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# ΠΤΥΧΙΑΚΗ ΕΡΓΑΣΙΑ

# **ACCOUNTING ON E-COMMERCE**

ΣΠΟΥΔΑΣΤΗΣ: ΜΕΛΙΣΣΑΣ ΚΩΝΣΤΑΝΤΙΝΟΣ

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#### **ABSTRACT**

The rapid development of electronic commerce and its significant contribution to the growth of global economy have highlighted some critical issues from a financial perspective, especially the taxation. The fact that the technical characteristics of the Internet complicate the detection of certain commercial operations results in respective difficulty of determining the corresponding tax of the individual transactions, a fact that fosters tax evasion and avoidance, resulting in large amounts of taxable income to evade the financial authorities of the countries. The purpose of this paper is to present the general framework of electronic commerce in Greece and furthermore, in the major markets of the world (USA, EU), under the guidelines of the OECD and the EU, as well as the recent regulatory developments inside and outside the EU.

#### **HISTORY OF THE DEVELOPMENT OF E-COMMERCE:**

In the beginning, electronic commerce was considered as facilitating e-commerce transactions using technologies such as electronic data interchange (EDI) and electronic funds transfer (EFT). These were introduced in the late 1970s, allowing businesses to send commercial brochures such as purchase orders AI electronic invoicing. The development and acceptance of credit cards in the 1980s, automatic teller machines and telephone deposits are also forms of electronic commerce. We could not omit the system of booking airline seats standardized by the company Sabre US and Travicom UK. From 1990 onwards, e-commerce includes in-company planning system (ERP) and the search and store of data (data warehousing). Nowadays, electronic commerce involves everything; from ordering digital content for immediate online consumption to ordering conventional goods and services, as well as services that facilitate other forms of electronic commerce. On a research level, large corporations and financial institutions use the internet to exchange financial data to assist domestic and international companies. The data integrity and data security are critical issues of electronic commerce.

#### **CONTEMPORARY DEFINITION:**

The term electronic commerce (E.C.) or commonly known as e-commerce, eCommerce or e-comm, describes the commercial provision of goods and services performed remotely by electronic means, that is based on electronic data transmission, without necessitating the physical presence of the parties, the seller and the buyer. It includes all the online processes: development, promotion, sale, delivery, service and payment for goods and services. The range of trade conducted electronically has grown remarkably because of the wide use of the Internet. The trade that is conducted in this way, results in spurring and absorbing innovations in electronic funds transfer, the supply chain management (supply chain management), online marketing (Internet marketing), online in processing procedures (online transaction processing), the ex-

change of electronic data (electronic data interchange, EDI), the recording management systems (inventory management) and automated data collection systems.

#### **MEANS OF E-COMMERCE:**

Under current legislation the listed e-commerce means by which commerce is being considered as electronic, apart from the various brochures and catalogs or advertisements in media, are: by telephone, radio, videophone, the Videotex (microcomputer and television screen) with keyboard or touch screen, email fax and TV. Having noted this, electronic commerce involves the digitization of markets: products or services over electronic systems such as the Internet. It includes, apart from the typical shopping on the Web, the whole industry that supports these markets: online transaction processing (for banks in particular), benefit chain management, electronic data exchange. E-commerce has dramatically changed the acquisition process concerning both companies and the final customer. It appears that the Internet offers many purchasing opportunities; offering goods from CD to digital books, cars, as well as houses. E-commerce has increased significantly in recent years, including the realization of special shopping cards.

#### 1. INFRASTRUCTURE

It is widely considered that e-commerce is nothing more than one having their own website, but E-C is much more than that: it is a system that functions as financial, fiscal and legal environment, with certain technological standards, controlled by the human factor.

An approach of e-commerce could possibly include:

- Electronic Markets
- Interorganisational Information Systems IOS.

