Ltd.-developed technology was originally tested in trams and the Metro before being made available to more people in 2002.

The client finds the technology to be very easy to use. The user may get a one-hour SMS-ticket that can be presented to a ticket controller by sending an SMS to a service number with the code "a 641" in it. The ticket is charged to the customer's phone bill in the same way as any other service line call or comparable charge. The advantages of the system for a casual user of public transit are clear: It is simple to use, does not need cash or other payment methods, registration, a ticket counter or vending machine, and it speeds up boarding public transportation since there is no fuss with the ticket. The program has shown to be effective: In 2003, SMS was used to pay 55% of single-fare tram tickets. 9.4% of single price tickets on all HKL transportation services, or around 130,000 tickets each month, were SMS tickets[10]. From the perspective of the service providers, the approach has also shown to be advantageous: When selling tickets is made simple, transportation moves more quickly, printing and distribution expenses go down, and investments in vending machines are reduced. The system's simplicity of use has even reduced the number of people who board the train without a valid ticket.

The system's fundamental technical breakthrough is straightforward: developing a system that can provide valid ticket codes to consumers via SMS and to controllers via mobile terminals. Innovation in business models is considerably more important: As compared to older methods of ticket purchase, there are obvious advantages for system users. The system takes into account the following main advantages of mobile electronic business: It is used while moving, is easy to use, and meets an unforeseen demand. The system's success demonstrates that a well-designed mobile system that satisfies an actual demand of the consumers will be used to the fullest extent possible.

## CONCLUSION

By using mobile devices instead of desktop computers, customers may access online buying platforms via m-commerce. The distribution of material through wireless devices has improved over time in terms of speed, security, and scalability. Mobile commerce has therefore expanded quickly. This paper breaks down a mobile commerce system into six components—mobile commerce apps, mobile stations, mobile middleware, wireless networks, wired networks, and host computers—to make it easier to comprehend and build such a system. M-commerce nowadays has made it easier for clients to acquire online products and services as well as ensure that they have constant connection and access to product information. M-commerce is essentially a retail shop in your consumers' pockets. M-commerce is not a distinct entity.

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## CHAPTER 19

### ENTREPRENEURIAL OPPORTUNITIES ON THE INTERNET

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#### **ABSTRACT:**

This chapter highlights and explores online business potential. It gives a succinct overview of entrepreneurship, looks at entrepreneur traits, and discusses cyber entrepreneurs. It contains a case study that highlights the advantages and drawbacks of cyber entrepreneurship. The case study demonstrates how simple it is for younger generations to launch an online company with minimum start-up money and other resources needed. It draws attention to the fact that tenacity, persistence, and a basic understanding of technology are crucial qualities for successful cyber entrepreneurs. The case study also highlights the need for creativity, an entrepreneurial attitude, and the capacity to generate value where none previously existed.

#### **KEYWORDS:**

Business, Company, E-Commerce, Entrepreneurship, Internet.

#### **INTRODUCTION**

As reports of rising oil prices and airline bankruptcy keep coming in, airlines throughout the world are fighting to become profitable by lowering costs and simplifying operations. The importance of giving consumers value doesn't change at the same time. One of the largest developments in the airline industry is e-ticketing, which has almost 100% adoption in the US and is spreading to other nations. Airlines have also attempted to reorganize check-in procedures by providing clients with unattended automated check-in kiosks and online check-in self-services. According to these possibilities, passengers will have more flexibility and time savings while the airlines would spend less on staff. The scenario in Finland is the same as it is everywhere else; Finnair Airlines must provide its clients cutting-edge services in order to keep its competitive advantage in the face of heightened competition from low-cost carriers[1].

In collaboration with Finnair Airlines, the Finnish business Book IT Ltd introduced a service allowing members of its frequent flyer club to check in for flights using their mobile devices in October 2004. They market this service as the only one of its kind in the world. Customers may use the service to skip the check-in counter and go directly to the boarding gate, saving them the hassle of waiting in line and reducing the burden of the check-in counter staff. It allows the user the extra flexibility to utilize the service wherever they are without having to turn on their laptop, in contrast to e-check in. There are no extra downloads or settings to change in order to utilize the service with any operator's subscription and any mobile phone model. It is simple to use; according to Book IT CEO Jussi Salonen, "The service functions on a one-button premise – it instantly identifies the user without passwords or codes. Even operating instructions are not required since using the service is so straightforward. According to him, the driving principle

was to develop applications for an already-existing technology, in this instance, the short messaging service, since he did not think that broadband Internet would quickly become accessible to all people.

He highlights the need of using the infrastructure that already exists as well as the requirement for knowledge about the commercialization of ideas. "A harder task than technical intricacies is organizing a global supply chain, marketing, and customer support." Each entrepreneurial endeavor must have a solid business plan in place before it can begin. In his example, he argues that it makes no sense to develop an SMS-based service for a nation where sending SMSs is free and the operator is not allowed to charge for it. The service has just been debuted, thus it is too soon to anticipate use trends, client satisfaction levels, or the business's overall performance. Launching this service in a nation where SMS services are extensively utilized and mobile phones are everywhere seems logical. If the service is as simple to use as claimed, it can easily take its position alongside e-check-in and check-in kiosks. In much of Europe where SMS use is prevalent, expanding the service to include, for example, Finnair's partner airlines, may be possible[2], [3].

## DISCUSSION

### Three Rules of Thumb

We will next put forward three general guidelines that managers may use to determine why, when, and how to integrate e- and/or m-business components into their existing firms or to start a new venture based on e- and/or m-business components. The guidelines offered are clarified, analytically commented upon, and will provide managers with straightforward guidance on some fundamental concerns with the use of e- and m-business components in enterprises[4].

#### **First rule: E- is not free**

When it comes to profitability, managers' purchases of e- and m-business components are no different from any other purchases they make for their companies they must be profitable. In other words, investments are only considered professional if the revenues cover the cost of the investments and provide a sufficient return on the money invested. The risk associated with each investment must be evaluated individually; investments in e- and m-business components cannot be claimed to be categorically riskier than any other sorts of investments. Investments in e- and m-business components should be valued using conservative projections of future cash flows. Erroneous assumptions lead to certain typical blunders that result in excessively optimistic cash flow forecasts from e- and m-business components, including: The assumption that e- and m-business components are somehow less expensive than other investments is false. It is well known that investments in information systems that are quite near to each other have a poor track record for being able to remain under budget. It suffices to see the difficulties that many businesses are having with implementation.

It is a mistake to not include in the expenses of modifications that must be made to other current business practices in order for e- and m-business components to function. These expenses must be included into the overall cost of investments in e- and m-business component. It is erroneous to believe that investments in e- and m-business components will always result in the greater potential they provide. The best-case scenario is one in which all potential is realized, but how often do things go according to plan? One must be aware of the valuation techniques, their

potential, and most importantly, their limits when assessing potential. It is incorrect to assume that just because e- and m-business components reflect cutting-edge technology, they will generate revenues. We refer to this as the "engineer's method," and it is unsuccessful. The newest technology is fascinating, but it does not ensure success. It is simple to cite several instances when markets have not accepted better technology, such as the Beta vs. VHS video standard and the OS/2 vs. Microsoft Windows comparisons. Realistic thinking and pragmatic expectations are the foundations of good expectations. Even a somewhat negative outlook on the future might sometimes be helpful, particularly for startups battling with little resources. Many small, entrepreneurial enterprises want funds immediately; they cannot wait for the potential of investments in e- and m-business component businesses to be realized. Examples of situations in which e- and m-component investments may produce nearly instantly and, as a result, the harvesting of the investment's returns can commence quite quickly are as follows:

- i. Instances where elements of e- and m-business may be utilized to replace older, costlier methods of doing business
- ii. Instances when the usage of e- and m-business components may make it possible for a corporation to do business in a manner that would otherwise be prohibitively costly
- iii. Situations in which e- and m-business components substantially complement the company value chain by adding value to the client[5].

**Rule 2: Everything happens at the right time.**

Even if you have the greatest idea in the world, it won't work if you are not at the correct place and time. This truism, which is particularly relevant to e- and m-business components, states that if an invention is not yet in the utilisation phase or if a business idea innovation requires current technology, the profits are probably still a ways off. The availability of mobile devices was deemed to be the least of all imaginable impediments by mobile commerce businesses, according to a 2001 survey that asked the companies what they believed to be the biggest barriers to mobile commerce. It seems that businesses do not understand the environment in which they operate well enough. Sui gadgets may be found in stores, but it does not guarantee that customers have really obtained them. One may argue that the chances of a widespread WAP success were limited to none in 2001 since a sizable proportion of users did not possess a sui device. WAP services were largely marketed as a technology rather than as value-added services, therefore the typical user did not feel a need to update their device.

It makes worthwhile to investigate if the "place" may be created at a reasonable cost if the moment and circumstances are favorable. For instance, NTT Docomo succeeded in creating the ideal environment for the success of i-Mode by massively subsidizing user-friendly replacement mobile phones. Millions of Japanese customers now use interactive mobile services as part of their daily lives thanks to their success.

This kind of proactive, business-oriented approach to m-business innovation is an example of effective strategic marketing. It makes sense to wait and see, to license out or sell the concept to someone else ready to wait or eager to be proactive if the location is appropriate but the time is not. In order to implement 3G services that they were not prepared to invest in themselves, several governments in Europe, for instance, sold their 3G bandwidths to private corporations. In conclusion, a larger chance of success results from being in the right location at the right moment. The foundation for the effective deployment of e- and m-business components is not technology alone, nor is business logic alone.



**Guideline 3: Reliable Clientele Discover Fresh E- and M-Tricks**

Unsophisticated clients may accept sophisticated e- and m-business aspects if they are made simple to use and if they provide the customer with significant advantages. Businesses should strive to deliver "must-have" services rather than "nice-to-have" ones. Once again, popular technology must be presented to consumers as user-friendly, value-added services in order to succeed in the market. It has been discovered that ease of use, which is critical in e-business performed online, is much more crucial in a wireless m-business scenario. Customers are more inclined to accept technology when they see a compelling proposition. A product or service that relies on an e- or m-business component is faulty if it does not offer the functionality or value added that was promised, just like any other broken product. Regardless of the strategy, the product must be finalized before release to avoid irreparable harm to the chances of achieving widespread success. Each new invention that replaces an existing one must function at least as well as the existing one in order to be quickly adopted. If new e- and m-business component-based services are sufficiently superior to current practices to warrant learning, they may replace the latter. When there is a will, there is a means, thus customers must desire to adapt.

Each of the scenarios shown demonstrates a certain additional value for the clients: Due to the direct cost savings that was passed on to the customer, the Omena Hotellit Internet booking system has reduced the cost of the room and made the product much more appealing. The consumer is given value in the form of increased speed and convenience in the situations of Finnair/Book-IT and HKL mobile ticket. In the instance of HKL, the product has already shown its viability; having to learn how to send a text message and get an m-ticket is more than made up for by the fact that one no longer has to carry extra cash in order to travel by local traffic in Helsinki. Our third suggested guideline is supported by published research on technology acceptability and adoption. Bottom-line: Consider the e- and m-business elements from the perspective of the clients. Whenever there is a will, there is a way, provided the end result justifies the "cost" of learning. For a long time, entrepreneurship has been seen as a key economic activity. Research on entrepreneurs and their behaviors has exploded over the last 20 years, with special emphasis placed on the factors that make successful entrepreneurship.

Without a question, entrepreneurship has a significant influence on both the economy and society. According to a study from the Global Entrepreneurship Monitor from 2004, a sizable number of individuals all around the globe are involved in entrepreneurial endeavors. GEM study estimates that 73 million individuals are entrepreneurs based on a survey of 34 nations with a combined labor force of 566 million people. The research also demonstrates that there are considerable regional, firm type, and entrepreneurial motivational differences in entrepreneurial activity. As an example, since the World Wide Web's inception in 1993, hundreds of business endeavors have been created as a result of the widespread usage of this enormous network that connects computers all over the world via the Internet and provides users with access to an abundance of information.

It is not surprising that entrepreneurs come in a wide range of backgrounds and company ventures. You may discover another entirely different, successful entrepreneur that exhibits various qualities and behaviors for every trait or action that distinguishes one successful entrepreneur. For instance, there are four major groups of entrepreneurs: home-based business owners, serial entrepreneurs, conventional business owners, and more recently, cyber entrepreneurs. The first three categories go without saying, but the emergence of the commercial

Internet gave rise to a new kind of entrepreneur known as a "cyberpreneur," who takes pleasure in the fact that they do not operate in the traditional "bricks-and-mortar" sense. Cyber entrepreneurs engage with digital goods and services that don't need brick-and-mortar infrastructure like physical distribution and storage and conduct all of their business online with consumers, suppliers, and other parties. Venkataraman adds that little prior study has taken into account the interconnected and contextual character of entrepreneurship. Most scholars characterize the topic exclusively in terms of what and who entrepreneurs are, irrespective of the contexts in which they operate.

## **Entrepreneurship**

There are about as many definitions of entrepreneurship as there are authors who have written about it. Entrepreneurship has long been defined by researchers and writers using terms like innovative, imaginative, adaptable, dynamic, creative, and risk-taking. Many business professionals agree that seeing and grabbing opportunities is an essential component of doing company. According to some writers, entrepreneurship involves a single person or a small group of partners purposefully creating value via organization. It also includes the processes of starting or growing a lucrative new firm, introducing a new product or service, and creating a new market for an already existing good or service. In another case, the definition of entrepreneurship is given as "the act of creating something different with value by devoting the required time and effort, taking the associated financial, psychological, and social risks, and reaping the rewards of money and personal pleasure."

In summary, *entre*, which means "between," and *prendre*, which means "to take," are the two French words that gave rise to the English word "entrepreneurship." Those who "undertake" duties like starting a new company or who "take on the risk" between buyers and sellers were the first people to whom the expression was used. It's crucial to understand the distinctions between entrepreneurs and innovators at this time. An inventor creates novel ideas. A successful entrepreneur accumulates and then combines all the resources necessary to transform an idea into a profitable firm, including money, people, a business plan, a strategy, and the willingness to take risks[6].

The act of individuals taking advantage of possibilities regardless of the resources they currently have is referred to as "entrepreneurship." Entrepreneurial conduct is centered on identifying possibilities and carrying out clever suggestions. The actions needed by this habit may be carried out by an individual or a group, and they often call for creativity, tenacity, and a willingness to accept risks. It need not be a novel good or service, just a different viewpoint and the desire to work hard and take chances. While most people associate entrepreneurship with starting a new firm, it is often seen as an individual activity. Yet continuing businesses may also act entrepreneurially. Established businesses with an entrepreneurial focus are often aggressive, inventive, and risk-taking. It's important to note that the level of entrepreneurship may vary on the sector. For instance, entrepreneurial activity is more likely to be encouraged under unstable environments.

## **Entrepreneurial Personalities**

There is no one kind of entrepreneur, and no one set of traits can determine who will become one or if they will succeed. Thus, it seems that one essential quality of entrepreneurs is variety. Even with such a vast range of meanings, there are certain recurring patterns that may be found. While

It's said that entrepreneurship theory is immature, the literature does show a focus on the success or failure of certain entrepreneurs and businesses. A more thorough understanding of successful entrepreneurship that is based on both foundational classics and more modern books in the area is more beneficial. As a consequence, entrepreneurship is seen in a way that incorporates aspects of invention, social and economic change, risk, and reward. These characteristics of successful entrepreneurship are largely acknowledged in more recent research that supports a focus on the actions involved in starting new businesses. The following traits seem to be shown by a "entrepreneur" by fusing the many viewpoints of elements: Entrepreneurs are seen favorably in part because of their vision, which allows them to perceive possibilities in the future that others in their field do not. The capacity of entrepreneurs to put that vision into action or to build the future they envisioned is also essential to their success. Since it can only be a dream without action.

Innovation is the process of modifying, revolutionizing, transforming, and introducing new ways or systems. Entrepreneurs are persons who establish new markets, new goods, and/or new services. As a result, innovators provide resources a new ability to produce riches. Crucially, innovation enables business owners to keep one step ahead of copycats by either revolutionizing ideas or evolving methods[2].

Passion for the company: This passion usually comes from the owner's conviction that the company will have a good impact on people's lives. This drive is what drives individuals to quit safe employment to found their own businesses, and it's what drives billionaires like Bill Gates of Microsoft and Michael Dell of Dell Computers to keep working even after they have achieved financial security. A business owner has to be passionate since, although being lucrative, beginning and growing a new company is challenging. Entrepreneurship is not for someone with a weak commitment. A word of caution: It's good to be enthused about a company concept, but it's also critical to be aware of any dangers and weaknesses it may have. Also, an entrepreneur has to be adaptable enough to change the plan as needed.

Focus on products and customers: This emphasizes an awareness of the two key components of every firm. The fact that the majority of successful businesspeople are, at their core, artisans contributes to an entrepreneur's acute concentration on goods and clients. This is crucial to keep in mind, especially at a time when it might be tempting to think that every technological advancement will lead to the creation of new enterprises. Opportunity identification: Entrepreneurs take advantage of opportunities, whether they are generated or discovered. The unique skill of entrepreneurs is in identifying and seizing certain opportunities. Successful businesspeople, as shown by Sarasvathy, Simon, and Lave, recognize opportunities where others often see risks. Also, "they can see chances that transform the ordinary into the unusual and unexpected." Hence, parts of vision and creativity are influenced by the idea of opportunity identification.

Generating value entails, the capacity to transform a sound business concept into a workable enterprise. This include creating a business plan, assembling a team for a new endeavor, acquiring capital, forming alliances, managing finances, directing and inspiring people, and so forth. It also calls for the capacity to convert ideas, imagination, and creativity into definable actions and outcomes. Growth: traditionally, measurable growth indicators like as revenue growth, market share growth, and profit growth have been included in definitions of

entrepreneurial success. Yet, it may sometimes come at the expense of failing to take into account the intangible benefits of expanding a firm and seizing new chances.

Social and economic development: it's debatable whether or not compensation for the individual entrepreneurs is a significant result of entrepreneurial activity. Entrepreneurs, according to Longenecker, McKinney, and Moore, are more inclined than other individuals to "approve of acts that maximize personal financial gains," even when those advantages come at the cost of other people. Therefore, both good and bad economic and societal change may result from entrepreneurial activity. Technology breakthroughs, higher employment and productivity rates, greater quality of life, and more efficiency are all possible positive outcomes. On the other hand, unfavorable results including societal upheaval, environmental harm, and human rights violations might happen. Although it is expected that entrepreneurship would benefit the economy and society, certain breakthroughs may actually have the opposite effect [7].

### CONCLUSION

This paper explores the intriguing topic of firms using e- and m-business components in their operations. In any case, they are often seen as offering a means for firms to stay competitive and maintain their competitive edge. Some utilize them to support and improve their current core businesses, while others use them to develop new core business sectors. A framework is suggested that shows the various e- and m-business orientations that firms have. The framework demonstrates how various orientations may also impact crucial elements crucial to the performance and profitability of investments in e- and m-business component in businesses. This simple framework clarifies a topic that has been on many people's thoughts and has been explored in talks about the philosophy of creation, but is seldom used in the worlds of e- and m-business. Three cases from Finland are presented to illustrate how various businesses with a business-oriented approach to e- and m-business investments have used technology to support and enhance their core business ideas. In Omena Hotellit's case, this has resulted in the development of a new core competency that depends on the use of an e-business component, specifically an e-booking system. The concepts in this are integrated into three general guidelines. Profitability, a practical approach to valuing investments in e- and m-business components, a focus on commercializing e- and m-business inside organizations, and the significance of seeing the e- and m-business component through the eyes of the consumer are all important considerations. This provides some shortcuts for managers considering the proper questions to ask when making investments in e- and m-business components. There are never two companies exactly alike, just as there are never two snowflakes exactly alike, but when things become too heated, businesses melt, just like snowflakes. The suggested guidelines could aid managers in maintaining composure while considering complex e- and m-business plans.

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## CHAPTER 20

### A BRIEF DISCUSSION ON FINANCIAL RISK

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#### **ABSTRACT:**

The likelihood of losing money often refers to financial risk. The likelihood that a company's cash flow won't be sufficient to cover its commitments is the financial risk that is most often mentioned. A government those defaults on its bonds is likewise subject to financial danger. in this chapter author is discusses the customers and suppliers' businesses. The driving factors in the technology-based business have a lot of ramifications for cyber entrepreneurs. They include constant flux and change, a decline in the demand for material possessions, disappearing boundaries, and accelerated time. In the context of business today, change is a given. Success in the modern economy also depends on factors other than just material possessions. Value may be found in material things like data, people, concepts, and expertise. Also, the impact of distance on organizational choices has vanished.

#### **KEYWORDS:**

Business, Customer, E-Commerce, Financial Risk, Fund.