Interorganisational Information	Electronic Markets
Systems IOS.	
TYPES B2B	TYPES B2B AND B2C
The customer / supplier relationship is predetermined and from a long-term perspective.	<ul> <li>Two types of relationships exist:</li> <li>The customer / supplier connection formed during the course of the transaction and can be for a single transaction.</li> <li>The purchase agreement between P / P that acquires status when the supplier agrees to deliver to the customer products or services for a specified period.</li> </ul>
These systems can be installed either in private networks or in freely accessible networks.	Electronic markets are usually installed in
	Vendors working with electronic market operators co-decide about the type of transactions that they offer.
When involving third communication companies, they are typically Value Added Carriers (VANs)	When other companies are involved, they usually are online service providers
Communication networks are used as a subject / object foregoing agreement.	Both customers and suppliers decide for themselves about what communication networks they will use to participate in the electronic market. The network used might vary from transaction to transaction.

Common guidelines, used lines and obli-	No guidelines in advance.
gations of each party are preset.	

# 1.1 CLASSIFICATION OF FRAMEWORK OF ELECTRONIC COMMERCE WITH CRITERION TYPE OF TRANSACTION

- 1) Business -to-business, (B 2 B). It includes most of the UN. It includes inter-company transactions already mentioned, as well as the electronic market-transactions between organizations.
- 2)Business to Consumer (B 2 C). This category includes retail transactions with independent, individual consumers.
- 3)Consumer -to- consumer (C 2 C). In this category, consumers sell directly to other consumers. For example, the people who sell items in auction websites, where anyone can sell anything. Many individuals make use of intranets and other intra-group networks to advertise objects, products or services, as well.
- 4)Consumer-to-business (C 2 B). This category includes people who sell products or services to organizations as well as individuals seeking vendors, contacting them and completing a transaction.
- 5)Non-business EC. A growing number of institutions, eg academic institutions, non-profit organizations, religious and social organizations, etc., that use different types of e-commerce, to reduce their costs or to improve the operations and their customer service.

6)Intrabusiness EC. This category includes all internal operations of a company, which are usually carried out in-house networks and related exchange of products, services and information. Such activities are, for example, the sale of a company's products to its employees, the various educational programs, and other cost reduction activities.

#### 1.2 POLYMORPHIC NATURE OF ELECTRONIC COMMERCE

E-commerce is a broad term which includes furthermore:

- Marketing. Many of the traditional marketing issues relevant to the online EC, such as advertising strategies and the resulting decrease in costs through advertisements. Some other techniques belong exclusively to the EC, for example the online marketing strategies and interactive kiosks.
- 2. Computer Science.
- 3. **Consumer behavior and psychology**. Consumer behavior is the key to the success of B2C commerce, to the same degree course, which is the behavior of sellers. The relationship between the culture of individuals and their attitudes towards electronic market is one of the research in this field.
- 4. **The Public Finance**. The financial markets and banks are the main players in the EC, since the financial transactions are an integral part of the e-commerce process; the use of internet as a substitute for a stock exchange and fraud in online share trading is one of the many cases.
- 5. **The Economic Science**. The EC is influenced by different economic forces and undoubtedly has a great impact on the global economy and on the each and every national economy. Still, Microeconomics theories should be taken into consideration in the design of the EC, as well as the economic impact of EC businesses.

- 6. **Information Systems**. Usually the development of EC in a company is entrusted to experts of the Department of Informatics. To its jurisdiction belong systems analysis, systems integration and design, implementation, security, payment systems.
- 7. **Accounting and Auditing**. The rules and principles of traditional accounting behind electronic trading.
- 8. **Management Science**. The management of actions relating to electronic commerce requires specialized knowledge and great care. The format featuring of the EC, requires the development of new theories and approaches.
- 9. Business Legislation and Ethical Issues. Legal and ethical issues are extremely important in the EC, particularly in the context of global management. A large number of draft laws has been pending, for many ethical issues directly depend on legal issues such as privacy protection and intellectual property.
- 10. **Others**. We cannot but notice the relevance of EC with other disciplines, which by the way contribute to the e-commerce, but to a lesser extent, for example Linguistics, Robotics, Sensory systems, the Operations Research, the Administrative Science, the Statistical Office, the Public Administration etc. Applications of the EC still found in Engineering, in health-care system, in communications and in the entertainment industry.

#### 2. FUNCTIONALITY OF E-COMMERCE

According to the rapid digital expansion, entrepreneurs should realize that they can make use of a new distribution channel for their products and services. The change may seem difficult at first but offers significant advantages over conventional means of distribution: Reduction of operating costs: An online store can operate with a significantly lower cost than a conventional one. Rent, utility bills, staff salaries, costs, security systems; changes that are important for running a business in the long

term. The online stores may have much lower operating and maintenance costs. Better inventory management & scheduling facility:

- A) Keeping inventory is an issue for all businesses as it requires the commitment of capital. With the use of e-commerce, this stock is minimized and concomitantly reduced and the capital is committed by the operator.
- B) Broadening the customer base: Potentially, in a web store the access is easier from customers around the globe. Reduced marketing costs: Conventional ways of promoting a product is usually more expensive compared to electronic ones.
- c) An online store operates independently as an advertising medium.
- D) Especially when combined with other online advertising tools (the use of social networks, Google AdWords and others)
- E) More effective marketing: The marketing with the use of web tools can in addition be cheaper and more effective, with results quite measurable.

The Internet is an interactive medium and so useful information can be chanelled in order to outline the consumer profile, something that leads to best direct marketing and managers and entrepreneurs attract easier potential customers. All these advantages help to reduce the risk for businesses located in their infancy. But most existing businesses can potentially adjust their strategy on how they sell or promote their products. Electronic commerce has now been upgraded from an innovative process to

a distribution channel, at least equivalent to conventional ones. So entrepreneurs must handle it with the appropriate attention and as an important part of their activities.

#### The process of placing an electronic order?

As an example of an electronic order we can look at successful businesses, such as e-Bay, amazon, Wish, Ali Express.

Initially the buyer connects to the market place and then searches for the product. In some systems, vendors can update product information and in others, a central administrator makes this job. Some systems also mention advertising, news and special information. At the same time, the buyer selects the product and the content can be dynamically generated based on the user profile. Buyer order the product and the purchase order is sent to the seller who confirms the order. Later the consumer pays for the product and payment information is sent to the bank where the credit is checked and approved. After that, the payment is carried out and the product is sent by the seller and received by the buyer.

# 2.1 QUALIFICATION, ADVANTAGES AND DISADVANTAGES OF E-COM-MERCE

#### **Qualification**:

- Search products by category or genre.
- Shopping basket.
- Our partner has the ability to record data and using username and password to see the orders file.

- Different currency types.
- Calculation tax based on various factors (weight, area, etc.).
- Calculate shipping costs based on various factors (weight, area, etc.).

#### Benefits:

- Introduction to new markets
- New customers
- Increase productivity secure cash transactions
- Competitive Advantages

#### <u>Disadvantages</u>:

- No confidentiality and security regarding the content of some information.
- There is no integrity in order to protect the subject of the information handled.
- Therefore ecommerce lurking dangers for the unsuspecting user.

# Advantages of e-commerce for the consumers:

1)Online stores are open 24 hours to 24 hours. In other words any time you wish, you can buy eg a CD, a plane ticket, or even insulation materials needed for your building.

2)The cost of products sold over the Internet is generally much lower than commercial rates, as an online store is free from much of the operating costs of a real store

(renting space and 'air', electricity, water etc.) and generally it requires much less office staff.

3)The market is truly global. In other words, you can use your computer and buy a product which is not marketed in Greece, without having to wait longer.