#### **INTRODUCTION**

Financial risk is almost always involved in business decisions, both for the individual business owner and for outside investors. It's common for a return on investment in the firm to be unpredictable, but it's this uncertainty that first creates the chance for profit. The way that entrepreneurs see and handle risk has a significant impact on their success. tenacity in the face of defeat Entrepreneurs often attempt new things, thus there is a great likelihood that their endeavors will fail. Before success is achieved, a new company concept may need to be developed via a certain amount of trial. Failures and setbacks are inevitable throughout this process. Entrepreneurs' capacity to persist despite obstacles and failures will be put to the test. In reality, while exploring new ideas, a certain amount of dread is beneficial. Overall, it seems that most people agree that an entrepreneur has to have an original idea that they are passionate about. They do this while being customer-focused, able to see opportunities, and capable of adding value with the goal of fostering both growth and fundamental transformation. Paradoxically, it is a fallacy that business owners are willing to take chances. In reality, failure is common for business owners, but they never give up.

While these studies have shown a number of attributes that entrepreneurs often display, none of them have pinpointed a specific set of qualities necessary for success. Schumpeter's theory of "creative destruction," which is the process by which inferior goods, services, concepts, and enterprises are replaced with superior ones, was added to this problem. He thought that superior

methods and products replaced less-than-ideal ones via the process of creative destruction. Hence, we should acknowledge the crucial role that the entrepreneur performs, rather than using a checklist method. It is a process, and a process is a series of continuing judgments and deeds. Entrepreneurship is a long-term process that doesn't happen all at once. From early start-up through management of the entrepreneurial enterprise to, at some point, departing it, it entails a succession of choices and activities[1], [2].

In particular, the technology sector presents new possibilities and difficulties for existing and aspiring business owners at a time when the traditional thinking about how to go and what it takes to succeed is no longer valid. There are important driving factors at work in this sector that must be taken into account. First, there is the function of information, which is now easily accessible to virtually everyone from anywhere in the world at any time of day and in almost any format. The nature of the economy has been fundamentally altered by the very immediate availability of practically any sort of information. This thus has an impact on the environment for entrepreneurship. The second technical trend is the widespread use of technology by all businesses, irrespective of their size, nature, or location. All organizations employ technology, even if some are by necessity more technologically advanced than others.

The way we operate and the sort of job we perform are undoubtedly changing as a result of technological changes. The increasing rate of technological change and diffusion, the increased commercialization of innovations, the intensification of knowledge, and the growing acceptance that cutting-edge information technologies are the foundation of successful businesses are four major technological trends that are having an impact on the context of entrepreneurship. Thirdly, globalization is the linking of economies and cultures that promotes an international economic environment and a level playing field for competitors. Finally, shifting demographics reveals a number of important population data, including: The world's population is aging and becoming younger at the same time, it is still increasing geometrically, it is moving, most of the economically active people live in cities and urban regions, and there are three basic demographic groups that make up the global population.

The following case study, which illustrates online business prospects, makes all these factors clear. Everything began in May 2001. Michael and Lisa, two foreign students, were seeking for lodging in Melbourne, Australia. Both of them were enrolled in undergraduate IT degree programs at different colleges. Both of these students found house shopping to be a challenging and time-consuming process since they had to visit real estate offices during work hours while still attending courses. They hoped they could explore a website that had details about shared accommodations for students since they had a lot of work to do in order to keep up with readings, complete assignments and projects, and attend lectures. Hence, the concept for an online housing service for foreign students was born[3].

Michael had some interest in starting and running a small company, but without money and a strategy, it was just a wish. As their difficulty in finding suitable lodging grew, Michael and Lisa started conversations with other foreign students at their respective colleges to gauge interest in an online lodging business. To better understand the selection and enrolling procedures for overseas students, they visited with representatives of one university's international office. When international students applied to study at these colleges, they needed to know whether the university would be willing to provide them with an extra service, such lodging. RMIT University was encouraging students to take part in business proposal contests at the same time.

These contests help students develop ideas and turn them into business plans. This contest offered awards ranging from \$1,000 to \$30,000. The competition's structure was borrowed from Michigan Institute of Technology in the US. Students working together may come from various institutions and academic fields. An academic mentor with relevant expertise, knowledge, and interest was assigned to each group. Michael and Lisa were pursuing bachelor's degrees in information technology at RMIT University and the University of Melbourne, respectively. They developed a solution to a genuine issue faced by foreign students in Australia. Both of them joined a team and took part in the RMIT University's business proposal competition.

### **Development Method**

Michael and Lisa were inspired by the competition to begin developing a business plan for a modest start-up online company. They discussed concerns about lodgings with other foreign students in Melbourne, found trustworthy real estate brokers, and looked into the rules for leasing and purchasing property legally. They were enrolled in IT degrees, which equipped them with the necessary expertise to launch an online company. Model for business and revenue. Having a revenue model in place to anticipate revenue streams and earnings is crucial for every organization. To provide a broker service to the students and the real estate brokers, these entrepreneurs were to set up a firm on the Internet, often known as a cyber business. The student would pay for the service and the agents would provide a list of properties to be added to the database.

Electronic cash transfer, payment upon arrival in Australia, and payment by credit card were the three payment options deemed appropriate for this enterprise. Each approach's benefits and drawbacks were carefully weighed. A 72-hour electronic financial transfer came with expensive bank fees.

There was no way to tell whether a client was real until a payment was made up front. The real estate agents also demanded cash within 24 hours in order to retain a house for a client. Payment upon arrival in Australia was therefore eliminated, leaving just the credit card payment method as a suitable option. This was regarded as the finest since it allowed for rapid payments, allowed for the identification of real clients, and had less fees than electronic money transfers.

The business model was created with the help of a mentor who had extensive knowledge of entrepreneurship, significant experience in specific industries, or was an MBA or other business discipline postgraduate of the University. The business model was a start-up cyber business offering broker service.

To form teams, a networking event was planned. When the team had been verified, the entrepreneurs conducted a survey with the customers to uncover problems related to lodging in Australia. A questionnaire was sent to incoming foreign students at RMIT University and the University of Melbourne during orientation sessions in order to conduct these surveys. Via their organizations, other overseas students were approached. The Australian Bureau of Statistics provided some information on the number of foreign students who come to Australia each year. As the data was analyzed, it became clear that around 50% of the students wanted to book housing before they left for Australia. According to survey results, these services are clearly needed for foreign students. This gave Michael and Lisa the courage to start working on their business plan for an Internet start-up.



## DISCUSSION

### Customers and Suppliers

This company sold to consumers who were located all over the world and made purchases without seeing the goods first. It was crucial to build a relationship of trust with these consumers if we were to be successful. The following concerns were taken into account in doing this: Most of them were first-time foreign students who had never visited Australia. As they live with their parents and in joint families, the majority of them, who are from South East Asia, would have never rented a house before now. To ensure that they understood the legal and contractual obligations they would be engaging into, it was crucial to gain the confidence of both customers and suppliers and to educate them about the rental market and the Australian Tenancy Act.

Every partner relationship management concern has to be carefully taken into account. The real estate agency need some assurance that the renters would keep their word and wouldn't back out once they landed in Australia. If a buyer changed his or her mind, they would not lose the associated time, effort, and money. Also, it would harm their connection with their landlord. Entrepreneurs had to do more effort to overcome suppliers' skepticism of the internet world since they had to persuade them that overseas students would be excellent renters. The suppliers' main selling points focused on the benefits, such as lower administrative expenses, fewer students to deal with in person, less paperwork, and a 0% vacancy rate since tenants begin paying rent as soon as a property becomes available. Tenants were required to pay a security bond and one month's worth of rent upfront in order to obtain a home[4].

Building and sustaining a connection with consumers is crucial for any internet company. Michael and Lisa felt it was crucial that their clients understood precisely what was involved and what they were paying for. It was crucial to assist renters in seeing the apartment's layout and amenities while they were still abroad in order to provide them as much information as possible about the rental property. This might be achieved via immersive 360-degree virtual tours of the property online. The property's rooms could all be seen by renters who could enlarge, reduce, and rotate each space. Programming code was used to integrate a floor plan of each property to assist the consumers in determining the room's proportions. With a compass roving around on the floor plan to represent what the renter was observing, this made the virtual tour interactive. There was also a map that showed the location of each property in relation to Melbourne's several institutions.

Links to papers on tenant obligations, average rent for various property types in various locations, descriptions of the renting procedure, and maps of various regions were provided on the website to assist overseas renters in understanding Australia's rental market. The business strategy was finished and included all necessary information. From the student searching the Internet to them physically traveling to Melbourne and picking up the keys to their apartment, the rental business operations were covered in full. The business plan had to be submitted to judges as part of a competition. To demonstrate how things will operate and find any problems, a prototype had to be built. The following benefits of creating a prototype at this time also included[5]:

Processes and information flow become considerably more transparent. It also assisted in the development of new and improved procedures. It gave a decent indication of the size of the whole system and how long it would take to completely evolve. The usability problems were

built in from the beginning. As previously stated, the Web site served as the exclusive means of contact between rentfast.com and its clients. As the users were foreign students whose first language was not English, it had to be simple to use, easy to comprehend, and culturally appropriate. Another thing to think about was the possibility that parents of students, not simply kids, may be the true clients. As parents are often the source of financial support for students, they typically have a significant effect on where they choose to live. As a result, more thorough descriptions of the problems were added. It assisted in identifying the website information areas that need security. It gave others a better idea of what it was trying to accomplish. The service that this company will provide to business partners was simple to convey.

The payment mechanism was left out of the prototype because, although it was possible to win over real estate agents via several face-to-face meetings, doing so with banks proved to be more challenging. This occurred because a purely online firm was unable to meet the banks' need for a physical site for the business. Orientation for Teams. An experienced and competent scholar was assigned as this project's mentor, and they offered guidance throughout the whole development period. Several technological and commercial challenges were helped by his inquiries. He offered inspiration that many aspiring business owners would have valued. Later on, a programmer was added to the team to assist in creating the business system.

Presentation of a business plan. The judges' panel heard Michael and Lisa's proposal for a new cyber enterprise. The presentation sparked a lot of interest among the audience members, some of whom promised to help promote the company. The business plan structure left a lasting impression on the judging panel. It included illustrations and was simple to read and comprehend. The business proposal placed second in the competition and was awarded \$5,000. Along with Lisa and Michael's \$12,000 gift, this sum paid for the system's development and website hosting. This initiative received a lot of attention from the University thanks to the RMIT Business Plan Competition. When the university's study abroad program contacted Michael and Lisa about using this service for exchange students, another group of customers for the company was discovered.

Development of a system. The creation of the whole system came next. Lisa created the website, which served as the online storefront. Due to the sensitivity of credit card information and the need for a secure connection, the back-end turned out to require extra effort. A programmer was engaged to write the advanced level programs that were necessary. The database utilized was php/MySQL, which is stable and scalable and is open source and free to use. Additional benefits of utilizing this database include the fact that it is open-source, has been used successfully as a database server, can handle big databases, and can be quickly connected to the HTML pages on a Unix server using php scripts.

A decent notion of what rentfast would look like emerged after the information flow and procedures were established, and work on the web-based company's development started. System analysis and business requirement analysis meetings were the first steps in the system development process. Michael, the coder, and Lisa completed this. On paper, the Web site's layout and capabilities were described in great detail. All restrictions were considered, and a paper prototype of the website was made. Lisa kept an eye on everything, while Michael was in charge of the money. The adoption of this cyber enterprise by appropriate clients was highly reliant on financial considerations. Although if a website's traffic count might be promising, completed transactions are more helpful for an online company. While an internet firm had the

benefit of being less capital expensive, it was impossible to foresee if this venture would be a success. A virtual firm has fewer workers and does not need physical premises with the related lease, rates, bills, and asset insurance. Just a fax machine, a camera, a tripod, several lenses, a few laptop computers, the necessary software, and the Web site itself were needed as assets[6].

It was anticipated that the system development process would take roughly three months. It was decided to employ a coder during this time frame. The coach proposed using the Xtreme programming style to create the system. The principles of simplicity, communication, feedback, and bravery serve as the foundation for this programming style. It gathers the whole team and provides sufficient feedback to let them know where they stand. It aids in the quicker discovery of software flaws. System development for the company got underway in late November 2001. By February 2002, the website should have been completed. The project, however, did not proceed as well as expected. The Web site was divided into two sections: the administrative site and the public site. The administrative site was for the rentfast staff to track customers, add properties, and run reports on both properties and site users, while the public site was the portion of the website that consumers would view and utilize. From the perspective of the entrepreneurs, the administrative component was crucial to the system's continued development and construction.

a website. Prospective customers' e-mail advertisements were required in order to collect crucial consumer information. To accomplish this, the Web site was created to require registration before clients could access the database of properties. They were able to browse the website's brochure section but not the homes. The registration included information on the clients' country of origin, email address, chosen home type, number of bedrooms, university they intended to attend, and projected arrival date in Australia. The rentfast.com staff was able to make decisions on the kinds of properties to add to its databases thanks to this information. Because most of the clients were shopping for one-bedroom flats, it was unnecessary, for instance, to have three-bedroom houses in the database[7].

Also, the website included features that assisted students with the application process. Among them were: Via an interactive floor plan and a virtual tour, they were able to see the property. They were able to narrow down a list of homes they were considering. They might store this shortlist, revisit the website the following day, and add to it or remove certain properties. They were able to submit a list of the properties they were looking at. They might use it to see whether their application was approved, refused, pending, or currently being processed. They had the option to complete a property profile so that rentfast could give them details on houses that matched their profile. The Web site seemed to be far from done after a few months of diligent labor. The functions turned out to be more difficult than expected. This happened because more restrictions had to be introduced than had been previously thought. There had to be a lot of data cleansing done to make sure there was no trash data in the database. A variety of businesses were approached at this time to host the website. Here, the issues were that either these firms couldn't handle the MySQL-based PHP technology or they were too costly. A U.S.-based firm that could handle MySQL was first chosen, but because they couldn't provide a 24-hour, 7-day hosting service, a refund was requested from them in order to choose another host. The system's hired programmer had grown his company in the meantime and agreed to host rentfast.com.au.

The founders had to add the payment system to accommodate credit card payments as the system evolved. They contacted several Australian banks, which examined the business plan and ultimately denied the application for the following reasons: Banks considered a cyber-firm to be high-risk since transactions were to be performed without a physical card present. This business had no real physical locations and operated entirely online. One transaction on the card can be worth up to \$2,000, thus chargebacks would wind up costing the banks a lot of money. There was no consistent cash flow shown by the financial accounts. This company was brand-new and had no prior customers. Due to the fact that it was an internet business with no assets, it was deemed ineligible for a merchant facility.

This didn't really offer a product; it was just a service. The telegraphic transfer payment method was required for this firm to operate. Towards the tail end of May 2002, the website went live. Students may browse a database of homes and submit an online application for those that caught their eye. The company was now operational. At this point, the mentor offered Lisa and Michael assistance by recommending that a fixed fee be applied to real estate brokers rather than students. For Lisa and Michael, this would have provided a steady stream of cash.

Marketing. Brochures were created at this time with the purpose of distributing them to foreign students from all Australian colleges as well as to particular International Development Program offices throughout Asia. IDP is a foreign education agency that aids in recruiting students for Australian institutions. For prospective students who want to apply to study at any Australian university, IDP maintains offices all around the globe. She thought that this would be a great way to advertise the company. IDP received a lot of information, but they declined the offer since they were wary about a new company. They found it impossible to accept anything else than in-person discussions and negotiations. RMIT University agreed to help after significant persuasion and provided the firm brochure along with their standard acceptance/enrollment documents[8].

With each failure, Michael and Lisa were able to come up with fresher, more effective ideas for growing their company. At RMIT University and the University of Melbourne, additional brainstorming sessions with overseas students were scheduled. This brought to light the fact that many South East Asian students must take the IELTS English exam in order to be accepted into an Australian institution. There are several English language schools throughout Asia that may assist these pupils. To check whether they would hand out the rentfast brochures to pupils, the schools were called. They promised to pitch in. There was only one opportunity, yet it wasn't enough for the firm to succeed. At the same time, Lisa learned that the company could place an ad in a magazine that IDP sends to all of its locations worldwide. While this campaign was costly, the business owners had few other options.

Moreover, friends and family may provide information to international students. Approximately one out of every five presently enrolled foreign students knows someone who is going to study abroad in Australia. Another strategy for promoting the company was via secondary or word-of-mouth marketing. To spread their message, Lisa and Michael got in touch with the RMIT Association of International Students and the Melbourne University Overseas Student Service. All of the current foreign students registered by these two organizations get a copy of their magazine in the mail. For a modest cost, rentfast brochures were sent with the magazine.

By the middle of June 2002, the company had begun to get "hits" and was inundated with emails. It brought attention to the desire for certain kinds of qualities. For instance, smaller lodgings, such as studio flats, were chosen over bigger ones. By sending useful, courteous, and kind emails

in response to the potential customers' emails, the business owners attempted to establish a rapport with them. Moreover, assistance was provided. Final Results. Just five clients made an online payment and completely used the service over the period of May to September 2002, despite the company receiving 150,000 visits during that time. This was successful in terms of system development since it accomplished its goals. It was unsuccessful from a business standpoint since there were few completed deals. Michael and Lisa defined their achievement as a learning opportunity rather than in monetary terms. After then, they have gone on to new projects.

Intriguing problems facing cyber entrepreneurs included: It was very simple to pique clients' curiosity, but incredibly challenging to seal the deal and execute the transaction. It was challenging for the consumers to accept that they had to pay the bond, the first month's rent, and a broker service fee before they could go to Australia. This is due to people's mistrust and lack of faith in internet businesses. This method of doing business was unfamiliar and daunting to many. Several clients preferred firsthand viewing of houses over virtual tours and interactive floor layouts. Several clients were hesitant to utilize the service because they were unfamiliar with rental concerns including contracts, bonds, and upfront payment. When clients came from other nations with different legal requirements, this situation would become much worse. It's interesting to note that this service was more well-liked by European exchange students at Australian institutions than by Asian students.

This case study serves as an illustration of an Internet start-up business created by two online business owners. The Internet is a brand-new platform for company creation that gives individuals with less cash access to entrepreneurial prospects. It makes it possible for individuals to materialize company concepts. Also, it is clear from the case study that, similar to other businesses, building an enterprise requires a business strategy and a revenue model. For their businesses to be accepted by customers, the cyber entrepreneurs in the example had to put a lot of work into marketing and promotion. This is partly because internet enterprises are still relatively new and because company culture has changed. How then do these online business owners match the "characteristics" discovered by researchers?[9]

The idea that there was a chance to accept foreign students and that technology is a key facilitator of this ambition was one that Lisa and Michael shared. Nevertheless, having a vision without acting on it is just a dream. As a result, they were creative in creating a new service that was technology-based and one of the first, which enabled these business owners to keep ahead of other creative competitors. During the conversation, it was clear that these two cyber entrepreneurs were passionate about their work. They were entirely devoted to the development of this project despite significant obstacles, and they maintained flexibility when it came time to engage with important players as necessary. Their excitement spread, and despite the project being new and untested, they were able to persuade skeptics to embrace it.

But, in order for such an endeavor to succeed, practical techniques must be used; in this case, they identified and comprehended their target audience. It was based on firsthand knowledge since they were aware of the enormous pool of prospective customers and the glaring lack of such a Web site service. Their first concept was sparked by the competition, but the true potential lay in using the Internet. As they were able to convey their vision by being inventive in establishing the system on the Internet, as proved by the successful hit rate, the process of garnering approval and support for the endeavor demonstrated that it was viable as a company.

As a result, value creation resulted in personal development, especially in terms of intangible traits like boosted confidence and better business savvy. Their business has had the effect of bringing the Internet back into prominence as a platform for entrepreneurs. For instance, it will now alter the routines and expectations of foreign students while they are looking for housing. This scenario is just one of the innumerable chances that exist for anyone with the vision and dedication to take use of the Internet as a tool for making their goals come true. Of course, this does not stand alone. It is foolishness to take risks without thinking about the repercussions. Entrepreneurs don't gamble per se, but they do take "calculated" risks in that they weigh the likelihood of success against the risk to the extent that it is manageable. Entrepreneurs are often associated with short-term results, but when it comes to technology-based applications, they are more long-term focused. This leads to an essential trait: entrepreneurs don't mind making mistakes. A phrase like that is really not in their lexicon since it is thought to be a stage of the learning process. The particular feature of cyberentrepreneurship is that it relates to technology-based businesses, as was already mentioned. In this case, it was determined that teamwork and partner relationship management concerns were crucial for finishing the project in addition to appealing to tech-savvy individuals. Entrepreneurial traits deemed crucial for success include their upbeat attitudes and capacity to come up with innovative solutions to problems. While their persistence and perseverance led to the project's development and execution, the entrepreneurs' competitive spirit provided them with an additional dose of motivation. For online start-up firms, they identified client challenges, addressing worldwide and cultural applications, as well as building trust with all participants. In conclusion, there are several difficulties for online business owners. These concerns range from establishing up a technology-based firm to convincing stakeholders to accept and support an online enterprise, securing funding, creating safe transactions, and turning it into a profitable business by winning over clients.

### CONCLUSION

The potential market for a cyber-entrepreneur is everywhere, but so are the rivals. The boundaries of time have vanished along with those of physical place. Instant communication between clients and businesses, between staff members, and between firms and suppliers has produced a situation where a company's competitive edge may only last a short while if it does not keep up with the times. An entrepreneur is someone who develops a fresh opportunity in the marketplace and gathers the resources required to effectively exploit that opportunity, it may be inferred from the topics mentioned. Since they have a highly developed opportunistic attitude, entrepreneurs may notice opportunities where others cannot. They usually build growth-oriented, creative enterprises that provide value where none previously existed, upset the economic balance, and transform how we do business. It's difficult to explain what entrepreneurs do in any given business. The particular tasks that entrepreneurs do vary from one business to another. In a broad sense, entrepreneurs are developing fresh, distinctive things. They are looking for change, embracing it, and taking advantage of it. Cyber businesses have a great potential thanks to the Internet.

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## CHAPTER 21

# ONLINE INFORMATION PRIVACY AND ITS IMPLICATIONS FOR E-ENTREPRENEURSHIP OR E-BUSINESS ETHICS

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### **ABSTRACT:**

This chapter discusses the results of a nationwide study that looked at Australian Internet users' views and behaviors concerning online information privacy. The survey used a typology, which combines behavioral data with particular demographic and attitudinal variables. The includes a thorough analysis of the internal, external/environmental, and behavioral aspects of information privacy, as well as a general profile of all respondents and a profile of each of the typologies. Furthermore, explored are the implications of the results for e-entrepreneurship and e-business ethics.

### **KEYWORDS:**

Block Chain Technology, Creative Industries, Digital Copyright, Intellectual Property, Online Piracy.

### **INTRODUCTION**

Owning consumer data is crucial for building customer connections in the e-business environment. If companies know what their consumers currently appreciate and possibly need, they can create value-added product offers and marketing communications, lowering costs and increasing revenues. In the end, gathering customer data may aid businesses in improving the amount and quality of service or product they provide, allowing them to improve their competitiveness and efficiency. But, there is also the possibility of a negative cost as a result of the possible legal, moral, and strategic ramifications of this approach and its ability to create privacy issues. According to one definition, information privacy is the right of people to control how, when, and to what degree information about them is shared with others.

Maybe more than any other technology, the Internet has had the most influence on the privacy of personal information. Cyberspace is the best environment in human history to eavesdrop, according to this statement. For instance, utilizing a number of techniques, the Internet may make it easier to acquire customer data overtly or covertly. A consumer's lifestyle and profile may thus be reduced to "bits and bytes" since the medium is entirely digital, exposing a "digital identity" and presenting a number of social norm breaches, including the invasion of information privacy. The Internet also facilitates additional privacy functions, such as physical privacy, via the states of isolation, and to some degree anonymity, in its defense. Nonetheless, public awareness of consumer privacy issues about the information practices of commercial companies is at an all-time high. The perception among many customers that their lives and personal



preferences are being utilized and traded without their knowledge or agreement has hampered the development of e-commerce and reduced consumer confidence in online businesses[1].

As a result, information privacy is now a crucial factor in business strategy. This is true not only so that organizations can comply with consumer ethical obligations or the legal requirements of Australian data protection legislation, but also because fair information practices can be advantageous to business for a number of valid commercial reasons. In reality, it is widely agreed that worries over customer privacy have had both direct and indirect detrimental effects on the Internet's economic viability. Jupiter Communications, for instance, predicted in 1999 that customer worries about privacy would result in a loss of \$18 billion in e-commerce sales by 2002. According to Clarke, there are three ways that consumer privacy issues may affect the purchase of products and services via the Internet: potential costs associated with missing revenue, Shifting of demand toward offline business channels, customers' unmeasured cost of privacy. Also, businesses that do not abide by customer privacy needs risk bad press and a decline in stock price.

Obviously, if customers feel that their privacy concerns are being taken into account, e-commerce might benefit. As a result, Attaran contends that companies might either see privacy as a danger and take defensive action or as an opportunity and take proactive steps to maximize the benefits. The latter is what most businesses do, but retaliatory "firefighting" could not have the intended result of lowering privacy concerns. For instance, Meridien Research claims that a lack of understanding of privacy issues in the finance sector has resulted in spending being misdirected toward technical solutions like encryption, despite the fact that these only serve to raise the costs associated with good privacy practices while doing little to reduce consumer risks.

Culnan and Bies contend, however, that proactive privacy measures may operate as a market segmentation factor. On a practical level, fair information practices also make good business sense. Citigroup reported that they had saved money by only sending direct marketing material to people who had requested it. Culnan and Armstrong discovered that organizations gain a competitive advantage through customer retention when they implement policies to protect individual privacy. In reality, privacy measures may be created to guarantee more accurate records and result in more effective data management, saving a corporation money. The expenses accumulate, according to Smith, when systems need to be upgraded to meet privacy requirements[2].

### **The importance of consumer privacy to consumer trust**

Maintaining customer privacy may benefit businesses by enhancing information efficiency and lowering privacy concerns, but it may also foster online consumer trust. The "sine qua non of the digital economy" has been proclaimed to be trust. Customer trust is, according to Rao and Singhapakdi, an organization's most valuable asset. However, the online environment also suffers from a lack of common legal jurisdiction, along with the high perception of risk typically associated with modern technology. The absence of confidence-engendering measures such as physical proximity, handshakes, body language, and so forth may not be exclusive to Internet relationships.

The connection between buyers and sellers has to be one of mutual trust for Internet commerce to continue to flourish and thrive, but privacy issues will undoubtedly hurt this process, perhaps changing long-term relationship-based commercial partnerships into short-term transactional

ones. In fact, the extensive model of consumer trust in an e-commerce relationship developed by Harrison-McKnight and Chervany shows that Web site information practices have a significant impact on trust-related Internet behaviors like making purchases. Improved consumer trust also makes it more likely that a connection will continue. So, for many businesses, the issue should be not how much strong information practices would cost, but rather what the penalty of not having them would be.

### **Customer privacy as a moral decision**

According to ethical philosophy, online enterprises must handle customer information equitably. In fact, a large number of customers, workers, and shareholders do not think it is right to pursue financial success at the expense of moral ideals. As a result, corporate accountability is now extended to include processes and the effects they have on people and society. It is no longer only restricted to goods and services. Even some financial experts use ethical performance to gauge business profitability.

Consideration of contacts with society as a component of an implicit social contract is one way that organizations might guide their ethical behavior. This suggests that businesses have a duty to uphold societal standards including respect for information privacy and to act in a socially responsible manner. Customers in this circumstance provide their permission for information collection as long as their rights to information privacy are upheld. Consumers are increasingly considering social factors while making purchases, and as a result, they demand ethical company behavior. Singhapakdi, Rawwas, Matra, and Ahmed, as well as Murphy and Laczniak, discovered that customers first form an ethical opinion of a company that is likely to affect their purchase decisions. Moreover, Creyer discovered that although consumers were still inclined to purchase from unethical businesses, they would prefer to do so at lower costs, thus "punishing" the unethical behaviors. Customers "rewarded" ethical corporate behavior by being prepared to pay a higher price.

Unethical information practices may also disrupt the "value chain" of the customer, in which visitors return to websites, get offers, and submit feedback to help them become better over time. Also, Culnan discovered that consumers were more eager to provide information with firms when fair processes were in place to preserve individual privacy[3]. In essence, protecting customer privacy may be seen as a moral decision, a component of customer confidence which is crucial in the internet environment and smart business practice in terms of the effectiveness of information systems.

### **The creation of a privacy typology**

Concerns about information privacy may appear in certain consumer attitudes and behaviors. Businesses may be able to adequately satisfy customers' privacy expectations and control the contextual and personal character of internet information privacy if people can be grouped according to their privacy orientations. As a consequence, this paper presents and examines the findings of an empirical research that sought to identify and model the online information privacy orientations of Australian Internet users by fusing behavioral data with particular demographic and attitudinal characteristics.

The tripartite typology created by Westin in combination with a regular Harris & Associates survey of American consumers' views about privacy served as the basis for this study. The most

recent survey, performed in 2003, revealed that "privacy fundamentalists" are at one extreme of the scale. Fundamentalists are the ones who value their privacy the most, thus they are less prone to act in ways that can jeopardize it. The minority of "privacy uncaring" people are at the opposite extreme of the scale; they place the least importance on their privacy and regularly compromise it in favor of other goals or ideals. The "privacy pragmatists" are a middle ground between these two extremes who, although being worried about their privacy, attempt online Information Privacy and Its Implications for E-Entrepreneurship to strike a balance between the advantages and disadvantages of giving up their private[4], [5].

In conclusion, although Westin's model is concise and unquestionably well-recognized in the literature, it falls short of capturing the nuanced differences between and within each group. In fact, one may argue that it may be hard to adequately capture the intricacies of online privacy in a tripartite paradigm in a setting like the Internet, where privacy seems to be even more context-dependent than conventional off-line situations. In addition, the original model is based on answers to three closed-ended attitude questions, which do not account for all of the fundamental aspects of information privacy. Since Westin's typology is also based on research with American customers, there is a chance that it will not be relevant to Internet users in other countries due to cultural differences. Lastly, it's crucial to remember that privacy, like other values, predicts behavior but does not prove it. While privacy is important, even the most private people sometimes find themselves sacrificing privacy in favor of conflicting goals. This is because our behaviors depend on the person and the situation. Hence, any significant instrument should have both attitudinal and behavioral data[6].

## DISCUSSION

This research expands on Westin's typology by using a tool that assesses the fundamental aspects of online information privacy by fusing demographic and attitudinal data with the internet users' behavioral traits. The resulting typology is referred to as the privacy-sophistication index. "Privacy" relates to people's views and behaviors around the privacy of their online information, while "sophistication" refers to the depth of their Internet experience. According on variables including the amount of time spent online and the number of activities they engage in, Internet users are classified as "experienced" or "inexperienced."

### **Internal Elements Belief**

Trust and privacy are mutually connected; privacy is both required for and reliant on trust. People believe that a website will keep their information private and confidential when they provide personal information to it. There are three different types of trust: disposition to trust personality and cultural elements included, institution-based trust perceived propriety of the circumstances necessary for trust, such as laws and regulations, and first trusting beliefs (reputation, first encounter, etc.).

The value that individuals place on privacy seems to be influenced by each of these factors. For instance, Lyon claims that privacy concerns are less obvious in a setting with plenty of regulations. The PSI uses the degree to which third-party verification tools for privacy practices have an impact on data disclosure to quantify this. Moreover, our privacy standards may be lowered or raised depending on a person's opinion of the organization, or reputation. In fact, since certain industries are seen as being more trustworthy than others, early trusting

assumptions even apply to the sector in which the organization operates. The PSI uses the degree to which a Web site's reputation affects data disclosure to assess this component[7].

Value thought to have been exchanged for privacy lost between advantages obtained. People often give up their privacy in exchange for advantages that are either indicated or anticipated. They might be more intangible advantages like the ease of a Web site "remembering" your registration data, which would expedite the checkout process, or more real advantages like the admission into a competition or a free gift for completing a market research study. So, these advantages could influence a person's readiness to give up privacy. The PSI uses this component to determine how much an individual's willingness to give personal information will be influenced by the value obtained in return for the information. Familiarity with or prior experience with the relevant organization.

Future interactions between people and an organization are substantially shaped by their past encounters. According to Sheehan, Grubbs, Hoy, Lyon, and Zuriek, people are less likely to worry that their privacy would be violated the more comfortable they are with a company. Of course, this assumes that the person only has positive interactions; a bad contact with a company could actually make us more private, even if the connection doesn't terminate. In order to do this, the PSI gauges how much users rely on their familiarity with a website before providing personal information to them.

### **Perceived danger**

Whether they are aware of it or not, people will evaluate the severity of any possible damage to themselves while engaging in a transaction with an organization. The perception of danger in the context of privacy is influenced by a variety of circumstances. Concern for privacy is likely to be strong if the person has previously experienced a privacy violation or if the propriety of the circumstances is viewed as being poor. The way risk is seen may alter over time for a variety of reasons, including the direct consequences of a connection with the organization or indirect causes like an increased knowledge of privacy issues as a result of media reporting. By assessing the degree to which the sensitivity of the data needed and the reputation/trustworthiness of the Web site impact data sharing, the PSI evaluates the link between perceived risk and privacy[2].

### **Specific Psychological Traits**

Smith, Milberg, and Burke discovered that concern for information privacy was impacted by a variety of personality traits. Concern and distrust were shown to positively connect, as were paranoia and the degree of social criticism exhibited by a person. Problems and Solutions for Digital Copyright Protection in the Digital Age. Authors, artists, and creators are given exclusive legal rights over their original works under the notion of copyright, which also gives them control over how their works are used and disseminated. Copyright rules have been increasingly difficult and controversial in the digital era because it is so simple to create and share copies of digital information. The laws and rules governing the use of digital works, such as music, movies, photographs, and software, are referred to as "digital copyright."

### **Digital Copyright's Past**

The way individuals consume and distribute material has changed with the advent of the digital era. There weren't many regulations limiting the usage of digital works in the early days of the internet. Digital material should be accessible to everyone for free use and sharing, according to

many individuals. The need for stricter copyright regulations, however, increased as digital content's worth increased. The Digital Millennium Copyright Act (DMCA), which established a framework for digital copyright protection, was approved by the US in 1998. Digital rights management (DRM) systems, which prohibit the unlawful copying or distribution of digital material, are rendered illegal under the DMCA. Also, it provided "safe harbors" for internet service providers, exempting them from legal responsibility for user-generated material in exchange for compliance with specified guidelines including deleting infringing information after being alerted. Several nations have now adopted their own digital copyright regulations, often modeled on the DMCA. In order to prevent the unlawful dissemination of works protected by copyright, online platforms were compelled to take stricter precautions when the European Union implemented the Copyright Directive in 2019.

### Digital Work Types

A vast variety of works are protected under digital copyright, including:

1. One of the most well-liked types of digital information is music. The ease with which digital music files may be copied and circulated has increased piracy.
2. **Movies:** Another well-liked kind of digital entertainment is movies. While legal access to digital movies has been made simple by streaming services like Netflix and Amazon Prime, piracy is still a concern.
3. **Images:** Digital images, including pictures and graphics, are often covered by copyright laws. It might be challenging to locate copyright holders and get their consent to exploit their creations, however.
4. **Software:** Since it is regarded as a kind of intellectual property, digital software is protected by copyright laws. Software piracy is a significant issue since it may be difficult to enforce copyright laws internationally.
5. **Text:** Digital text, including books and papers, is further protected by copyright laws. Yet, since text-based compositions are so simple to duplicate and distribute, it may be challenging to enforce copyright rules for them[7].

### Copyright Violations

When someone makes use of a work that is protected by a copyright without the owner's consent, this is known as copyright infringement. This includes unauthorized reproduction, distribution, or exhibition of the work. Since it is simpler to create and share copies of digital material, copyright infringement has increased in frequency in the digital era. Copyright violation may have serious repercussions. In rare circumstances, owners of copyrights may demand compensation for lost earnings or profits. In order to stop future infringement, they may also ask for an injunction. Copyright violations in certain nations may lead to penalties and possibly jail time.

### Good Usage

A legal principle known as fair use permits limited uses of works protected by copyright without the owner's consent. The goal of fair use is to strike a compromise between the rights of copyright holders and the public's freedom to access information and ideas. The fair use theory is complex and differs from nation to nation. Four elements are taken into account for determining fair usage in the US:

1. The nature and intent of the usage, including its commercial or nonprofit nature.
2. The characteristics of the protected work.
3. The quantity and importance of the piece utilized in relation to the whole copyrighted work.
4. The impact of the usage on the copyrighted work's potential market or value.

The development of the internet and other digital technologies has brought much attention to the complicated and diverse subject of digital copyright. Copyright laws have had to change to preserve the intellectual property rights of content producers in the digital era since distributing digital information online has become easier and faster. I shall provide an outline of digital copyright, its history, difficulties, and contemporary discussions in this paper. The term "digital copyright" describes the legal authority that digital content producers and authors have to manage and monetize the usage of their works online. It includes a broad spectrum of artistic creations, such as music, movies, literature, software, images, and video games. Creators are given exclusive control over how and by whom their work may be utilized thanks to copyright laws. These privileges include the ability to duplicate, transfer, perform, show, and create derivative works based on the original material.

From the Statute of Anne in 1710, there have been copyright laws in force. Yet, copyright law did not encounter major difficulties until the development of digital technology in the late 20th century. The growing use of the internet and digital technologies opens up new channels for copyright infringement as well as new possibilities for content production and dissemination. The Digital Millennium Copyright Act (DMCA), which offered legal safeguards for copyright holders against digital piracy, was established by the US in 1998 in response to these difficulties. The DMCA made it illegal to create and distribute technology that might get around digital rights management (DRM) systems, which restrict unauthorized access to works protected by copyright.

Several other nations have also passed their own digital copyright laws in addition to the DMCA, such as the European Union, which passed the Directive on Copyright in the Digital Single Market in 2019. This directive adds additional rights for content producers, such as forcing platforms to negotiate agreements with copyright holders for the use of their work, and compels online platforms to bear more responsibility for the information submitted to their sites[8]. There are still numerous difficulties that content producers and copyright holders must overcome despite attempts to preserve digital copyright. The simplicity and quickness of sharing digital information online is one of the main obstacles. Users may instantly share information protected by copyright with millions of individuals worldwide, making it challenging for rights holders to monitor and enforce their claims.

The difficulty of enforcing copyright rules internationally is another obstacle. Given the worldwide reach of the internet, it is difficult to control how copyrighted information is used in many nations, particularly in those where copyright regulations are lax or nonexistent. The appropriate balance between copyright protection and the public's right to access information is also a topic of discussion. Some contend that copyright rules are overly onerous and stifle innovation and access to information, while others assert that copyright laws are essential to safeguard the financial interests of content producers and maintain the production of high-quality material.

Digital copyright is the subject of several continuing discussions, including the place of fair use, the effects of DRM, and the accountability of online platforms for information protected by copyright. A legal principle known as fair use permits the use of copyrighted content without the owner's consent for a variety of reasons, including criticism, commentary, news reporting, teaching, scholarship, and research. Nonetheless, there is ongoing discussion over the definition and use of fair use, particularly in the digital era. Remixing and sampling, which are frequent activities in the music business, are examples of more transformative uses of copyrighted information that some contend should be covered under the fair use doctrine. Others contend that broadening fair usage will violate content producers' rights and stifle originality and creativity. In the modern world, when digital technology has made it possible for creative works to be created, distributed, and consumed on a huge scale, digital copyright is a crucial problem. It is the legal defense given to those who produce digital art, such as software, music, films, pictures, and writing. This protection makes sure that the authors of these works have the ability to manage how they are accessed, shared, and reproduced as well as that they are fairly rewarded for their labors.

The management of digital copyright, however, is a difficult problem with a wide range of viewpoints and beliefs. We will examine the background of digital copyright, the issues and debates surrounding it, as well as some of the suggested remedies, in this conversation. The Statute of Anne, passed in 1710, is credited with establishing the legal notion of copyright and giving writers the exclusive authority to manage the publishing, distribution, and reproduction of their works. When technology advanced in the years that followed, such as with the invention of the printing press and the growth of the music business, copyright law also changed.

Yet when digital technology proliferated in the latter half of the 20th century, copyright law faced further difficulties. Traditional techniques of copyright enforcement were insufficient due to how simple it was to duplicate and distribute digital works online. This sparked a number of legal disputes and discussions over the proper parameters and scope of digital copyright. The *Lotus v. Borland* case from 1995 was one of the most important legal issues in the early days of digital copyright. The usage of a menu command hierarchy like that of Lotus's Lotus 1-2-3 program has led to a copyright infringement lawsuit by Lotus Development Corporation against Borland International. The case's outcome depended on whether software instructions were covered by copyright regulations. The court ultimately decided that they were not, opening the door for the creation of rival software packages that may imitate the user interface of well-known applications.

The 1998 Digital Millennium Copyright Act (DMCA), which was passed in response to worries about internet piracy and the unlawful dissemination of intellectual works, was another significant case in digital copyright. The DMCA includes clauses that made it unlawful to go around digital rights management (DRM) systems that protect copyrighted works against unauthorized access or duplication. Also, the rule allowed for the removal of websites or online services that featured illegal information. Digital copyright is still a contentious topic despite the efforts of governments and content producers to safeguard it. The difficulty of enforcing copyright in the internet age, where material may be quickly duplicated and disseminated across several platforms and territories, is one of the major issues. Unauthorized sharing and downloading of copyrighted products, such as music, movies, and software, has increased as a result.