4)The transaction is quick and straightforward. In other words, once you complete your order no later than 3-4 days you will receive it, even if at the time of the order the product was on the other side of the planet.

5)But the most practical and most important benefit for the consumer is that the e-commerce offers the ability to everyone to find the product they want, whenever they wants, without effort or delay. In other words simple and easy shopping at home or at the office!

## Advantages of e-commerce for the company:

1)As mentioned before, any company that has online presence can broaden its turnover by expanding the geographic boundaries of the transactions. This means that any business that sells its products online, can acquire customers in areas that are far away and even abroad. In other words, any business that has an online store, it is likely to have branches in many areas and with minimum operating costs.

2) Any company that uses new technologies- such as the Internet- becomes more competitive by definition, it can be updated more easily on current developments in

the area. Given that in a few years all commercial activities will be done through the Internet, e-commerce is the new big challenge for any company that wants to be competitive.

3)Electronic transactions allow bidirectional relationship between business and consumer (interaction). This means that each company through electronic transactions can collect a lot of data on the habits, needs and consumer tastes and according to them adjust its policy to gain more profit.

4) Finally, knowing the specific needs of their customers, companies can proceed to creating specific products or responsive to a consumer or a group of consumers who need a new product that does not yet exist on the market.

#### Disadvantages of the e-commerce:

- 1. Consumers still do not trust the Internet for their transactions and especially reluctant to send the number of the credit card through it.
- 2. Some types of businesses such as companies with laundry products, delicate foods, jewelry is virtually impossible, for the moment at least, for the consumer cannot adequately control the quality of the products, from a remote location, thus hesitate to place such orders, although there are exceptions.
- 3. A few online stores that sell large in volume and heavy products, have to deal with significant shipping costs.

- 4. The cost of creating a simple online store may be changed dramatically, by adding new technologies that help to deliver it.
- 5. Every business should invest a large sum of money every year for maintenance and optimization of an electronic shop.
- 6. It involves difficulty in integrating existing databases they use for their traditional trade, with software that allows integration with their online store.

#### 3. TRANSACTION METHODS IN ONLINE SHOPS

Consumer payment systems even knows rapid growth, however both the possibilities and the benefits that derive from their use are still largely untapped. Payment systems that have been adopted and are constantly evolving payments in cyberspace include systems and technologies such as: Credit cards Electronic checks, digital cash, smart cards and electronic wallets, electronic funds transfer (EFT), Debit Cards, Financial EDI (tex unipi), Prepaid cards and Third payment services (PayPal type). Finally note that there is no absolute identity between e-commerce via the Internet and electronic payments as well, not all online transactions are paid via the Internet and not all forms of electronic payment with the internet related.

#### **Credit Cards**

As mentioned credit cards are the most popular way of electronic payment. They constitute a payment method in which exempt the consumer from having money on

it. The parties involved in a credit card system is the credit card holder (consumer) the merchant card issuer (financial institution - bank) o addressee (merchant bank) the title bearer of a card (eg MasterCard, Visa). In an off-line credit card transaction, the consumer is asked to demonstrate its ability to pay, showing the number of the credit card to the merchant. The latter records the card, creating a transaction document. This document is signed by the buyer and forwarded to the bank for processing (verification number).

At the end, the bank debits and credits the accounts, informing the parties that the transaction is carried out (tex unipi). The use of the credit card on the Internet follows the same script. However, the electronic transaction must take some additional steps to ensure safe transactions and certifications for both the buyer and the supplier. This led to the development of a variety Internet credit card systems. Two of the most basic features that distinguish these systems are related to the level of security provided for the transactions and the software required both from the consumer side and the business to achieve and carry out the transactions. The handling of credit cards can be done on-line in two different ways: either by sending unencrypted Internet credit card numbers, or (mostly) by encrypting the data on the card before making any transaction. If not used cryptography and done without any processing mission of consumer data, particularly the number of the card, it is very likely and frightening, that someone monitors the network traffic can intercept the transmission and intercept data of the buyer). So in order to secure communications network various methods, protocols and standards have been developed. By these standards the data card is encrypted, ensuring both the validity and security of the data card. SSL (SecureSocketsLayer), SET (SecureElectronicTransaction) JEPI (JointElectronicPaymentsInitiative).