The conflict between content providers' interests and the general public's desire in having access to knowledge and culture presents another difficulty. While it is the goal of copyright law to establish a balance between these interests, there is much debate over what that balance should be. For instance, some contend that excessively restrictive copyright rules impede innovation and creativity by restricting others' capacity to expand upon or remix preexisting works. Some claim that artists are less likely to devote time and money in producing new works if copyright protection is weak.

For digital copyright, the growth of social media and user-generated material has also brought forth new difficulties. Millions of videos and photographs may be found on sites like Instagram and YouTube, many of which include protected content. Even while certain uses of copyrighted content may be permitted under fair use or other copyright law exceptions, evaluating the legality of each specific usage may be challenging and time-consuming.

Strengthening enforcement methods, such as via greater monitoring and takedown procedures, is one way to solve the problems with digital copyright. To find and delete unauthorized material, this may include collaborating with middlemen like ISPs, search engines, and social media platforms. According to some, this strategy is required to safeguard the rights of artists and guarantee that they are appropriately paid for their efforts.

Reforming copyright laws to more accurately reflect the reality of the digital era is another strategy. For more adaptable uses of copyrighted information, this can include modifying the extent and duration of copyright protection as well as adding additional exceptions and restrictions. For instance, some have suggested a "fair use" concept like the one in the US, which permits certain uses of copyrighted content without the rights holder's consent. Others believe that developing different business models that are more appropriate for the digital era will help solve the problems associated with digital copyright. As an instance, although some artists have experimented with new income sources like item sales or Patron memberships, others have found success using crowd financing sites to support their work. These methods could provide creators a means to make money without depending on conventional copyright enforcement. Encouragement of user-generated material is another strategy that may assist to create communities and promote creativity. By enabling people to produce and share their own movies and music, websites like YouTube and Sound Cloud have found success in this area. The trick is to prevent artists' rights from being violated while yet allowing for creative and transformative uses of copyrighted materials in user-generated content.

## CONCLUSION

Lastly, others suggest creating new technologies that might aid in improving digital copyright protection. New methods for monitoring and detecting pirated material might also be included, as well as improved DRM technologies that are more successful at preventing unlawful copying and dissemination. Yet, detractors contend that such systems may be unduly limiting and may prevent users from making appropriate uses of protected content. Ethics starts at the top, which suggests that anybody in a position of authority should act and live morally to provide a good example for those who work for them. To foster trust and provide honest goods or services, it is crucial to promote ethical conduct across the business environment. Which values will direct your choices is entirely up to you. While others may and will offer you advice, the choice is ultimately yours.



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## CHAPTER 22

### TRENDS AFFECTING THE E-COMMERCE AND INTERNET BUSINESS

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#### **ABSTRACT:**

Through boosting productivity, fostering innovation, and enhancing the shopping experience, e-commerce boosts the economy. This suggests that e-commerce usage may greatly strengthen the nation's economy. In this chapter, the author discusses the windows media center. Companies like Amazon, renowned for their great value at low costs approach, are ideally positioned to thrive as customers are more concerned than ever with getting the lowest pricing. With 1.7 billion users worldwide, including a sizable number of mobile broadband users, the global Internet audience has continued to expand quickly. Growth in 2010 and 2011 will be driven by consumer access to online entertainment, global Internet use in general, and Internet access through mobile devices. As a result of the challenging economic climate, notably in the United States and other countries with high unemployment rates, consumer spending will continue to be relatively weak overall.

#### **KEYWORDS:**

Business, Economy, E-Commerce, Internet, Strategy.

#### **INTRODUCTION**

The global Great Recession of 2008–2009 had a mixed impact on the e-commerce and internet sector. Internet ad sales were weak, and prices were often markedly lower. Despite just a 2.1% increase in sales on eBay in 2009, cost reduction and innovative new techniques allowed earnings to rocket by 34.2%. Amazon has emerged as the clear victor in recent e-commerce, where sales have skyrocketed as a result of aggressive discount pricing and an expanding range of product categories. In 2009, Amazon's sales increased by 27.8% to \$24.5 billion, while its earnings increased significantly. It is obvious that online consumer purchases are becoming more popular throughout the main economies of the globe. Google, the market leader in online advertising, had its fiscal 2009 revenue climb 8.5% to \$23.65 billion while its earnings increased 54.2% to \$6.5 billion.

Around 1.7 billion people use the Internet globally. Globally, broadband subscriber growth is booming. At the end of 2009, there were 578 million broadband customers globally, and analysts at In-Stat predict that figure would rise to over 1 billion by 2013. According to the China Internet Network Information Center, China currently has the most Internet users in the world, with an estimated 384 million as of early 2010. This represents an increase of 86 million during 2009. In the meanwhile, Google and the Chinese government are at odds over the alleged hacking of certain networks that Google thinks originated in China, as well as Chinese government demands

that Google forbid Chinese users of Google's services from accessing many different kinds of Internet sites. According to Chinese rules, websites like the widely used Facebook and YouTube must be prohibited. Smart Chinese citizens may get around this issue by joining virtual private networks (VPNs) hosted in other countries. In these situations, the user initially connects to a foreign network server before browsing the Internet unhindered by the authorities.

At the start of 2010, almost 100 million American households and companies had broadband connection capabilities, in part due to affordable monthly charges from Internet service providers. There are an additional 120 million mobile broadband subscribers who are not included in this figure. This mass market has led to the widespread availability of a broad range of new services, entertainment choices, and time-saving solutions online. With at least 72% of American adults regularly using the internet, the population of the United States is growing increasingly technologically aware.

Both the ease of use of most retail websites and the confidence in the security of online transactions are increasing. The proportion of online advertising to overall advertising is increasing. Around 10% of all advertising spending in the United States in 2009 was made on the internet. According to Plunkett Research, internet advertising in the United States totaled \$25 billion in 2009. If the same 10% ratio were used globally, it would be estimated that \$50 billion was spent globally on internet advertising in 2009. According to experts at eMarketer, total internet sales in the United States were practically unchanged in 2009 at \$131.4 billion, down from \$132.3 billion in 2008, and will increase to \$141.3 billion in 2010. According to eMarketer, internet travel sales in the United States were anticipated to total \$92.6 billion in 2009. Online travel costs worldwide are predicted by Plunkett Research to be about \$300 billion in 2009[1].

As more and more telecommunications shift to the Internet, the corporate sector is undergoing a substantial transformation. Both at home and in the workplace, VOIP is becoming more and more popular. However, the idea of "unified communications" poses the danger of radically revolutionizing workplace communications by integrating all desktop communications, including phone, fax, email, instant messaging, voice mail, and teleconferencing, onto one screen. As email is now, voice exchanges will be digitized and saved. The communication tools a user uses will transfer easily from a PC to a mobile device.

**Convergence Takes Place:** The Internet is about saving time, and its full potential has not been realized. As high-speed broadband Internet access becomes more widespread, new strategies for maximizing efficiency are also becoming well-accepted. Over the world, Internet users are increasing, and many businesses are making enormous profits by providing services to them. The "convergence" of entertainment, computers, and communications has now materialized as a reality. The amazing success of Apple's iTunes online music business is one of the most intriguing instances of such confluence. Viewers are increasingly using the Internet to download television episodes and movies thanks to the iPod, its more recent cousin the iPhone, and other well-liked electronic gadgets.

The most recent TVs have built-in Internet connections now. In the near future, this will cause significant changes in the ways that TV viewers access their favorite shows and movies. The emergence of convergence is also well shown by investments made in digital entertainment by companies like Microsoft, HP, Sony, and others. Internet use and e-commerce will gradually increase as a result of Microsoft's 2007 introduction of the Vista operating system, since increased security is a key component of both Vista and the more current Windows 7. Keep an

eye out; the next five to ten years will be quite interesting, both for users and for businesses that provide Internet-based services.

Travel, apparel and accessories, books, music, films, technology, specialty foods and wines, and clothes and accessories are some of the top selling product and service categories online. Online sales represent a major portion of total revenues in many markets. However, some of the most popular Internet sites are now run by several of the biggest brick-and-mortar shops in the world. For instance, Wal-Mart, Target, Best Buy, J.C. Penney, Sears, Home Depot, Lowes, Macy's, Kohl's, Cabela's, and Barnes & Noble all have very high levels of web traffic. The e-commerce and Internet sectors have swiftly developed since their inception in the 1970s, passing through various different phases. A brief review of the past is necessary before we analyze the trends that are now influencing the Internet business.

**The birth of the Internet:** First, there were the early years, when many people believed that the Internet was solely for techies and that it would lead to few, if any, successful commercial ventures. The Internet was first conceived as a set of communication protocols created by Vinton Cerf as part of a U.S.-funded project in 1973. Defense Advanced Research Projects Agency of the Department of Defense. In November 1977, the first demonstration of a three-network Internet protocol-based link took place. In 1983, a fully functional Internet was finally launched, mainly serving as a failsafe defensive communication system and a channel for researchers at different colleges to connect. **The World Wide Web is Created:** Next, Tim Berners-Lee developed the World Wide Web and the HTML coding language between 1990 and 1993, allowing an endless hyperlinked cyber world where sharing infinite material becomes user-friendly due to the magic of linked pages[2].

**The Surge Continues:** Beginning in 1993 and continuing through 1994, businesspeople and investors understood that hyperlinked, electronically uploaded data had enormous potential for commercialization on a worldwide scale. It was imagined that the retail, publishing, and entertainment industries would undergo a major upheaval, with consumers and businesspeople equally ready to pay for the ease of online trading, purchasing, and data watching. The result was an economic boom that was unprecedented since the early days of prior technical innovations like electricity, the railroad, the telephone, the vehicle, and the passenger aircraft.

Many thousands of optimistic new firms were started. These new Internet-enabled businesses were financed in a variety of ways, from cash-strapped startups using Visa card credit lines to businesses like WebVan that obtained substantial amounts from well managed venture capital firms only to collapse catastrophically. During the boom era, almost 6,000 new, sizable businesses raised a combined total of more than \$100 billion in venture capital. Approximately 450 of these businesses went public by selling their shares. The stock markets skyrocketed, creating millionaires overnight. Families and individuals from different socioeconomic backgrounds staked their money on technology stocks and saw their fortunes soar swiftly.

Financiers recruited more investors with ease for new venture capital pools, and venture funds that cashed out early saw tremendous returns. Due to the success of Netscape's IPO, businesses with little or no sales and earnings were able to find enthusiastic investors for their freshly issued stocks. Some believed this boom couldn't endure; others said it was the start of a "new economy" that would last forever. The NASDAQ index of equities surged to 5,000 before the beginning of the year 2000, and the Chairman of the Federal Reserve Bank cautioned of "exuberant confidence."

The Bust: When the NASDAQ crashed in March, which brought down the whole sector, the Internet business entered a dark and depressing era in the middle of 2000. Many thousands of individuals experienced job losses. Values of stock portfolios fell. Several businesses shut down, declared bankruptcy, reduced staff sizes, or were acquired by rivals at a steep discount. Hardware, software, consultancy, and telecom service providers all suffered greatly. Raising money to start or maintain their enterprises proved to be practically hard for business owners. For others, the "new economy" ideal turned into a nightmare since earnings still matter and economic cycles still occur. Early in 2003, the gloomy clouds in this sector began to clear, and a "reality phase" began to take form. Well-planned, online companies were demonstrating their worth. Customers have become into ardent supporters of online shopping.

Companies of all stripes are discovering that the Internet boosts profitability and real operational efficiency. For instance, value-based bargain airlines Southwest and JetBlue have better financial results than the majority of the airline sector in recent years, thanks in large part to their effective use of e-commerce to make reservations and sell tickets online. The key to the e-commerce and Internet sector's newfound success is "efficiency." Customers consider the Internet to be a fantastic method to spend their time doing their banking and shopping activities. The Internet is a convenient resource for travelers who want to reserve hotel rooms and airline tickets. Online shopping is the most effective method, according to corporate procurement experts, for acquiring inventories and essential commodities. Worldwide, hundreds of millions of people consider VOIP phone, instant messaging, and email to be the most effective forms of communication[3].

Low Prices Drive the Steady Worldwide Expansion Phase: Fast Internet connection, both wired and wireless, is now reasonably priced in an expanding number of locations throughout the world. Both individuals and companies have come to depend on the Internet for daily necessities, even in relatively underdeveloped countries. As more affordable gadgets become available, the "second billion" user group is imminently within reach. Because to low-cost cell phone plans with improved Internet connection, mobile computing is developing at a breakneck pace. In the meanwhile, the cost of creating and maintaining websites has fallen precipitously, allowing millions of entrepreneurs to start their businesses on their own dime and making it simpler for venture capital companies to finance startups with modest sums of money. Modular development techniques and trends like open source software and cloud computing have made it simpler, quicker, and less expensive to launch complex websites.

Online travel reservations are more common. The Internet continues to be the go-to resource for many business and leisure travelers equally throughout the world for finding travel information, making hotel reservations, and purchasing airline tickets. Online travel sales were anticipated to total \$92.6 billion in 2009, according to market research company eMarketer. Online travel purchases worldwide are predicted to reach \$300 billion in 2009 by Plunkett Research. Among the biggest companies in North America that provide online travel booking services are Expedia, Travelocity, Orbitz, Hotwire, and Priceline. In 2009, Expedia generated \$2.9 billion in revenue from gross travel bookings of \$21.8 billion. Comparing these figures to 2008, they remained basically unchanged.

Major online travel agencies in Europe include eBookers, EasyGroup, and Lastminute.com. Online travel booking firms that offered quick price comparisons and online bookings saw explosive development for many years. The boom days are finished now, despite the fact that these businesses continue to generate enormous earnings. Large hotel and airline businesses have

made significant investments in their own, branded websites. The use of their own online booking platforms results in the elimination of intermediary fees and pay for human reservation agents, which benefits the travel providers. Customers gain by having easy access to travel information, frequent flyer programs, and other benefits.

The techniques and objectives of independent internet travel agencies and those run directly by tour operators like hotel chains and airlines are quite different. Airlines may allow websites like Expedia to make bulk reservations for airplane tickets at a discounted rate, which they subsequently resell on their websites for a profit. In contrast, the airlines see their own websites as cost-effective extensions of their reservation systems. Customers of Southwest Airlines were among the first to be allowed to make online bookings on the airline's website; tickets for its flights are not accessible on other online travel agencies. Successful low-cost carriers like Southwest and JetBlue actually sell the bulk of their tickets online, saving the company millions of dollars in operational expenses every year. With great success, other airlines are imitating Southwest. More and more people discover that making reservations online is easy and economical[4].

"Dynamic packaging," which lets clients combine hotels, automobiles, and flights in whatever way they choose for one price rather than being compelled to accept package offers organized by airlines with their own hotel suppliers, is another development fueling the expansion of online travel booking. In this field, Expedia has been a pioneer. Major tour operators, like Backroads, are also depending more and more on their websites to attract new clients and generate money. Because to the many websites that now provide reservations, photos, and virtual tours of rooms and facilities, online hotel bookings have expanded in tandem with the growth of online air travel bookings. Yet, a number of hotel businesses are using a variety of novel techniques to get around hotel discounters. Expedia, Orbitz, and Travelocity are able to provide low hotel rates because they purchase big blocks of rooms from hoteliers at a reduced price and then resell them to customers. By solely selling rooms on their own website, several hotels are hoping to regain a portion of their income. Marriott established a scheme under which it would not only agree to match the best rates for its rooms listed on other websites, but would also give consumers a discount if they booked via Marriott's website. Several hotels use aggressive internet strategies and stop reward points from being given to consumers who book rooms on third-party websites.

The rise in corporate travel reservations made online is one trend that stands out. Early in the 2000s, when the economy slowed, businesses started looking for less expensive methods to fly their staff to meetings. The global economic crisis in 2009 boosted this tendency. Businesses used to depend on conventional brick-and-mortar travel agents, but they often fall short of the bargains that business travelers discovered online. Online services have now significantly increased their market share in business travel, a service that was formerly provided by conventional agencies. Expedia, Orbitz, and Travelocity all have established corporate travel websites. The business travel sites Orbitz for Business, Travelocity Business, and Egencia have a similar design to their leisure counterparts but have client profiles that include details like a company's chosen hotel partners, airline partners, and car rental partners.

## **DISCUSSION**

Another well-liked website for scheduling business travel is Priceline. In the last 15 years, traditional travel companies have undergone significant transformation, including the rising trend of business travelers using internet booking platforms. Successfully rebranding themselves as

"consultants," some travel brokers now charge hourly rates for their knowledge. Others focus on sharing unique information on visiting remote locations like Cambodia, French Polynesia, or Africa. The main national travel agents have their own well-developed websites. For their largest corporate clients, they serve as an outsourced travel department and set up discounts for customers who book a lot of travel. For instance, Carlson Wagonlit is a well-known international corporate travel company with locations in more than 150 countries. In order to produce very lucrative tour packages to well-known tourist locations like Cancun, Jamaica, and Orlando, several sizable travel firms that cater to leisure tourists purchase hotel and airline space at wholesale prices. Despite these attempts, online travel booking is here to stay, and both big and small forward-thinking businesses must get in on the action[5].

Travel-related search engines are becoming more popular recently. Many of the airline, hotel, and car rental websites that are searched by these engines do not participate in the shared databases utilized by more reputable travel websites like Expedia and Travelocity. The engines' revenue comes from online ad sales and by favorably situating customers in web search results, following business models similar to Google's. In the United States, SideStep and Kayak.com are among of the most well-known travel search engines, while in China, Ctrip.com and eLong.net are.

Amazon and MySpace follow suit after Apple's iPod revitalizes the music industry. The selling of legal downloading music via the Cellphones with Internet access have grown significantly in popularity. This is a result of a number of things, notably the enormous success of Apple's portable music player, the iPod, and the associated iTunes music download website. Although sales of music on CD are still declining globally, sales of recorded music in MP3, iTunes, and other digital formats continue to grow. Recorded album sales in the United States, according to Nielsen Soundscan, fell from 636 million copies in 2003 to 428.4 million in 2008. The good news is that 65.8 million digital albums were sold in 2008, a 32% increase over 2007. Sales of individual digital tracks increased 27% in 2008 over 2007. Globally, sales of digital music totaled \$3.8 billion, a little increase over 2007.

Tens of millions of Internet users have downloaded limitless free music since the launch of services like Napster.com in the late 1990s. While the court ordered the original Napster.com site to be taken down for encouraging copyright breaches, the decision had little effect on the amount of pirated music and movie files that were still being distributed online. Users may now exchange data, whether they are legal or not, thanks to peer-to-peer Internet file sharing tools. As a result, since 1998, worldwide recorded music earnings have dramatically decreased. Profit margins, which were formerly 15% to 20% in the 1980s, decreased to about 5%. Each year, piracy costs music companies billions of dollars. The need to protect digital music files from unauthorized download and dissemination forces music labels to look for solutions. Music producers are also very interested in making money from music files that are accessed from the Internet legally and with permission.

March 2005 saw a new chapter in the tale as the U.S. The Supreme Court determined that because of marketing and technical advice that encourages users to distribute files unlawfully, file-sharing businesses like Grokster and Streamcast may be held accountable for copyright infringement. Peer-to-peer software companies have also been found in violation of laws by courts in other countries. With the introduction of the ground-breaking iTunes Music Store, a digital service offered by Apple Computer, Inc., the music business took a giant stride forward.

The service, which debuted in the US in April 2003, allows users to download single track and album files from all five of the country's top music labels. With no membership fees and an average song price of \$0.99, Apple reported 2 million music downloads in the first 16 days of operation. The one billionth song was sold in February 2006. Over 70% of all digital music purchases made online globally in 2007 were made via iTunes, which had become even more dominant in the music download market as a result of the enormously well-liked iPod from Apple. At the end of 2009, the iTunes Store had sold over 8.5 billion music since it first opened, in addition to renting and selling more than 50,000 movies per day[6].

Early in 2009, Apple reduced the price of its iTunes service, selling single songs for 69 cents, 99 cents, and \$1.29. Apple also bargained with the music industry to do rid of digital rights management, which prevents consumers from copying tracks or moving them between computers. Although early versions could only hold 5 megabytes of data, the iPod got off to a poor start in terms of storage. But, the company's March 2002 release of the 10-GB model was when iPod sales truly took off. The most recent iPods can now download and play both music and video material since even more powerful devices are now widely available. The success of the iPod is astounding. More than 220 million iPods had been sold by the end of 2009. By collaborating with a wide range of businesses that provide iPod carrying cases, speakers, and adapters that integrate iPod files into home and automobile sound systems, Apple has improved the iPod experience. The iPod brand, which now controls about 66% of the digital music player market, is keeping users intimately attached to it with everything from stylish Kate Spade leather carrying covers to powerful and transportable Altec Lansing and Bose speakers.