#### **Electronic checks**

The electronic check system is essentially the electronic application of the printed checks system. An electronic check is generally all the features that has a paper

checks and works almost like this except that it can only be used once. A check is in fact a message to the consumer's bank to transfer fund from his account to another account. In line with the traditional process, the electronic check originally sent to the recipient who shall sign and forward to the bank in order to obtain the corresponding amount. The method is effective but rather unsuitable for Greece, given the lack of retail transactions by check. From a security perspective, the electronic check is considered better than the print because the number of the sender's account is encoded with the public key of the bank, so without disclosing the merchant (tex unipi). The electronic check system security features include encryption, digital signatures and certificates. Electronic checks are more important in B2B HE. therefore required a highly secure payment system specifically for large-value payments. Also electronic checkbook (the equivalent of the electronic wallet) should be integrated into the accounting information system of the buyers and the sellers server.

#### E-cash

Central banks generally classify as digital cash, any monetary value stored electronically on a technical device, which is suitable for widespread use in making payments, which not necessarily require the involvement of bank accounts in the transaction works like prepaid bearer. But generally the term digital cash, we would say every money transfer form between two or more parties made digitally and without the mediation of a medium material. In a digital cash system currency is not only a vote sequence. With this method there is a bank issuing "currency 'in fact namely electronic records on computers, called tokens. The transactions made by exchanging tokens and core of this technology is the asymmetric key cryptography. Essentially the tokens is a type of accounting records that confirmed the 'issuing authority' means the cryptographic method. So the bank validates each token with a digital stamp first of its transmission to the consumer's computer. So when someone wants to transact with digital cash, you only have to give the appropriate amount of tokens to the merchant

who in turn relays them to the bank for validation and redemption. For those who wish to remain anonymous is the method of "blind signature" which is used in the system developed by Digicash. This method allows the buyer to purchase e-cash from the bank without her being able to associate the name of the buyer with the coupons issued. To ensure that each coupon only once used, the bank records the serial number of each voucher as it is spent. If the number of the bank notes existed deceit, and inform the trader cancels the slip. The main issue for these systems is safety. The digital cash is mainly dealing with small amounts and while it is technically feasible presents numerous problems and is generally more problematic form of payment on the internet.

#### **Smart cards**

The idea of electronic money coined in the 1970s, when the first smart cards were created. Plastic cards with magnetic lines are used to store data such as personal identification numbers. Still used to store monetary value that decreases with use. Applying e.g. transport, telephone (phone card, sim. Essentially then a simplistic –from a contemporary point of view- kind of smart card was created and used. The current generation of smart card contains a microchip personal identity with programmable function capabilities. These kind of cards are tiny computers, having the size and shape of a credit card, on which is built an entire circuit (chip), the front left side. these cards may use to purchase products - services to store information for access control to bank accounts, etc. generally offer unlimited possibilities and are a basic technique of a user authentication (verification of user identity). Their main feature is the ability to store and process information in a secure manner, the smart card is the most sophisticated form of works as an electronic wallet and performs all the conventional functions wallet. In the future it may even be used as a payment instrument in the field of public transport, enabling the holder to use it as payment for boarding the subway, on buses, but also for crossing the toll on national roads.

The function of the smart card has the same base with the operation of magnetic cards, only smart is more sophisticated as they have microprocessors, ROM and RAM and have more memory than magnetic. In addition they have built the capacity for calculations. So far the value of the money transfer can be removed and recharged. Smart cards currently on the market are based on symmetric encryption algorithms. The unique features benefits available to them, make them excellent tools for many types of transactions. So in many countries slowly (as in our country - Ethnokarta) replace magnetic cards for credit and debit applications. The smart card is the most sophisticated form of works as an electronic wallet and performs all the conventional functions wallet. In the future it may even be used as a payment instrument in the field of public transport, enabling the holder to use it as payment for boarding the subway, on buses, but also for crossing the toll on national roads. The function of the smart card has the same base with the operation of magnetic cards, only smart is more sophisticated as they have microprocessors, ROM and RAM and have more memory than magnetic. In addition they have built the capacity for calculations. So far the value of the money transfer can be removed and recharged. Smart cards currently on the market are based on symmetric encryption algorithms. The unique features have advantages, making them excellent tools for many types of transactions. So in many countries slowly (as in our country - Ethnokarta) replace magnetic cards for credit and debit applications.

## **Electronic funds transfer (EFT)**

Electronic transfer of funds appeared in the 1970s and refers to communication between the two banks for the settlement of transactions between them. This communication may be via EDI or other technologies. The Electronic Funds Transfer, using EDI, is still a widespread implementation of UN since several years almost all transfers are made electronically. More specifically, the EFT is a popular electronic payment method by which

one can transfer a sum of money from one bank account to another in the same or a different bank. Also with EFT can someone online and automatically deposit money in his personal account (salaries, pensions, etc.). Today we can use the EFT via Internet implying that connection between kyvernotrapezes and safety protection during transmission is mandatory. Protecting the used software is necessary and this can be done with encryption methods. Electronic funds transfer is increasingly used nowadays as a result of the development of electronic commerce and electronic transactions. Finally, we could say that the Electronic Funds Transfer (EFT) is a very important step in the development of electronic commerce, having delivered a very important services to users. The use of offers speed, high level of security, reduces transaction costs, offering 24-hour service and finally help to avoid red tape and overcrowding.

#### **Debit Cards**

Debit cards are known as the Electron Visa Electron. Issued by banks as credit but do not work through credit but through billing. A debit card is a card authorizing the electronic transfer of funds on-line, as opposed to credit that offers the possibility to pay later. The debit card is a way of immediate payment, by using the appropriate amount of the transaction is deducted automatically from the bank checking account or savings of the user and in any case can not exceed the limit of available funds account. Some banks for issuing such cards require monthly subscriptions and some not. If there is no subscription, an ideal and very particularly inexpensive solution to business transactions (B2B). Debit cards are accepted in many shops and their positive element is that in case of theft of card data maximum amount that can be deducted is that which exists in the customer's account, it is recommended that no big rest when not needed. Also they offer numerous advantages to their holders: Acquired much easier than a credit card and use does not require the demonstration

identity. Merchants accept debit cards more readily than checks, and the user is not obliged to carry with him cash or checks. Purchases with debit cards they may have less protection from the markets with credit for items that never delivered or is defective. Returning goods or canceling services purchased with a debit card is like they were purchased with cash or check. The security certificate for a credit may be the same as a debit card on the internet.

#### Prepaid cards

Prepaid cards or Gift cards are Visa cards that are prepaid and do not require an account in a bank. The individual gives the bank the amount of interest plus an amount for card issuance costs. Then the card can be used in customer transactions but only up to that amount includes. These cards have a timeout in which the given amount must be used otherwise the amount will be returned after the bank removes any transaction costs. In some banks it is possible to "reload" the card with additional money, with the necessary physical bank charges. Such cards are the Attica gift card, prepaid Eurobank Visa etc.

## Financial EDI (FEDI)

The Financial Data Exchange, is nothing more than using EDI for financial transactions. Is that a specialized EDI format, where one of the two operators is a bank or other financial institution. Applications of this technology have already been developed for carrying out banking transactions from home (home banking) and for payment of commercial transactions (where customer and supplier give corresponding instructions to their banks for the settlement of accounts). To be safe payment method, the security mechanisms used in SSL protocol should be adopted. Also use extranet is another embodiment FEDI safe and can be used for more security in trans-

actions between financial institutions and enterprises. The extranet encrypt packets exchanged between senders and recipients using public key encryption.