The iPod is seeing significant growth because to the ongoing trend of data storage downsizing and the very cheap cost per gigabyte of storage. Apple's 160 GB Classic model, which can store 40,000 music, 200 hours of video, 25,000 photographs, or any combination thereof, was available in 2009. The devices, which start at \$249, show 2.5-inch color record cover art in full color. The less expensive iPod nano, which goes for \$149, contains an FM radio tuner, a built-in microphone, and a video camera. The even more compact iPod shuffle is available with a 2 GB or 4 GB flash memory that can store up to 1,000 songs and weighs less than an ounce. The \$199 iPod touch, the newest member of the iPod family, is a pocket computer that provides access to the Internet, music, movies, games, and a variety of apps. Moreover, the wildly successful iPhone mobile phone has iPod functions.

Early sales growth for the iPod was phenomenal, averaging more than 200% in 2006 and 2007. Nonetheless, market saturation is already there, and in fiscal 2008, sales growth fell to 6%. Sales might decline by as much as 12% in 2009, according to analysts at Piper Jaffray, as the market ages and competition heats up. A genuinely wide variety of music is available via Apple's user-friendly online music service. With a short download from the Apple website, users may set up the iTunes "jukebox." Users need just click a button after installation to display music options. Free 30-second song previews are available for every song, and one-click purchasing are available. Users may use the bought tracks nearly endlessly after the songs have been downloaded.

AAC is the file format used by iTunes. The file format is relatively compact, boasting sound quality that is better than MP3 files, and can be used with either an iPod or a regular PC. Since Apple maintains a proprietary system, customers of iTunes can only listen to music on iPods. With the exception of iPods, competitors like Microsoft's MSN Music and the recently legalized



Napster provide music that can be played on a range of different devices made by various manufacturers. This reminds me of the format war between Betamax and VHS when videotapes first came out. The success of the iTunes system is proof that users are satisfied with it. Also, the music labels gain since each song generates roughly \$0.65 in gross income for them. More crucially, the introduction of iTunes is a turning point for the sector as it allows it to for the first time dramatically reduce music file piracy in a way that is very well received by customers[7].

As contrast to iTunes' single-song/album purchase shop, other online music businesses like Rhapsody and the authorized version of Napster.com are banking on subscription services. On average, subscription providers charge between \$7.95 and \$15 per month for unlimited computer music listening. Spotify, a relatively new player in Europe, provides two levels of service: a free library of 6 million songs with a 20- to 30-second audio ad that plays every 20 minutes, and a premium, ad-free subscription that costs around \$199 per year. The subscription providers are particularly drawn to the business model since they pay the music labels far less per song than the \$0.65 paid by internet retailers like iTunes for an outright sale. Gross margins for music sales services range from 10% to 15%, although they might reach 40% to 50% for subscription services. Customers have the choice of listening on their Desktops, creating CDs, or using portable music devices. The MP3 shop that debuted on Amazon.com in 2007 may be the biggest competitor to iTunes. It offers tracks for download beginning at \$0.79, but what really sets it apart is that it was the first online music shop to provide music from the major four record labels—Universal Music Group, SonyBMG, Warner Music, and EMI—without digital rights management. Songs may be transferred freely to any digital music player, burned to CDs, and played on a number of PCs.

Through a 2008 partnership with social networking site MySpace.com and three of the major four labels, Amazon took things a step further. Users of MySpace Music get access to the entire catalogs of the music firms at no cost. On their MySpace profiles, users may make playlists, which should increase traffic, the participants hope. MySpace Music makes money by selling advertisements, downloaded music, and ultimately music accessories like t-shirts and concert tickets. The introduction of a download service for MySpace users to use when they choose to really buy music for listening on devices like iPods and MP3 players is Amazon's contribution to the new endeavor. The service directs digital material to Windows Media Player or iTunes.

Because of the mobility and flexibility of downloads, customers have made clear that online music retailers are preferred. Several subscription services additionally provide song/album buying as an extra option in an attempt to stay competitive. Yet, it seems that the majority of online music retailers support the subscription model. Subscription services anticipate that customer preferences will change as a result of Microsoft's Janus technology, which enables devices like MP3 players to play music purchased through subscription. In February 2005, Napster, Inc. unveiled its Napster To Go subscription service. This service makes use of Microsoft software that allows users to listen to leased music on devices other than PCs and portable players. Napster increased its revenue by releasing its entire music library DRM-free in 2008, enabling users to listen to the songs on the majority of MP3 devices, including the iPod. Similar services for listening on mobile devices, desktop computers, and portable audio players are provided by Real Networks. It will be fascinating to observe if customers switch from one-off music purchases to monthly subscriptions and how Apple develops and grows its brand over the next several years in an attempt to maintain its dominance.

Cinema and television producers and distributors may learn a lot from the struggles faced by the music business due to music piracy. Online film and television content is increasing as viewers' choices and download options increase. As video files are much bigger than music files, it is better to download them over a very fast Internet connection. Fast internet connection didn't reach a significant portion of the U.S. home market for many years, giving movie and television studios the luxury of time to plan how to a) combat pirated digital versions of their films and b) sell movie downloads. Since 2005, there had been an exponential growth in the amount of movies and videos that may be downloaded on the Internet as movie and television studios, electronics producers, internet providers, and even cable TV companies compete for market share[8].

Regrettably, unlawful Internet downloads of television shows are also rather widespread. The motion picture business loses billions of dollars annually to piracy, according to the Motion Picture Association of America, so it has been closely watching the music industry's efforts to control unlawful downloads. Video files may now be made harder to hack, and filmmakers have far more control over how a clip is disseminated and on how many devices, according to groundbreaking digital rights management technology created by Microsoft. Nowadays, legal movie downloads are available through websites including Netflix, Blockbuster, Real.com, MovieFlix, Amazon's Video on Demand, and CinemaNow.

Yankee Group projects that video download sales will generate \$850 million in revenue by 2011. Adams Media Research predicted \$110 million in income for online movie rentals in the United States in 2009. Yet, for the time being, business travelers who wish to watch a movie on their laptop while traveling from meeting to meeting are the majority of consumers of movies that have been paid for and lawfully downloaded from the Internet. The number of movies now offered is still somewhat limited. DVDs, on the other hand, provide a far wider range of options. For instance, compared to the roughly 17,000 films accessible on demand, the online DVD delivery provider Netflix provides more than 100,000 titles on DVD.

With its on demand offering, Netflix is now up against a new obstacle. When their newest films are available on video on demand for \$2.95 to \$3.95 each watching, producers are used to earning substantial royalties. There is a stringent cap on how much Netflix can pay the movie studios since its business plan is to provide customers with enormous numbers of movies each month for costs beginning at less than \$10.00 per month. This is completely unlike from purchasing DVDs in bulk at a discount from movie studios. Netflix must either levy a price on users or come to new license agreements that satisfy movie makers in order to be able to offer new films for download.

The number of films offered must increase dramatically if the genuine movie download industry is to become really viable, and users must have a simple method to watch downloaded content on their Televisions rather than their computers. To enable this, a lot of businesses are rushing to provide fresh goods and services. For instance, Intel provides Viiv, a platform that makes it simple to link Televisions and Computers. Similarly, Linksys, a division of Cisco Systems, is pushing its KiSS 1600 media player, which connects to the Internet. Microsoft is promoting the Xbox 360 as a comprehensive media center in addition to a game system whereas Apple, Inc. has its Apple TV device. Startup Vudu is selling a sleek black box with simple controls for \$299 that connects to a TV through an Ethernet connection or Wi-Fi signal. 13,000 films and TV series

were available on Vudu as of 2009, with prices ranging from \$4.99 to \$19.99 for purchases and \$0.99 to \$5.99 for rentals. The box's 250 GB hard disk has enough for up to 50 movies.

In 2005, Apple's iTunes website started offering a variety of videos for \$1.99 apiece. Pixar's short films and a few TV episodes from Disney, NBC Universal, the SciFi Channel, and the USA Network were among the programming that was available for purchase. In the first 20 days of the new service, more than one million videos were purchased. By 2009, iTunes included titles from the majority of the big US studios. Each full-length movie downloads in around 30 minutes and costs between \$9.99 and \$14.99. Nevertheless, downloading 24-hour movie rentals costs between \$2.99 and \$3.99. Pricing is a problem since stores often offer discounts on the same DVD titles. For instance, Wal-Mart today sells almost 40% of all DVDs in the United States.

An interface between a consumer's television, computer, and iPod is provided by Apple's \$299 Apple TV device. For instance, Apple TV may provide computer-stored digital content to your TV. Moreover, the Apple TV device streams images, videos, and movies from your video iPod to your TV. In 2006, Amazon.com debuted its Unbox service, which is now known as Amazon Video on Demand. Those that use TiVo, Sony Bravia Internet Video Connection, Xbox 360, or

### **Microsoft Media Center**

The service has received recognition for its excellent resolution. Netflix's downloading movies may now be seen on TV with the help of the Xbox 360 and the LG BD300 Network Blu-ray Disc Player, among other gadgets. When a movie is chosen online, it instantly appears on the TV screen linked to the computer and starts playing in as little as 30 seconds[9]. Both the music and picture industries have discovered that paid solutions need to be easier to use and provide a wider variety than illicit, free Internet assets. Mid-term, music labels and film studios will need to change to discover methods to embrace the power of the Internet rather than succumb to it.

Film studios will look for methods to offer digital movie files to customers directly, cutting out the intermediary. The Motion Picture Association of America has also started a comprehensive effort to raise awareness of the negative effects of movie piracy and has brought hundreds of legal actions against people and businesses who engage in illicit movie downloads. In an effort to compete with manufacturers of computer hardware, major electronics firms including Sony, Sharp Corp., Toshiba Corp., and Hitachi Ltd. have joined together to create standards for Internet-connected Televisions. The electronics companies want to standardize Internet TV's connection, security, copyright protection, and operating system.

Hulu.com, a joint venture of major television network and movie owners including NBC Universal, Disney, and News Corp., offers online access to a substantial quantity of TV content. In the latter part of 2007, Providence Equity Partners contributed \$100 million to Hulu.com. Several well-known prime time TV series are available on the website and are made available on Hulu the day after they are first aired. While the viewership for Hulu.com has expanded significantly, its owners will have difficulties in turning it into a significant source of income. While customers would be prepared to pay a membership price for all material or possibly for premium content, the site is already well-liked by marketers. Hulu might quickly develop into a strong online rival to AT&T U-verse and other TV services offered by Internet service providers and cable companies. Given that these businesses are the main providers of Internet access to families, this is extremely hilarious. The rights of TV networks in comparison to those of

websites, Internet service providers, and other entities are a new concern as the Internet offers more and more visual entertainment. Consider the coverage of Major League Baseball games. For the broadcast of its games, MLB maintains exclusive agreements with local and regional TV networks. Also, 2,400 games are streamed live for subscribers each season. Internet customers' access to local games is restricted in order to preserve the TV stations' exclusive broadcasting rights.

## CONCLUSION

E-commerce is a whole-business endeavor rather than an IT problem. The businesses that utilize it as an excuse to overhaul their operational procedures stand to gain the most. E-commerce is also a useful tool that allows customers access to businesses and organizations throughout the globe.

Online business transactions between companies and consumers are referred to as ecommerce. E-business, on the other hand, is doing business on the internet, acquiring raw materials, and instructing clients. Selling on an online marketplace may be quite profitable. There are more consumers, more controls, simpler inventory management, and simpler delivery and return procedures. There are even methods to provide your customers advantages. You may set up the payment methods of your choosing.

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## CHAPTER 23

# A COMPREHENSIVE STUDY ON GENERATED CONTENT, SOCIAL MEDIA, VIDEO, BLOGS AND WIKIS AROUND

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### ABSTRACT:

Any sort of material produced and shared by users based on their experiences, thoughts, ideas, or comments is known as user-generated content, or UGC. User-generated material is mostly found on digital platforms, particularly on social media networks. UGC refers to marketing-speak for material that is relevant to the brand. In this chapter author is discusses the purchasers rely on the internet. On the Internet, there is a glut of original material. It is referred to as "social media" and incorporates blogs, chat, images, home videos, music, and games that Internet users have made or assembled and uploaded on personal and community sites for other users to access nearby and globally. Yahoo! was among the first to provide social media capabilities including music sharing, picture trading, and group trip guides.

### KEYWORDS:

Business, Company, E-Commerce, Community, Internet.

### INTRODUCTION

When users of social media click on adverts, the site owner benefits. Most of Yahoo revenue 's comes from online advertising of various kinds. 's yearly income. As of the beginning of 2010, MySpace had more than 125 million registered members globally, making it one of the most well-known social networking platforms for teenagers and young adults. MySpace is a free service that enables users to post information about themselves, including interests, favorite bands and music, marital status, sexual orientation, ethnicity, education, and occupation, as well as photos, on a personal web page. It was acquired by Rupert Murdoch's News Corporation for \$580 million in 2005. Chatting, organizing social gatherings, networking for business prospects, downloading music videos, and posting details about live music events and other entertainment are all activities that members engage in. In 2008, MySpace generated an estimated \$750 million in income[1].

Facebook is the leading social media platform, with anticipated 2009 sales of \$550 million. Early in 2010, there were 400 million registered users, 100 million of whom used mobile devices to access the website. Based on user profiles' likes and dislikes, the site offers incredible potential for targeted advertising income. Facebook wants to go beyond only linking friends online and start defining internet searches and connecting various websites. Via Facebook Connect, users can sign in to websites like CitySearch.com and Yelp.com using their Facebook credentials, linking their activity on those websites to their own Facebook profiles. A Facebook post may

include a review of a restaurant from CitySearch, for instance. More and more well-known social media platforms, like Friendster, LinkedIn, and Tribe Networks, have included the Connect technology to their pages. More than 80,000 websites have already added Facebook Connect as of the beginning of 2010. Similar to this, Facebook introduced the Open Stream API, enabling programmers to export the website's news feeds to any other website. Without logging onto Facebook, Facebook users may see their friends' news feeds from a variety of other websites. Since Facebook poses such a danger to Google, the latter launched Buzz, its own collection of news feeds, comments, and geolocation, at the beginning of 2010. Buzz comes after Google's Friend Connect, which lets users of websites like MySpace and LinkedIn link their accounts, Wave, a communications tool akin to Facebook, and a behavioral marketing ad campaign, despite the fact that Google has long promised its users that it will never use their personal information to deliver targeted advertisements.

In terms of video, YouTube is a free website for sharing videos posted by YouTube users that Google purchased for \$1.65 billion in late 2006. The website has social networking features since users may connect to form video groups with others who have similar interests. Videos may be designated as public or private, with known users only having access. Millions of videos are seen daily by visitors to the website. The website has around 100 million unique visits each month. Major content producers including CBS, Sony Music Group, the BBC, NBA, Warner Music Group, The Sundance Channel, and Universal Music Group have worked with it. A music and video website named VEVO was founded in 2009 by YouTube and Universal Music Group[2], [3].

The creation of income for social media platforms is a constant problem. Just 57% of users of social networks clicked on advertising in 2008, according to IDC, and only 11% of those clicks resulted in a purchase. Social networks will need to use their creativity to come up with new methods to make money. If participating websites buy advertisements, Facebook Connect could have some chance to generate income. Facebook's almost infinite personal data reserves might be used for highly targeted advertisements that cater to individual tastes.

Yet user privacy is a significant problem and a possible roadblock for social media. The volume of private information shared on these sites raises questions about its potential uses and whether users have the right to consent to or forbid the sharing of information. The Beacon advertising service on Facebook did not inform users that their activity on Facebook and other websites were shared in 2007. Following widespread criticism, Facebook discontinued the Beacon program and is taking a much more cautious approach with its new connect program. Facebook emphasizes that users' security preferences, once set on Facebook, are automatically implemented on other websites when using Facebook login information.

Another swiftly expanding category of user-generated online content is blogs, or web logs. Blogs are online publications that include personal diaries, news papers, views, material specific to a niche, and other information. They are often updated and meant to be read by anybody who would be interested in the writers' viewpoints. Users may create blogs using a variety of programs, such as Blogger.com from Google. In addition to text, audio and video assets are becoming common components of blog material. According to the Pew Internet & American Life study, 33% of Americans read blogs.

Certain blogs have a sizable overall viewership, giving them influence in the market. Several businesses are seeking to use blogs for marketing objectives with different degrees of success.

Blog material delivers messages to Internet users and the media at lightning speed. Although they could be a fantastic approach to spread a marketing message, doing so is subject to extreme scrutiny and might also elicit unpleasant reactions with long-lasting effects. Customization is a crucial component of the DIY social media idea. In addition to incorporating connections to other websites, users are building websites that represent their likes and personalities utilizing readily accessible tools. Yahoo! created a website named Yahoo! after purchasing the personal software developer Konfabulator. It will be included into the Yahoo! package via widgets. It gives users the option to overlay windows with personal images, day planners, and daily stock or weather information on their desktops. Wiki, an Internet server application for group web page development, is yet another social media tool. With a few easy steps to construct new pages or make connections between pages, users may create and change content using any web browser. The most well-known example is undoubtedly Wikipedia, an online encyclopedia that is developed, updated, and maintained by volunteers. Keep an eye out for further straightforward, accessible products to support the fast expanding social media market[4], [5].

## DISCUSSION

Auto buyers often use the Internet. In many ways, the availability of auto-related information online has improved customers' knowledge of the auto-buying process. Many websites list the models, choices, and costs of new automobiles as well as the trade-in values of old cars. Buyers may and do enter showrooms prepared with knowledge of the actual price of a certain automobile, the options offered, and about how much the dealer paid for that car with a little web research. A 2008 J.D. According to a Powers and Associates analysis, up from 60% in 2002, more than 75% of new-car purchasers research online before making a purchase.

Several dot-com enthusiasts predicted the demise of the typical car dealership during the 1990s Internet boom once customers had access to this information. This is not true at all. First of all, it is almost difficult to sell new automobiles exclusively online; real dealerships are necessary due to contracts between automakers and their dealers as well as corporate rules known as "franchise laws" in the majority of states. Moreover, automobile purchasers are aware that some duties, like warranty service, need them to maintain contacts with actual dealerships. Also, the majority of purchasers desire an opportunity to test drive or kick some tires. Meanwhile, today's prosperous new vehicle sellers make full use of the Internet. The global economic crisis made this situation much more urgent. Dealers are aware that the bulk of dealership earnings come from the sale of add-ons, the facilitation of financing, insurance, and extended warranties, the sale of used-car trade-ins, and the provision of maintenance in the service department. The secret to developing client relationships that result in these extra revenues is selling new automobiles.

The most successful auto dealers make use of the Internet's power. Online parts ordering and sales appointments are made possible via dealer websites. Several auto dealers allow customers to browse and examine their whole online car inventory, complete with information on each vehicle's color, extras, and pricing. Smart auto marketers utilize email campaigns to provide promotional offers, news about new models, discounts, and alerts about scheduled maintenance, including 10,000-mile inspections. Even more dealerships are installing kiosks on the showroom floor where customers may use the internet to look up consumer reviews or prices and inventory at rival dealers. Smart dealers support this behavior and are prepared to make a price concession in order to close a purchase[2].



In the meanwhile, many leads are daily sent to participating dealerships by auto-referral websites like Autobytel.com, which has connections with thousands of dealers and brings in billions of dollars in sales for dealers each year. Autobytel, a publicly traded corporation, was among the first online retailers to establish a sizable revenue base. A potential automobile buyer specifies their specifications on the company's website, including their preferences for manufacturer, model, color, accessories, trade-in value, and financing method. Dealerships in the area that are Autobytel subscribers react to the buyer with a pricing and inventory availability. The most effective dealers at using internet sales techniques have specialized, well-trained salespeople who are committed to selling just to customers referred by the referral websites. Nevertheless, as competition rises and dealers increasingly depend on their own websites to drive traffic, Autobytel's revenues have been declining and are now much lower than their high of \$122 million in 2005. Although the global car industry was experiencing a recession in 2008, Autobytel announced the layoff of around 35% of its workforce and only made \$71 million in sales.

These websites not only direct users to dealers, but they also screen potential customers by gathering details like name, location, preferred financing option, and more precise information about likes and dislikes via online surveys. As a consequence, dealerships get enough data to differentiate between serious purchasers and tire kickers and to more quickly meet the demands of excellent potential clients. Early in 2010, Autobytel released iControl, an online tool that lets dealers filter consumer leads based on available stock, client geography, and lead source.

There is a thriving used-car industry online as well. On general, used-car purchasers are more likely to be prepared to go farther and make a greater effort to acquire a vehicle that fulfills their needs. The selling of used vehicles is a crucial part of the sector. The statewide franchise of CarMax superstores for used cars makes considerable use of the Internet to increase sales. Automobile shoppers may browse the whole used vehicle inventory at any of CarMax's many stores online. For instance, for roughly \$250, a consumer in Dallas may have an automobile from the Albuquerque inventory transported to Dallas if it sounds intriguing. He will get a reimbursement for half of the freight cost if he decides to buy the automobile.

### **Online Research for Health Information Remains Popular**

According to comScore, Inc., around 10% of American Internet users, or 24 million individuals, accessed a website with information on health insurance during the fourth quarter of 2009. Several individuals are interested in educational services, prescription medication information, fitness, and alternative medicine, according to studies conducted by other companies, but over half of those looking for health information online are looking for information on a particular ailment. Nearly 90% of those who conducted internet searches for health-related information said the material was trustworthy[3].

The connection between a patient and a doctor is also drastically changing as a result of the Internet since it allows patients to access information that was previously unavailable via conventional methods. Customers increasingly want the information they need to make informed choices about their medical treatment. The Internet has made it possible for people to visit their physicians' offices armed with knowledge that doctors previously weren't aware of or wouldn't provide. People may easily get information about their ailments on the Internet. Physicians are compelled to treat patients more like partners as a result of this empowerment. A key information transfer from doctor to patient has occurred. Email correspondence between patients and doctors

is becoming more common. Members of Blue Cross Blue Shield of Florida have access to Health Dialog, a resource and support service that provides 24/7 secure online access to private chats with Registered Nurses, dietitians, and respiratory therapists.

Patients may use helpful websites to identify a doctor, evaluate their local hospital, and learn more about prescription medications. The American Medical Association, for instance, has a searchable database called DoctorFinder containing details on medical professionals' backgrounds and specializations. RxList enables users to look for medications by generic or brand name, read about clinical trials, research probable adverse effects, and get acquainted with cautions. Medscape.com, where customers can obtain information on subjects ranging from AIDS to women's health, is one of the most promising health care websites. The Everyday Health Network was formed in 2008 when the internet presences of Revolution Health and EveryDayHealth were combined. By the end of 2008, the new sites had surpassed WebMD Health as the most popular health information website with more than 25 million unique visits per month.

The main development in digital medical records is the availability of free online medical records services from Google and Microsoft. Both Google Health and Microsoft's HealthVault debuted in October 2007 and May 2008, respectively. Users of both services have access to online storage and management of their private medical information. Many kinds of information, such as appointments, diagnoses, test results, and medication records, are included in data. Although Google has partnerships with the Cleveland Clinic and Beth Israel Deaconess, among others, Microsoft has partnerships with the Mayo Clinic and New York Presbyterian Hospital.

Early in 2009, Google and IBM announced a partnership that would let users of home health monitoring equipment, such as glucose meters, automatically upload data to their own Google Health profiles. In the future, Google Health-related software could be able to examine such data and notify the patient or the doctor of any unusual changes. Instead of having to ask for releases of their medical information from one healthcare provider and submit them to another, the systems provide people the power to manage their own medical data. According to the doctor, well-organized, thorough medical data provided by the patient may speed up treatment, cut down on expenses, and encourage better diagnoses and treatments[6], [7].

Nonetheless, some observers are concerned about the prospect of leaking highly private information due to the systems' linkages to other parties, such as businesses that provide prescription information and reminders. The Health Insurance Portability and Accountability Act, which prohibits the dissemination of information without a patient's agreement, does not presently apply to the programs. Microsoft and Google assert that suppliers must explain how they utilize data from the programs, but because medical information is so sensitive, there are still good reasons to be concerned. Paternity testing, genetic predispositions, and mental disorders are only a few examples of medical diseases and treatments that shouldn't be made public.

Keep an eye out for fresh developments as Google and Microsoft battle over privacy. Medical practitioners are starting to find the Internet to be a helpful resource. For instance, a surgeon may get clinical information pertinent to surgical practice both via speciality and sub-specialty sites as well as general professional sites. The surgeon may also click on links to visit other websites that provide details on new procedures, as well as chances for research and education. Internet forums for discussion are becoming more and more common; they are helpful for doctors who

want to exchange knowledge and have similar interests. The ability to observe live operations through webcams is another innovative invention. From the convenience of their own homes or workplaces, surgeons and students from all around the globe may see and learn from surgical operations.

The American Diabetes Association and the insurance company Kaiser Permanente have worked together to create a potential service for diabetics. They jointly established a website that offers personalized treatment regimens for those who have diabetes. It is based on a sophisticated software program that predicts health care outcomes based on predetermined parameters including medicine, food, demography, and exercise and was built at a cost of several million dollars. The program makes use of a large database with years' worth of patient data. The website for diabetes sufferers, Diabetes PHD, may serve as a template for websites for dozens of other illnesses and their patients. The Internet is awash with user-generated medical content. Although one of the earliest social media sites was a support network for neurology sufferers called BrainTalk Communities in 1993, today's user-generated health sites feature information in formats as diverse as videos, blogs, and wikis. Be on the lookout for ever-more inventive Internet applications to disseminate medical information.

When online sales growth slows, synergies are fostered by bricks, clicks, and catalogs. Online retail sales were slowed by the decline in consumer spending between 2008 and 2009. According to experts at eMarketer, total internet sales in the United States were practically unchanged in 2009 at \$131.4 billion, down from \$132.3 billion in 2008, and will increase to \$141.3 billion in 2010. As broadband connections have been growing at an incredible rate recently, online activities like retail transactions have continued to grow steadily through 2007. Almost 100 million households and companies in the US had broadband connections by the end of 2009. Once saturation thresholds are approached, the growth trend of fixed broadband will slow down a little [8], [9].

Consumers will increasingly purchase online due to a number of variables, such as today's rapidly changing gas prices, the feeling of time crunch, the widespread usage of high speed Internet connection, and the improving usability of online shopping carts. Online and in-store purchasing often go hand in hand. The majority of consumers constantly indicate in studies that they prefer to shop in actual shops. According to surveys, many customers who visit the website of a conventional retail company do so to gather information before going to a physical location to make a purchase. The opposite is also accurate. To avoid long lines at checkout counters or the need to personally deliver gifts, many customers do their research on foot by visiting businesses to examine, touch, or try on things. They then make their purchases online. Accenture believes that 69% of customers do online product research before making a purchase, while Deloitte Touche claims that 62% of consumers have at least once perused an online peer review before making a purchase. Consumers spend an extra \$6 in shops for every dollar they spend online as a consequence of their Internet research.

Retail businesses of all stripes will have the greatest success when they combine the steadiness of conventional, store-based retailing with the expanding appeal of catalog and Internet-based shopping. Such a plan would include: Providing customers with options for 1) location and method of purchase, 2) method of pickup or shipping, and 3) place or method of returns, repairs, and other services as required. This is accomplished by the seamless integration of retail, catalog, and Internet-based offers. Cohesive brand identity and service level communication across

catalogs, physical shops, and websites. Possibilities to leverage consumer profile data to give customised marketing and service. Few businesses have integrated conventional and non-traditional commerce to this extent. Nonetheless, Wal-Mart, REI, The Gap, Staples, and Victoria's Secret are excellent examples of businesses that are developing toward such "seamless" tactics.

Customers at lingerie behemoth Victoria's Secret benefit from more flexibility and customer care since they may purchase online, via the Victoria's Secret catalog, or in Victoria's Secret shops. Along with the several millions of catalogs that are shipped out each week, shops also distribute copies of the catalogs, which include the Victoria's Secret website URL as well as phone and fax purchase options. The idea is to provide consumers the freedom to shop whenever, wherever, and whatever they choose, therefore fostering loyalty. Internet clothing sales are increasing.

It is becoming possible to combine bricks and clicks in ever more inventive ways. An interactive "mirror" that enables shoppers to try on clothing in-store while transmitting a picture to friends' Computers was tried by Bloomingdale's in 2007. Friends may then discuss the ensembles through instant messaging, even going so far as to look for alternate options on the Bloomingdale's website for the in-store customer. Several online merchants were redesigning their websites to better draw visitors as they dealt with flat sales and a challenging 2009 Christmas shopping season. Free shipping deals are widely available, and many websites are adding user reviews, product videos, and Facebook profiles to advertise their businesses[10].

In contrast to other retailers, Amazon experiences growth. With the global economic crisis, many conventional merchants are seeing dramatic losses in sales. After a disastrous 2008, certain businesses, like Neiman-Marcus, reported double-digit drops in same-store sales in the first few months of 2009. Regrettably, a significant number of stores declared bankruptcy in recent months. Several retail success stories may be discovered online in the meanwhile. Despite just a 2.1% increase in sales on eBay in 2009, cost reduction and innovative new techniques allowed earnings to rocket by 34.2%. Amazon is the clear victor in recent e-commerce, with worldwide sales surging as a result of aggressive discount pricing and an expanding range of product categories. Amazon's 2009 sales surged by 27.8% to \$24.5 billion, and its earnings increased significantly. It is obvious that online consumer purchases are becoming more popular throughout the main economies of the globe. The website established a new record for the 2009 Christmas shopping season when 9.5 million products were ordered on December 14 at a pace of 110 items per second. Several observers attribute Amazon's extraordinary ability to defy trends to its affordable prices and ease. Customers may save time and money by not having to go to the business. The Amazon Prime program gives unlimited free two-day delivery, the opportunity to upgrade to one-day shipping for \$3.99, and no minimum purchase quantity in exchange for a \$79 annual subscription.

## **CONCLUSION**

With user-generated content, businesses and media outlets are no longer the only ones that produce material; instead, individuals are given the opportunity to contribute information on almost any subject and in a variety of forms. Customer and brand trust is increased via user-generated content. As it is not the brand's own material but rather is based on other users' experiences with the items, the prospective consumer may believe that it is authentic and truthful. Make sure you have a mechanism in place for locating, gathering, organizing, obtaining

the rights to, and disseminating user-generated material. Once your system is configured, a steady stream of user-generated content (UGC) will flow to your content distribution team.

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## CHAPTER 24

### A STUDY ON ONLINE ADVERTISING BECOMES TARGETED

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#### **ABSTRACT:**

In order to reach consumers in the manner they desire to be engaged, targeted advertising depend on data previously gathered about consumers, employing demographics, interest trends, and behavior patterns. Using customer data minimizes expenditure on users who are unlikely to convert and removes uncertainty from client acquisition. In this chapter author is discusses the insurance direct selling and e-commerce grows. Online advertising has advanced significantly in recent years along with the Internet. Advertising has evolved significantly in terms of audience and complexity, and businesses of all sizes have included the Internet heavily into their marketing plans.

#### **KEYWORDS:**

Advertising, Business, Content, E-Commerce, Customer.

#### **INTRODUCTION**

Online advertising spending in the U.S. was predicted by eMarketer to decline to \$22.4 billion in 2009, down around 4.6% from 2008, as a result of the current recession. It was anticipated that in 2009, online advertising will make up 10% of total advertising spending in the United States. Plunkett Research anticipated that worldwide spending on internet advertising in 2009 will total \$50 billion. The least effective tactic in the armory of today's web advertisers is boring, crowded banner advertising. Advertisers have created rich media strategies, such as highly catchy commercials with video content, to profit from the expanding base of online customers as well as the gains in connection and computation speeds.

Some businesses have developed online "playgrounds" that provide short movies for download, interactive games, riddles, and prizes in an attempt to draw even more attention and completely engage users on their websites. Widgets have proved to be quite successful. A widget is a little piece of software that may be included into a website. These programs may be created to include anything that would catch the user's interest, including games, cartoons, entertainment, useful information, or just about anything else. When created appropriately, they have had great success and a high rate of dissemination among friends and colleagues. Today's marketers may employ more sophisticated video, animation, and music to spice up online commercials than ever before because to consumers' increased access to internet[1].

Modern tracking technology on the Internet makes it possible for marketers to monitor the effectiveness of their online adverts in real time. As a result of several websites' agreement to standardize the reporting of ad-viewership data, marketers' fears about the medium have been

allayed. Using Paid Search Results for Advertising: Search engines like Google provide "sponsored search results," often referred to as tailored search result placement, in the form of links to a client's website. Overture Services, Inc., which is now owned by Yahoo!, invented the technique. Since 2000, Google, a rival of Yahoo!, has been offering the AdWords sponsored search results service. Google's yearly sales increased as a consequence, going from a little sum in 1999 to \$10.6 billion in 2006 and \$23.65 billion in 2009. Every time a search is done, these adverts are shown next to the "normal" search results. The fact that these adverts are produced based on the search terms a user types makes them unique. Search engines are paid by advertisers to show their links anytime certain words or groups of terms are used in a search. For instance, anytime the terms "lighting" or "lamp" are used in a search, a sponsored search result for a firm that sells light fixtures may show up. Each time a user clicks on an advertisement, advertisers get paid. The top bidder often receives keyword listings on Google and other search engine websites.

Pay-per-click advertising is another well-liked internet strategy. For instance, an advertiser may submit a text- or image-based advertisement to Google's system using the very popular AdSense service. The ad is automatically placed by Google on websites owned by third parties that are relevant to the advertiser. Each time a customer clicks on the advertisement, they are sent to the advertiser's website, where they are paid a modest pay-per-click cost. Google and the owner of the external website from which the click came split this money. Pay-per-click advertising is not without issues, however. The Search Engine Marketing Professional Association estimates that 40% of internet marketers have experienced click fraud. Scammers with an eye for technology have created fake websites and entered into agreements with search engines like Google and Yahoo! to show online advertisements posted by reliable companies. These con artists then create a staggering amount of clicks that could come from real people, and thanks to their contracts with the search engines, they are able to collect money from the advertising via the clicks. For businesses that can distinguish between genuine clicks and false clicks, new economic possibilities are emerging.

In addition to pay-per-click internet advertising, a new strategy known as "pay-per-call" is starting to take off. Google began showing green phone symbols next to certain search results in late 2005. A popup where the user may input their phone number shows when they click the phone symbol. The business that bought the phone connection then gets in touch with the customer, usually through Internet-based telephony. Pay-per-call advertising often costs more than pay-per-click marketing, but proponents of the new technology think it might result in more productive leads that are simpler to turn into purchases. For instance, an advertiser may pay a search engine roughly \$1.25 for each potential click on a link, but \$4. For each call that results from an ad.

"In text" marketing is yet another strategy for web advertising. On third-party websites, particular words in news or general interest papers might be highlighted for a fee by advertisers. A connected advertisement with a link to the advertiser's website appears when visitors point to the highlighted term. For instance, text ads from Vibrant Media, Inc., an online advertising provider, may have text, flash media, and even video. For the Saturn division of General Motors, Google has ran sophisticated advertisements that combine interactive video snippets, the Google Earth satellite tool, and the capability to regionally target Internet users. Users who clicked what seemed to be a banner advertisement for the Saturn Aura mid-size vehicle saw an image of the Earth that zoomed in to highlight the Saturn store that was the closest to them. The "doors" of the

dealership opened, and a video of the manager played, praising the new vehicle as it was explained in detail in each section[2].

**Targeted online advertising and social network advertising:** Social networking companies like Facebook are now seeking to make money via targeted advertising. Tens of millions of users have created personal profiles on the site, which gives advertising on Facebook, MySpace, and similar websites a distinct potential edge. Social networks could be able to provide advertising products that let businesses delve extremely deeply into individual interests. For instance, if a user indicated on her profile that she enjoys riding mountain bikes, playing tennis, and going on holidays to Mexico, this information might be used to display targeted advertisements on her page with deals for tennis, Mexican vacations, and cycling.

Facebook, for instance, provides picture or text-based advertisements that may be targeted by age, gender, geography, and other factors. These ads have the potential to reach 400 million active Facebook users. The site has a lot of promise since Facebook users find it to be incredibly interesting. A pay per click or pay per impression rate basis are available to advertisers. Moreover, Facebook provides services that use "Social Advertising" to promote news feed papers to networks of "friends." Despite Facebook, MySpace, and other comparable websites' enormous success, advertising income have been underwhelming. 2009 revenue for Facebook is predicted to be between \$550 million and \$600 million.

The expected 2009 revenue for MySpace is \$500 million. Consumers desire to control their own data on social networks, and the usage of personal information by social networking sites has been very contentious. Targeting behavior Technology-based "behavioral targeting" shows which websites consumers have visited by placing cookies on their machines. A website may identify a person when they return thanks to cookies. A user's specific interests may become apparent over time through the pattern of websites they frequent, allowing advertisers to tailor their adverts. Hardware that is added to the systems of Internet access providers, such as the DSL network of a phone company, is an improvement to this concept. This device keeps track of every website visited by every Internet user within a certain geographic region. An Internet service provider may deliver highly targeted adverts based on a subscriber's Internet usage history and apparent interests by doing an individual analysis of this site visit history. Acxiom Corp., a significant participant in targeted web advertising, has a database of 133 million homes with data gleaned from several sources, such as open real estate and automobile records, warranty cards that consumers fill out and send back to manufacturers, and travel histories. With the use of this kind of data mining and customized advertising, Yahoo! supplies merchants with its SmartAds program. Since the targeting may be so precise, even little-used websites can demand significant premiums for these advertising[3].

**Tools for managing and exchanging online ads:** Ad exchanges are a relatively modern means of posting web advertisements that have attracted notice recently. Advertisers and websites employ automated systems in which the advertiser specifies the sort of ad, potential posting locations, and price, and a third party fills any open spots that meet the advertiser's requirements. Proper Media, Inc., AdECN, Inc., and ContextWeb, Inc. are a few exchanges. The practice replenishes previously vacant or underpriced online advertising spaces. Late in 2009, Google introduced its ad exchange. The tracking of ad space inventories and marketing campaigns has been much easier in recent years because to sophisticated online ad management systems like Google's Ad Manager and Yahoo's APT.



Banks have discovered that by combining a network of branch facilities with the ease of telephone and internet banking, they can meet all of their customers' demands. Similar to the trend among large merchants, this combines online and offline sales channels to maximize the benefits of both. Nowadays, all major banks have websites where banking clients may request for services, make bill payments through wire transfers, and monitor the status of their checking, savings, investments, and loan accounts, among other types of accounts. Online banking has, for the most part, been a huge success. According to Fiserv, Inc., 69.7 million households used online bill payment services rather than physical checks to pay at least part of their bills in 2009.

Many clients find online banking more appealing than ever owing to technology that makes it possible to quickly and easily monitor various accounts using a single web application. Yodlee, Inc., an information technology company, was a pioneer in improving the convenience of online banking. It provides customers with a service called PersonalFinance that allows them to monitor spending across all accounts, regardless of how many different institutions are holding those accounts. Yodlee BillPay also expedites bill payments by facilitating money transfers on the same day as the bill is paid. The personal money management tool provided by Bank of America organizes expenditures across several accounts.

With updated financial sites that include services including bill payment, cash transfers, multiple account management, and investment opportunities, some banks are aiming to attract Generation Y clients. For instance, PNC Financial's Virtual Wallet provides attractive, cutting-edge online capabilities to appeal to clients who are familiar with online information searches but may not be as knowledgeable about money management. Citibank and Microsoft are collaborating to create a comparable website with the working name of Bundle. The Mint Software, Inc. website Mint.com, which had 1 million members as of late 2009, will probably compete with this one. It is swiftly rising to the top of the list of the most used financial tools online. The website claimed to have found more than \$300 million in potential savings for its subscribers as of mid-2009. It monitors \$175 billion in transactions and \$47 billion in assets annually[4].

Banks including JPMorgan Chase, BBVA, ING, Wells Fargo, and Bank of America are aiming to create websites and online tools with a similar design. Nonetheless, having physical facilities seems to be necessary for online banking success. Several businesses established entirely online banks, only to write them off as failures later on since it seems that customers still prefer to visit a branch even if they do the majority of their banking online. Before its demise in 2007, NetBank, Inc., one of the few successful pure internet banks, had 104,000 clients and \$1.4 billion in deposits in the US and 90 other countries. ING DIRECT purchased the current NetBank accounts in 2007 for \$14 million. The Netherlands insurance and financial services giant ING Group's online arm, ING Direct, is a tough rival in the online banking market.

It accumulated American deposits by providing high interest rates on deposits and incentives of \$25 for creating a new account, growing them from almost nothing in 2000 to more than \$91.4 billion in 2009. As of 2009, it has more than 21.5 million subscribers across eight nations. The company uses eight Internet cafés as an intriguing marketing gimmick to promote its brand in New York City, Philadelphia, Los Angeles, Chicago, Honolulu, Wilmington, Delaware, and St. Cloud, Minnesota. Major online stock broker E\*Trade Financial made a significant foray into the world of online and electronic banking. With \$174 billion in client assets, it has a fast expanding online bank deposit base and a national network of ATMs operating under the E\*Trade name. The business introduced an online service center in 2008. These internet businesses are all

increasing their offerings to cover different kinds of loans. E-Loan, Inc. provides personal lines of credit, vehicle, home equity, and mortgage loans online. Another example of an online lender is ING Direct, which provides mortgages and home equity loans.

Businesses who provide ATMs, physical branches, and internet services find that the three together are quite powerful. To begin with, servicing a client who mostly uses online services to manage accounts and ATMs to withdraw cash is far less expensive. Since broadband Internet access is expanding so quickly in American homes and companies, bank websites may provide a variety of capabilities. Consumers that utilize internet services are often wealthier, more educated customers with broadband subscriptions. These consumers consistently have greater bank accounts, have better credit ratings, and generate more revenue overall than non-online customers. For instance, as of 2008, Bank of America, which leads the country in the number of retail bank accounts, has more than 20 million online clients. Together with a free online bill payment service utilized by more than 7.5 million clients, it also provides mobile banking through cell phones.

Using live chat, several online banks enhance the online experience with a human touch. The online function connects clients with bank employees who use Internet chat to offer goods and services, respond to inquiries, and resolve customer care issues. The participating banks include Wells Fargo, Citigroup, and Bank of America[5]. The modest but steady increase in consumers using their smartphones to check balances and make payments is helping online banking. For instance, Bank of America introduced a software program in 2009 that enables users to do basic financial operations using an iPhone from Apple. Customers of Wells Fargo who do business may authorize wire transfers using their mobile devices. According to ABI Research, 3.1 million Americans utilized mobile banking services in 2008, a considerable increase from 400,000 in 2007. 7 million people would use smartphones for banking in 2009, according to ABI.

Maintaining account security is a significant difficulty for internet banking. Since bank websites are designed primarily for financial transactions, hackers, con artists, and virus authors often target them. In one incident, a hacker by the name of Robotector distributed millions of emails that were infected with malware.

In the event that it was triggered, the application would gather online bank account identities and passwords and email them back to Robotector. Online security company Symantec revealed that during 2008, 1 in 244.9 emails were phished, which is a decrease from 1 in 117.7 emails in 2007. After providing personal information to phony queries, several people discovered that their bank accounts were in danger. Modern encryption techniques may increase the security of internet data, but they cannot stop dishonest emails or gullible users who give out information they shouldn't. Since 2005, banks have been required to monitor their online identity systems, and standards are enforced by routine inspections, thanks to a group of American regulators known as the Federal Financial Institutions Examination Council, which also includes the Federal Reserve and the FDIC.

When a consumer inputs a user name, many bank websites show pre-selected graphics like flowers or puppies. The consumer is aware that it is unsafe to log in if they do not recognize the image. SafePass is a 6-digit, one-time passcode provided by Bank of America that may be used to approve money transfers, manage the online payment system, and get greater transfer limits. It is supplied to users' mobile phones through text message. RSA Security, VeriSign, and Entrust are well-known manufacturers of security software.

## DISCUSSION

Insurance Direct selling and online sales increase. As a consequence of e-commerce effects, the responsibilities of insurance intermediaries and agents as well as the entire structure of the insurance business are changing drastically. Customers may quickly generate a large number of competitive insurance quotations using insurance websites on the Internet. Electronic markets that can accomplish these duties more effectively and at lower prices threaten to replace insurance brokers because these jobs providing information and writing transactions have traditionally been the main responsibilities of insurance agents. The growth of e-commerce, as opposed to the exclusive agent and direct response distribution channels that have grown since the 1970s, would reduce the usage of the independent agency system, according to the Center for Risk Management and Insurance Research at Georgia State University. Future insurance agents may provide value-added client assistance and counseling in addition to selling insurance. This change of the travel agent's job is comparable to the meteoric rise in popularity of online travel bookings.

Direct sales in the U.S. personal vehicle insurance sector are flourishing as a result of very successful direct sales initiatives by companies like GEICO. In addition, direct selling is playing a bigger part in the life sector as a result of the increasing popularity of websites that let customers compare life insurance pricing. In countries other than the U.S., direct marketing is also gaining ground. For instance, in the U.K., a significant share of all new vehicle insurance contracts are sold via direct marketing. When technology and direct sales become more prevalent, independent agencies will lose market share[6].

According to a survey of American customers who purchase vehicle insurance by the market research company comScore Networks, the number of requests for online auto insurance quotes decreased slightly in 2008 to 32.1 million, down 1% from 32.3 million in 2007. According to industry specialists, this is because of the decreased demand brought on by the global economic crisis. Online insurance purchases increased 7% from 2.1 million in 2007 to 2.3 million in 2008, nonetheless. Nowadays, the homeowner market is heavily influenced by the Internet. For instance, Liberty Mutual, GEICO, and InsWeb make getting homeowner's estimates online very quick and accessible for customers.

Several insurance underwriters are increasingly using both direct sales and sales via agents in their business strategies, in large part due to the increased popularity of e-commerce. For instance, the Progressive Company, a vehicle insurance underwriter with more than 10 million clients and \$12.8 billion in 2008 sales, makes purchasing insurance very simple whether you do it online or over the phone. One of the biggest agent networks in the US, it also provides its vehicle insurance coverage via around 30,000 independent agents. In addition to homeowners and renters insurance, you may instantly get a price by logging on for a coverage for a car, motorbike, boat, or recreational vehicle. Consumers may submit claims or make payments on the Progressive website. In order to provide a competitive mix of coverage, service, and price, Progressive uses a high level of service, cutting-edge technology, and direct sales as part of its entire business strategy. Progressive simultaneously promotes business for its independent agents online. The Progressive Agent website, [www.progressiveagent.com/home.aspx](http://www.progressiveagent.com/home.aspx), and the Drive Insurance promotion both urge customers to look for an agent online. The website was accessed by over 1 million users in its first ten months, mostly as a result of intensive promotional advertising[7].

In comparison to insurers that are not Internet-based, online insurers may experience a significant cost advantage throughout the duration of a customer's lifetime. This is brought on by decreased customer service costs, cheaper sales costs, and improved information collecting capabilities. Due to this, several insurers have upgraded and integrated their information systems in response to e-commerce. More customers than ever before are online now, and as additional users join the network, its value increases. As tens of millions of individuals use quick, accessible broadband to access the Internet, the potential for online insurance sales significantly increases. Plunkett Research estimates that there were roughly 100 million broadband connections in US homes and businesses as of the beginning of 2010. Adult Internet users in the United States number more than 80%. Insurance companies are compelled to make an effort to take advantage of the sizable internet consumer market in order to stay competitive.

Online connections are becoming more valuable, and transaction costs are going down. For instance, when marketed via conventional techniques, goods like travel, credit, or funeral insurance have considerable transaction costs while having relatively high fixed costs and little value. Customers who buy these products often pay a premium price per dollar of coverage as a result. The sales and underwriting processes for certain insurance products may be automated via the Internet. By lowering transaction costs, rates may be raised and more insurance can be sold. Some customers are purchasing wider, high-value insurance solutions like liability umbrellas due to increased access to e-commerce. As there are significant quantities of highly sensitive data at risk, the security of insurance clients' online data is a crucial issue[8].

Banks are becoming more and more competitive in the insurance sales sector, in part due to their use of direct marketing strategies. Several bank holding corporations have purchased or established subsidiaries of insurance agencies. Although some of these subsidiaries work through conventional agents, many of them also do a lot of direct marketing. For instance, if you are a Bank of America member, it's possible that you may see offers for life insurance in your recurring bank bills. For Bank of America, this provides insurance leads at a low cost.

### **Wi-Fi Speeds Up**

Although cellular phone providers are pouring billions of dollars into new technology to provide their customers improved services like 3G mobile Internet access, other wireless Internet options have emerged. Wi-Fi, an abbreviation for "wireless fidelity" and often known as WLAN, has developed into a crucial wireless utility across much of the globe. Wi-Fi provides a wireless connection of up to 54 megabits per second, which is much faster than cellular phones and approximately 1,000 times quicker than dial-up. Each network is connected to a fixed, potentially extremely fast Internet connection. Mobile access to the Internet and, therefore, to information, entertainment, e-mail, and VOIP telephone is made possible via Wi-Fi equipped devices, such as laptop computers or PDAs. Setting up Wi-Fi networks is simple and affordable. Unlicensed radio spectrum in the public domain is used by the transmission. Operators generally construct them in busy locations like coffee shops, fast food restaurants, hotels, airports, libraries, malls, and other public spaces. For instance, Starbucks coffee shops provide Wi-Fi connections thanks to a collaboration with Bell in Canada and AT&T in the United States.

Wi-Fi is available at a few McDonald's locations and in thousands of top hotels. More than 71,000 hotspots are being run by AT&T, Inc. In addition to being used by businesses to link their networks as an alternative to or in addition to their wired local area networks, many individuals are finding Wi-Fi to be a handy method to access the Internet from various locations within their

homes. For instance, students at Dartmouth College may use Wi-Fi from any location on campus, including their dorm rooms, the student union, the library, and even the lawn. Across more than 150 buildings, hundreds of antennae make up the Dartmouth Wi-Fi network. For telephone, intercom, video monitoring, on-campus cable TV programming, and temperature control, the college depends on the system.

Unfortunately, there are issues with Wi-Fi technology. Wi-Fi networks normally do not provide the wide-ranging mobility of cellular phone connections and typically only have a relatively small local coverage area. Intel made a significant advancement in Wi-Fi networking in 2008 by altering a router's software to allow signals to reach up to around 62 miles. The Rural Connectivity Platform schedules time slots for signals coming in or going out and coordinates transmitting and receiving antennas. In India's rural areas, the system was initially put into use in late 2008.

Wi-Fi is categorized technically based on its range and speed. Wi-Fi standards include 802.11b and the quicker 802.11g, among others, but there are many more. Some Wi-Fi protocols provide faster speeds or other benefits. Chips that can communicate at numerous frequencies are being developed by semiconductor makers, enabling them to connect to different tiers of Wi-Fi networks. In a manner similar to how many cellular phones currently switch between digital and analog service, many telephone equipment manufacturers are concentrating on new technologies that enable consumers' phones to automatically switch between VOIP via Wi-Fi, at home or in the office, and cellular when away from home base. Wi-Fi antennas are now a typical feature on products like notebook PCs, thanks to computer manufacturers and producers of all kinds of digital gadgets. When they are near a Wi-Fi network, these gadgets may notify their owners. After logged in, the owner may use the internet. Although some networks are supplied without charge, many others have some type of price.

Boingo is one of the most aggressive providers of Wi-Fi networks. The company is creating a system of thousands of similar networks throughout the globe and charges \$9.95 per month for unlimited connect time. Boingo has secured over 125,000 sites for their wireless connection service as of the beginning of 2010. More than 500 airports, hotels, restaurants, and other sites, such conference centers, are among the company's locations. By pushing its members to buy a \$40 router or install FON software on their pre-existing cable modems, the Spanish firm FON has grown to become one of the biggest Wi-Fi networks in the world. As of early 2010, "FONero" homes are a part of a network with more than 1.5 million registered users. In order to provide Wi-Fi hotspot software for mobile phones, FON partnered with mobile software development company JoikuSpot. With the help of the software, a laptop or other Wi-Fi device may securely access the Internet by utilizing a suitable mobile phone as a gateway[9].

### **WiMAX Extends Wireless Range Far Beyond Wi-Fi**

The wireless industry is receiving significant fuel from a more recent standard known as WiMAX, or Worldwide Interoperability for Microwave Access. With each WiMAX antenna having a theoretical maximum broadcast range of around 30 miles, WiMAX has the capacity to give exceptionally fast Internet connections to wireless devices, such as laptops and mobile VOIP telephones. However, real ranges will be limited, especially for mobile usage. While WiMAX speeds may exceed 70 Mbps, the first industry commercial targets are for mobile devices to operate at 15 Mbps and fixed devices to operate at 40 Mbps. WiMAX offers a lot of promise as a replacement for conventional cellular telephone service because of its extensive

range. If mobile WiMAX can be made flawless, WiMAX also makes sense for delivering intelligent transportation systems to automobiles and trucks as they go down the highway. ITS has the ability to provide a variety of communications and services to drivers, such as warning them of impending traffic jams, accidents, construction zones, and other roadblocks and assisting them in finding restaurants, lodging options, rest places, gas stations, and other possible stops.

Technical standards have to be established and approved for WiMAX to advance. In December 2005, the IEEE 802.16e Mobile WirelessMAN Standard for metropolitan area networks was formally adopted, paving the way for the global rollout of WiMAX networks. Another significant step was also taken when the European Commission Decision of 2008 mandated the use of 3400 to 3800 MHz frequencies for WiMAX in Europe. In order to make the spectrum range accessible for use by fixed, nomadic, and mobile electronic communications networks, European Member States must act quickly. Also, this long-range system's security concerns must be addressed. An impending issue is that hackers might be located kilometers distant from a victim. The question of licensing is the last. WiMAX utilizes licensed radio spectrum, while Wi-Fi uses unlicensed radio spectrum. WiMAX systems will have a higher barrier to entry than Wi-Fi because to the expenses and regulatory concerns associated with their setup.

The first fixed WiMAX networks were introduced in November 2005 by 13 carriers throughout the globe in nations including France, Mexico, Finland, Ukraine, and Guatemala. Late in 2006, Intel released the first WiMAX PC cards, allowing notebook PCs to connect to WiMAX networks. Sprint Nextel unveiled a \$3 billion proposal in May 2007 to develop a mobile WiMAX network with the capacity to support 100 million customers. According to a 2009 WiMAX Forum study, more than 460 operators were implementing the Mobile WirelessMAN standard in more than 135 nations.

When Clearwire Communications and Sprint Nextel decided to merge their wireless broadband operations in 2008, WiMAX achieved a significant milestone. The business, which is now known as Clearwire Corporation, has gathered \$3.2 billion in funding from sources like Intel, Google, Comcast, Time Warner Cable, Bright House Networks, other WiMAX industry pioneers. The corporations promised to help the enterprise financially as well as with technological know-how. For instance, Intel committed to marketing Clearwire's service alongside its performance notebook PC brand and working with manufacturers to integrate WiMAX chips into laptops and other mobile Internet devices powered by its Centrino 2 processing technology. Google will collaborate with the business to provide Internet services, advertising services, and WiMAX mobile device apps. To become suppliers of the company's mobile WiMAX service, Sprint Nextel, Comcast, Time Warner Cable, and Bright House Networks will engage into wholesale agreements. The first countrywide mobile WiMAX network in the United States will be developed and deployed as the new company's primary goal.

The 400,000 wireless subscribers that Clearwire Corporation already had served as a sales and marketing foundation for the new business, which is also looking to profit from Sprint Nextel's expansion of its XOHM WiMAX network in a number of U.S. locations. Clearwire aims to reach \$17.5 billion in yearly sales by 2017. In all, U.S. cellular carriers were predicted by the Telecommunications Industry Association to invest \$4.4 billion on WiMAX infrastructure in 2008. In Baltimore, Maryland, Clearwire introduced its first significant WiMAX service in 2008. It began offering WiMAX in Portland, Oregon, in January 2009 and shortly after that in Atlanta and Las Vegas.

This service is a "4G mobile Internet wireless network," according to Clearwire. Atlanta's unlimited Clear service had a monthly cost of \$65 and had download rates of up to 6 Mbps in the middle of 2009. This particular bundle deal included both fixed and mobile connectivity. There were "specials" that might bring the cost down to just \$45 a month. Mobile customers have somewhat different fees and programs.

In particular if service quality is strong, Clear may prove to be fiercely competitive with other types of broadband at these pricing. Despite the promise of Clear, Clearwire is having significant trouble raising the necessary funds to finish the network. Observers predict that between \$3 billion and \$5 billion in further investment may be required to expand the Clearwire network after obtaining more than \$3 billion in 2008 from equity investors such as Intel, Google, and a number of cable companies. In the event that it succeeds, Clearwire will have a two-year advantage over competitors Verizon Wireless and AT&T. They are researching Long Term Evolution, an alternative wireless technology to Clearwire. LTE rollouts by Verizon and AT&T are scheduled to begin soon.

Midway through 2009, Comcast made a huge announcement on their "High-Speed 2go" plan. Comcast is selling combined fixed and mobile Internet access packages for just \$49.99 per month by combining its 12 Mbps cable network, Clearwire's network, and Sprint Nextel's 3G network where Clearwire is not accessible. Portland, Oregon served as the package's original launch city, with Atlanta, Chicago, and Philadelphia following a few months later. Those who presently pay separate bills for home Internet access from one provider and mobile Internet access for their laptops or netbooks from another provider may find this price to be attractive. The cost reductions can be substantial.

## CONCLUSION

All things considered, ads may be both beneficial and harmful. Hence, it is our responsibility to utilize them wisely and make sure they are fun and informative. With our current age, none of us can avoid ads. A marketing strategy known as advertising involves purchasing real estate to advertise a good, bad, or intangible idea. Ads, as they are often known, are the real advertising messaging. Reaching the demographics most likely to be interested in purchasing a company's goods or services is the aim of advertising. Although while advertising may provide useful information and help one make an educated choice, some of them can have a big impact on young people's personalities, choices, and lives. Advertisements have both beneficial and harmful effects on young people's thinking.

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## CHAPTER 25

### A BRIEF DISCUSSION ON MASS BROADBAND MARKETS EMERGE

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#### **ABSTRACT:**

An economy that experiences rapid economic development and has some, but not all, of the features of a developed economy is referred to as an "emerging market." Emerging markets are nations in the process of upgrading from "developing" to "developed" status. In this chapter author is discusses the telepresence strategy. Consumers are increasingly selecting broadband access options over dial-up as high-speed Internet costs continue to decline. The Internet, telephones, televisions, entertainment systems, and computers all entered a new era of convergence.

#### **KEYWORDS:**

Business, Broadband, Customer, Computer, E-Commerce.

#### **INTRODUCTION**

In the first quarter of 2004, when more than 26 million American households and businesses had broadband connections of some kind, there was a "tipping point" for consumer broadband access to the Internet. According to estimates from Plunkett Research, by the end of 2009, broadband connections in the U.S. have been established in close to 100 million households and businesses by wireline, satellite, or cable. Customers may access the Internet thanks to the roughly 120 million wireless subscriptions on mobile devices. The fierce pricing rivalry between cable and DSL providers has fueled this expansion. Millions of dial-up customers have switched to broadband because of today's cheap costs[1]. Although costs are reducing, internet connection speeds are still rising. As of the beginning of 2009, AT&T offered its Elite service for \$35 per month, which included 1 Mbps upload and 6 Mbps download speeds. For as low as \$29.95 a month, Cablevision offers scorching 30 Mbps download and 5 Mbps upload speeds.

With its PowerBoost package, Comcast provided download speeds of 16 Mbps and upload speeds of 2 Mbps for \$59.95 per month. At a starting monthly price of \$57.99 for a 20 Mbps download and 5 Mbps upload bundle, Verizon's FiOS service has exceptional speed to price ratios. The 50 Mbps download and 20 Mbps upload speeds of FiOS's fastest plans. Early in 2009, Comcast began offering download speeds of up to 100 Mbps through new cable technology dubbed Docsis 3.0, with the potential to increase to 160 Mbps in the future. This allows a family to download an HD movie in its entirety in less than four minutes. Eventually, other cable providers could do the same. Early in 2010, Google made headlines by announcing ambitions to provide superfast internet access in a select number of US locations. According to Google, this program is a test meant to demonstrate the benefits of promoting the usage of ultrafast broadband nationally.

One excellent illustration is Apple's popular iTunes website, which exemplifies how recorded music, film, the Internet, personal computers, and portable electronic devices have all come together. There are many opportunities, and the volume of entertainment, journalism, and reference information reconfigured to benefit from internet will increase quickly. Broader accessibility owing to developing technology, lower connection costs as a result of more competition, and much enhanced content and web-based consumer services that will expand in proportion to the number of broadband users all boost the adoption of broadband.

Everyday tasks including shopping, managing finances, renewing a driver's license, submitting an insurance claim, and doing schoolwork for kids or adults through distance learning all need broadband in the house. Already many online entertainment and information alternatives will continue to expand constantly. Certain internet services will seem to be necessary, and always-on will start to be thought of as the norm. Internet telephone customers will be able to view their parties on the other end of the call as if they were in the same room thanks to the clear and dependable streaming video and audio quality, which will also make music and movie downloads very quick. Techniques for compression and caching will advance, and storage and distribution costs will decrease. Pay-per-view or pay-per-use service options will be accepted by customers due to its practicality and affordable price. The majority of today's radio, television, and film entertainment will go online.

### **Fiber-to-the-Home Gains Traction**

The big telephone companies are searching for methods to maintain their user bases while boosting profits via improved services. One such method is the installation of genuine fiber-to-the-home networks, which provide ultra-high-speed Internet access along with improved entertainment and telephone alternatives[2]. Copper lines, which can only provide somewhat sluggish service, are used to provide residences with conventional service. Fiber-optic cable is used in conventional service to link regions and cities to one another at the switch and network level, rather than at the house level. This is known as fiber to the node, or FTTN. This less difficult method is something AT&T has long advocated. Fiber is being delivered into designated hubs in already-existing areas as part of AT&T's strategy. From those hubs, upgraded services are sent by copper cable into the house, with speeds that might potentially reach 25 Mbps and are now available at 6 Mbps. In contrast, FTTH sends fiber-optic cable straight to the living room from the network to the local switch; the system's Internet delivery speeds and the variety of entertainment and data it can provide may be remarkable.

Verizon unveiled a multi-year, \$23 billion FTTH initiative in 2005, making it the market leader in the US. With 50 Mbps download speed now accessible in select locations, Verizon's FTTH offers amazing speeds. Verizon stated in November 2007 that it has upped the maximum upload speeds for FiOS to 20 Mbps. By 2009, Verizon had installed FiOS in 12.7 million homes and businesses. More than 3.1 million FiOS Internet access subscriptions were active in 2009. Also making significant fiber investments is AT&T. It is in the process of building a network that will eventually run fiber-optic cable close to 18 million residences in the United States[3]. The Fiber-to-the-Home Council monitors developments in FTTH. The number of North American homes with fiber to the home increased from 1.01 million connections in September 2006 to 4.4 million in 2009, according the FTTH Councils of Asia-Pacific, Europe, and North America.

Several times, local governments or subdivision developers that are anxious to give cutting-edge connection as a value-added amenity to new houses have supplied FTTH. According to the

council's investigation, households who had access to very high-speed internet had extraordinarily high engagement rates. In general, people subscribe to advanced services between 40% and 75% of the time. Jackson, Tennessee is a prime example of a linked neighborhood. There, a 658-mile fiber-optic network that would ultimately serve 26,000 residences is being constructed by the local energy authority.

While pricey, FTTH technology could prevent the cable providers from trampling the Bells. Customers may get very fast Internet connections through fiber-optic networks. With such lightning-fast connections, customers will be able to download movies in a matter of seconds, and videoconferencing will become an important business tool. South Korea, Hong Kong, Japan, and Taiwan have all embraced FTTH much more broadly than other countries. According to the FTTH Councils of Asia-Pacific, Europe, and North America, they together accounted for more than 30.8 million of the 38 million fiber to the house connections throughout the globe as of mid-2009. In particular, about 45% of homes in South Korea, 30% in Hong Kong, nearly 30% in Japan, and 16% in Taiwan are fiber-connected. The United States comes in at number eight in the globe, about 5% market penetration behind a few Nordic countries.

## DISCUSSION

Services Offered by Ultra-High-Speed Broadband are Innovative and Future-Focusing. As media center PCs become more common in homes and fiber-to-the-home and other technologies make ultra-high-speed Internet access easily accessible to millions of households, digital product developers' imaginations are working overtime to come up with products and services that will benefit from these quick pipelines to the living room. A currently active service is the development of video-on-demand. For instance, NetFlix, a pioneer in DVD rentals, aspires to be the industry leader in online movie rentals. When you consider that Netflix has more than 100,000 titles in its library, this is a fairly large idea. More than 17,000 movies were accessible through Netflix for rapid download and watching on Computers as of the beginning of 2010[4].

Blockbuster, a rival, just debuted its own movie download service. Another idea that is simple to envision becoming popular is the delivery of high-definition television content over internet, particularly as more and more households buy enormous HD flat-screen Televisions for their living rooms. How would you like, for instance, to have a little window running on your computer at work that displays a live HD video of your golden dog playing in your backyard, or possibly a live picture of your baby daughter. Just one step further, it's not difficult to see ubiquitous HD videoconferencing for personal and professional use—possibly an online family reunion. Globally, broadband subscriber growth is booming. At the end of 2009, there were 578 million broadband customers globally, and analysts at In-Stat predict that figure would rise to over 1 billion by 2013.

In South Korea, where practically everyone has high-speed internet, the majority of banking and other financial activities are done online using a smartphone or computer. Internet entertainment is abundant, diverse, and available all the time. The maniacal level of playing video games has risen. Truckloads of Internet-enabled household appliances are being sold in key nations, including the United States, by the appliance, consumer electronics, and mobile phone maker LG. For instance, modern air conditioners, microwaves, and washing machines can all be operated online from a computer or mobile phone. Modern refrigerators contain flat-panel displays with Internet capabilities and cameras embedded in the doors[5].

With time, ultra-high-speed Internet access will also transform a variety of professions. Several sorts of professions, including salespeople and customer support representatives, are increasingly working remotely. While working remotely, professionals like accountants, lawyers, researchers, and engineers may quickly download and upload high quality drawings and videos, interact with colleagues, and securely save and retrieve crucial information in ultra-high speed and high resolution. The University of Phoenix's quick rise is already indicative of how quickly distance learning is still expanding. The ability to access government and public services from a home or workplace without waiting in line is the last improvement.

When new cutting-edge network applications are developed and deployed by Internet2, [www.internet2.edu](http://www.internet2.edu), an advanced networking consortium headed by the US research and education sector, broadband utilization will accelerate significantly. A collaboration between Internet2 and Level 3 Communications, Inc. was established in 2007 to operate a network that has a theoretical capacity of delivering 10 gigabits of data per second. But, researchers are working on ways to transmit data utilizing several light wavelengths over a single wire, which may increase the network's capacity to 100 gigabits per second. Capabilities of up to 400 gigabits per second were shown by the end of 2009.

U.S. Broadband Connections Behind Other Countries in Quality. According to a widely cited report by the Information Technology and Innovation Foundation, the U.S. is approximately midway down the list of OECD countries, like South Korea, in terms of Internet connection speeds, adoption, and pricing. Later, the ITIF noted that America faced numerous distinct conditions in a report titled "Explaining Worldwide Broadband Leadership" from May 2008. For instance, since most Americans live in low-density homes spread out across a large region, telecom lines must go further to reach them, adding to the capital cost. When comparing American houses with those in Singapore or South Korea, where families often reside in very high-density, high-rise structures that make wiring simple, it is simple to see the difference between the two countries. The concentration on short-term returns on telecom investments rather than long-term returns, as well as tax laws, government incentives or subsidies, may differ from one country to another[6].

Despite optimistic pronouncements about the information superhighway from many leaders, the U.S. Government has never prior to recently developed an aggressive broadband agenda. Some countries, like South Korea, have expedited and even financed broadband deployment with the aim of providing the best quality services to advance societal objectives including high-quality assistance for telemedicine, education, public services, and economic growth. United States cable firms and telephone providers are competing for supremacy with their two distinct networks rather than developing broadband services on a single seamless standard. If WiMAX entrepreneurs believe they can outperform the established cable and phone providers, they are developing disruptive, competitive alternatives that further muddle the market.

While cable and telecom companies continue to push out better speeds at affordable pricing, there has been constant relief with respect to broadband in the United States in recent months. The city of Chattanooga in Tennessee is one example of a municipal authority promoting broadband connectivity. Since 2003, the city-owned electric company has provided high-speed Internet access to clients in the downtown area. In 2009, a \$240 million fiber network providing TV, Internet, and phone service to 170,000 users was also introduced. A research conducted by the French business school INSEAD for the World Economic Forum at the beginning of 2008

revealed that the United States placed fourth globally in terms of Internet infrastructure, behind only Denmark, Sweden, and Switzerland. This was another encouraging finding.

The research included 68 variables to assess market elements, political and regulatory contexts, technological infrastructure, bandwidth availability, and data transmission rates. The \$787 billion U.S. government stimulus package enacted in 2009 includes a \$7.2 billion commitment for broadband infrastructure expansion. The FCC is responsible for allocating the monies and is required to produce a strategy for giving all Americans quicker, more dependable Internet access as well as for regulating the services offered by Internet access companies.

Increased use of VOIP poses a threat to the status quo of telecom. Local exchange telephone providers are now dealing with the worst local landline market in history. Why? One reason is the widespread use of mobile phones, but the Internet poses an even greater danger to conventional phone lines. Internet-based telephony is a natural next step for a broad range of organizations and customers, in particular given the fast spread of high-speed Internet connection in homes and workplaces. With almost all telephone equipment manufacturers now providing VOIP technology, the majority of newly installed telephone systems in mid-size to big businesses are based on VOIP. Similar to this, VOIP is being adopted by huge numbers of customers worldwide for their basic and/or long-distance services.

As cable delivers both Internet access and entertainment content, the ability to deliver phone service through the Internet allows cable firms to directly compete with telephone carriers. Voice over Internet Protocol converts analog voice conversations into digital format, which can be almost simply and, more importantly, inexpensively, delivered over the Internet. Internet phone usage is expanding quickly; according to research company Tele geography, there were less than 1 million VOIP phone lines in the U.S. in 2004 but 19.4 million by the end of 2008. Other countries, notably those in Asia where extremely high-speed internet is prevalent in homes and workplaces, are seeing a similar quick increase[7].

Some VOIP services are virtually free or very cheap, but they only provide a few number of functions, including the ability to often call or be called by other users of the same service. Skype was established in this manner. A fully functional VOIP service essentially gives customers a local line with long-distance service included for far less money than other carriers' plans, particularly for international calls. VOIP plans typically range in price from \$24.95 to \$34.99 a month for unlimited domestic call volume. Early in 2010, 500 minutes of local and long-distance calls inside the United States, Canada, and Puerto Rico were included in the \$17.99 per month plan offered by Vonage. Also, a lot of VOIP companies don't charge extra for features like voice mail, call-waiting, caller ID, and do-not-disturb, which temporarily diverts calls from selected people to voice mail and bans their calls. Three-way calling, message retrieval, and system settings are additional capabilities that may be accessed from anywhere in the globe via phone, website, or email.

The option to choose almost any area code as the prefix to their phone numbers is one of the more intriguing aspects of VOIP service. This implies that a building or residence, for instance, in Portland, Oregon, might have a Miami, Florida, area code. Businesses who wish to generate local phone numbers for virtual sites across numerous cities or nations may find this to be very practical. With VOIP, toll-free lines may be set up by both consumers and companies.

VOIP does need some extra hardware, namely an adaptor to link the phone to a broadband modem. The adaptor is portable, however, so customers can utilize the Internet to make phone calls no matter where they are as long as they have a broadband Internet connection. As a result, a user may bring the adaptor to any location with high-speed Internet connection, such as a hotel, airport, or Starbucks, and use it to make VOIP calls. It is not unexpected that the market for VOIP services today has a lot of competitors. Vonage, a company located in New Jersey with over 2.5 million subscribers at the beginning of 2010, is a pioneer in this technology. But, there are also more established corporations like Qwest, Verizon, and AT&T, as well as cable providers like Cox Communications, Cablevision Systems, Comcast, and Time Warner Cable, in addition to relatively new companies like Vonage and Net2Phone. These businesses all provide some kind of VOIP service and all followed Vonage's lead into VOIP. Some believe they might drive lesser start-ups out of business.

In the telecom industry, cable companies are formidable opponents. For instance, Comcast has over 23.6 million cable customers. By the end of 2009, it has already sold 15.9 million of them high-speed Internet subscriptions, including VOIP services to 7.6 million of them. Its expansion poses a danger to Vonage, whose user base is starting to decline. A legal dispute involving patents owned by Verizon Communications, Inc. has severely harmed the company. In addition, law enforcement wiretap equipment must be added, and Vonage and other VOIP service providers must enhance their 911 emergency calling capabilities. Additional monthly fees and surcharges have been implemented as a way to cover the expenses of these upgrades for members.

The adapters are already included in VOIP-capable phones sold by companies including VTech Holdings, Ltd., Uniden America Corp., and Thomson SA. Consumers with Wi-Fi networks may place and receive calls via the Internet while moving around their home or place of business. Now, major equipment manufacturers like Motorola, Cisco, and others provide wireless VOIP phones as well[8]. One of the most intriguing VOIP players is Skype, a division of eBay. The free Skype program must be downloaded to users' computers since Skype uses peer-to-peer technology. Users may then communicate with other computers running Skype software by making an infinite number of free VOIP calls.

A conference call may have several users on it at once. Across the globe, Skype has more than 405 million registered users as of the beginning of 2009. According to Skype, 20 million users are using the service at peak periods, accounting for 8% of international calling minutes worldwide. Full-screen video calling, wideband audio quality that consumes 50% less bandwidth than prior versions, and simplified setup are all features of Skype's 4.0 edition for Windows. The current difficulty for Skype is to transition from providing free software to charging subscription-based payments. For PC-to-standard phone connections with unlimited calls within the United States and Canada, Mexico, or in 36 other countries around the globe, Skype provides three monthly membership plans.

The company also provides customers with SkypeIn, a service that gives them access to up to 10 local phone lines in a choice of 21 nations. Users of SkypeIn are given a regular phone number that non-Skype users may call. Monthly members get a significant discount off the \$60 annual fee. The market for VOIP services is already quite competitive. As a result, customers may anticipate more innovative features, better service, and lower costs. Since VOIP service providers don't need to invest in expensive telephone infrastructure and instead depend on the

Internet as the foundation of their operations, they may operate much more affordably than conventional landline providers.

Unified Communications, Telepresence, and VoIP are only the beginning of the development of communications that is happening online. Next is "unified communications," a system that Microsoft, Cisco, and others are working to develop. With unified communications, conventional telecoms infrastructure, including PBX, fax, and even the desktop phone, is replaced with cutting-edge technology. Each office worker has access to communications tools such as VOIP phone service, email, voice mail, fax, instant messaging, collaborative calendars and schedules, contact information such as address books, audio conferencing, and video conferencing via the desktop PC thanks to special software running on a local or remote server. A worker who is out of the office may access the unified communications portal through Internet-enabled mobile devices such as cell phones as well as remote PCs over secure Internet in addition to accessing all of these tools via one portal on the desktop Computer. Microsoft claims that it anticipates unified communications will soon revolutionize business in a similar manner to how email did in the 1990s.

Using unified communications, for instance, you may call someone by clicking on their name in your contact book and starting a VOIP call. You send a fax by clicking on a contact's fax number in your address book and then clicking on the document you wish to send the fax to in your documents folder. Your screen will identify the calling number and compare it to a name in your address book when you get an incoming call. With a single click, you may decide whether to answer the call or send it to voice mail. You could digitally record, store, review, and archive phone conversations in the same manner that you already save and archive emails. Among the benefits highlighted are mobility, security, and improved teamwork.

Manufacturers of conventional phone sets, PBX systems, fax machines, etc. are at risk from this technology. Due to the fact that it is an extension of programs you are probably currently using, including Microsoft Exchange and Microsoft Word, it may be astonishingly simple to set up and manage. Integration with business applications and customer relationship management systems are logical next stages for unified communications.

Unified communications, however, may provide capabilities to meet demands that go far beyond daily duties. For instance, conference calls and even video conferencing might be improved significantly. For instance, network equipment giant Cisco is promoting a cutting-edge technology it calls "telepresence."

Cisco will provide the hardware and software needed to fully equip a state-of-the-art video conferencing room for a price ranging from about \$33,900 up to \$350,000 per installation, depending on the number of screens and other options. A room like this may include up to three 65-inch plasma displays, cutting-edge high-speed cameras, projectors, microphones, speakers positioned to make the sound appear to be coming straight from the speaker, along with the necessary software. Images are clear and lifelike, and there are seldom any pauses in the discussion[9]. In fact, the participant's picture is life-size from the chest up. Prerequisites include high bandwidth and blazing-fast, dependable Internet connections. Cisco announced a personal system for usage in individual workplaces as well as a large telepresence space intended for team meetings and training sessions in 2008. HP, with its Halo product series, is another significant rival in this market.

### **Cisco's Telepresence Approach Is Effective**

Very much so. Telepresence has many benefits, including improving cooperation and communications, increasing the effectiveness and lifelikeness of distant meetings, and significantly eliminating the need for costly and time-consuming business travel. At its own international offices, Cisco had more than 400 of these telepresence rooms built by the middle of 2009. There were HP Halo telepresence systems in use or being installed as of March 2008 in 22 different nations, including a partnership with Marriott International, Inc. to deploy systems for public usage in certain hotels. HP added webcasting capabilities to their Halo system in 2009, enabling businesses with at least one Halo telepresence station to multicast video presentations over the Internet for roughly \$6,000. LifeSize Communications, a videoconferencing company situated in Austin, Texas, is a relatively recent participant in the market. Although other companies, like Cisco, start at roughly \$30,000, LifeSize begins at \$5,000 and sends video broadcasts via standard Internet gear using high-definition cameras. The company's most sophisticated telepresence system, called LifeSize Conference 200, costs around \$40,000 and can link up to six locations utilizing three video displays and one data monitor. LifeSize had over 9,000 clients by the end of 2009, which was enough to force Polycom and Cisco to lower their prices. In the latter part of 2009, Logitech purchased LifeSize. Watch for firms to depend on videoconferencing as a more affordable option to business travel during the next several months.

### **Security Requirements Increase, and Google Chrome and Firefox Expand**

Each computer user who accesses the Internet or sends and/or receives email puts themselves at risk for contracting viruses, worms, Trojan horses, and other undesirable programs like spyware. The Internet gives users access to a wealth of information, but it also exposes them to malicious code created by hackers or code that is not malicious but might nonetheless execute undesired acts without the users' knowledge or agreement. The purpose of malicious software like viruses, worms, and Trojan horses is to harm computers or the data they contain. A virus is a piece of computer code designed to reproduce itself. Malware spreads from computer to computer via shared files or through email.

In contrast to viruses, worms propagate automatically. They often replicate across networks at an alarming rate, gobbling up memory and bandwidth while frequently causing computers, networks, and even the whole Internet to become unresponsive. Trojan horses are malicious software applications that often come as email attachments. When you open the attachment, an application launches that may do anything from erase hard drives to disable other installed apps. Every day, new and more harmful files are produced and spread. Internet and email users can protect themselves, which is excellent news.

Antivirus software, firewalls, and adopting caution while using email are just a few measures that help protect Computers and networks. Computer files are scanned for known viruses and undesirable applications by antivirus software like Symantec's Norton brand and McAfee's offerings. Files are separated and disabled when they are discovered. There are numerous different security systems available that are intended to protect anything from individual computers to large-scale networks. To be able to identify more of the most recent dangers, the software makers are continually improving their products.

Hardware or hardware/software barriers called firewalls prevent unauthorized users. They guard against intrusion, keep tabs on possible dangers, and check all incoming and outgoing data for



issues, warning users when anything odd is discovered. Moreover, using common sense may help safeguard PCs from harmful downloads. Wary users should never accept attachments from unknown senders, or even open attachments from recognized sources if the contents of the attachment are not fully understood beforehand. This is because many harmful files or programs come as email attachments. When in doubt, it is often safer to delete than open dubious attachments [10].

Spyware and other similar software are the focus of many security demands. Computer slang for applications that gather private data or alter system settings is spyware. This kind of software, which is often used by media and advertising businesses that provide information or services like music downloads in return for the permission to show advertisements, may be lawful. Covert spyware may be deployed as part of the entire installation process when users opt to share or download data. Hence, these apps have the ability to modify system configuration options like home pages and toolbar settings without the users' awareness. They may also transmit personal information back to the media or advertising organization that provided it.

The benefit of spyware may be the ability to tailor programs to a user's Preferences. A wide range of issues, such as poor system performance, obtrusive pop-up adverts, computer crashes, unwanted PC spying, and even identity theft, may be brought on by spyware. Often used web browsers like Internet Explorer are used to access spyware. As more consumers become informed about malware and its ilk, alternative browsers are gaining market popularity. For instance, Mozilla's Firefox 3.6 is the company's most recent open source alternative browser that is intended to be less vulnerable to malware and viruses.

Firefox 3.6 has more than 58.8 million downloads as of the beginning of 2010. According to Net Applications, Firefox's market share of the world's internet browsers reached 23.3% in January 2010 and is growing. Apple's Safari owned 3.63% of the market, while Microsoft's Internet Explorer had 68.5% of it.

Netscape Communications, which Time Warner, Inc. owns via its merger with America Online, founded the Firefox Foundation in 1998. Netscape 6, the company's previous browser, was introduced in 2000 but failed to compete with Microsoft. The new Firefox initiative has a lot of potential. By January 2006, there had been more than 20 million downloads of the system since the introduction of Firefox 1.5 in November 2005. In October 2006, Firefox 2.0 was made available, and Firefox 3 debuted in 2008. As of late 2009, a Firefox version 4 was being developed.

Microsoft is responding, however, by disseminating details about security requirements and providing security-enhancing upgrades and fixes for its browser and associated products. When Windows Vista was introduced at the beginning of 2007, it significantly outperformed earlier Windows versions in terms of security. The most secure operating system to date is Windows 7, the most recent release from Microsoft. Moreover, Microsoft unveiled a much upgraded 8.0 version of its popular Internet browser.

2008's Internet Explorer software has several cutting-edge security measures. Google has some of the biggest and most effective data centers in the world by 2008. Via its open-source Chrome web browser, the firm intends to profit from such servers. Users of the free browser may run different programs in separate tabs as Google shows them customized adverts. For Google, which has supported Firefox before, Chrome represents a significant shift.

## CONCLUSION

An economy of a developing country that is expanding and becoming increasingly integrated with international markets is known as an emerging market economy. Countries possessing some but not all of a developed market's features are categorized as emerging market economies. An economy that operates on the interplay of supply and demand for goods and services is known as a market economy. The market encourages entrepreneurs to compete freely. A market economy has the following traits: It is driven by supply and demand. High growth potential is the main benefit of investing in developing markets. Diversification. Your investment portfolio may benefit from international investments since economic downturns in one area or country, including the United States, can be countered by growth in another.

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