## **Other payment services**

These services operate as virtual banks, namely as a mediator by the seller and the buyer, facilitating safe completion of the transaction giving the contracting parties only the information necessary to complete (name, address) the transaction. In this sense, the customer is not be obliged to give details of the card directly to the seller. Of course this assumes good faith. PayPal is a Collection mechanism to undertake and send the money to the seller for a transaction. Since transaction security side is considered the safer as there is no possibility of card data theft, one can use Pay Pal instead of credit, debit or smart cards. Using the service requires opening an account that is absolutely free for the buyer and has little cost to the seller. It is estimated that over 63 millions people use PayPal services in their dealings. Services of this type is known PayPal.com, now growing MoneyBookers.com.

# 3.1 ELECTRONIC TRANSACTION HAZARDS

In an online transaction any threat that tries to intercept and seize any sensitive information that appears in an online transaction could take place. The forms of such threats vary, but the following are the most common electronic transaction risks:

1)Interception of data

- 2) Destruction or corruption of data
- 3) Masquerade Malicious intrusions on networks (hacking)
- 4)Credit card fraud
- 5)The fishing
- 6)Standalone malware (viruses, worms, Trojan horses)

#### 3.2 PROTOCOLS SSL AND S-HTTP

The two main protocols that ensure confidentiality and the secure transmission of data between the Web users. The SSL protocol (Secure Sockets Layer), which tends to be replaced by the TLS protocol (Transport Layer Security), is used to encrypt data in order to secure their broadcast. In SSL protocol there are two parties in the transaction, a server, which provides the consumer with websites that they want to visit and a user, which in this case is the consumer who visits websites and sends data to them. The user sends a request to the server for SSL communication. The server on the other side, uses a digital security certificate sent to the user, assuring that the page they are visiting is indeed the one declared. The HTTPS (Hypertext Transfer Protocol Secure) is used to indicate a secure network connection http. A link (URL) that begins with the https prefix: // denotes that would normally use the HTTP protocol, but the connection will be made such that data to be exchanged encrypted. The HTTP essence is the combination of the simple HTTP protocol with SSL protocol provides data encryption capability.

#### How do I recognize if a shop site makes use of these protocols?

Whether a website makes use of these protocols is something that the consumer can easily notice. Before making an online transaction or during their tour to the site of the shop or the page which is to enter any personal data, the tiny padlock icon and https indication should appear: // before the web address. If the consumer finds these entries, they can feel relatively safe with regard to the transfer of their personal data. Security protocols offer a high level of secure data transport, although not a total security and disappearance of interception probability. For this reason one should in any case, be suspicious and very cautious. It is advisable to avoid transactions with online store for reliability which creates doubts.

#### 3.3 CONSUMER PROTECTION

#### 1.Legal Protection

The protection of internet consumers is succeeded by common consumer protection provisions, under the law 2251/1994. This law applies to electronic transactions in which the user has the status of consumer (modification under m.r. 5338/2018, which was emended by law 4512/2018). In accordance to the 1a article of law 2251/1994, as amended, a consumer is any natural person, business, craft or professional, while a supplier is any natural or legal, irrespective of whether it is governed by the private or public law, which acts even through any other person acting in its name or on its behalf, for purposes related to the commercial Business, crafts or business activities.

The provisions of the consumer protection law find an application related to the general terms of trade distance contracts, advertising and sale of consumer goods

#### **4.GENERAL TRADING CONDITIONS**

Contracts drawn up electronically, where there is no personal contact between the parties, often include general trading terms, which are preset and apply to an unspecified number of contracts. The general conditions of transaction and the relations of the parties in case of abnormal development of course in consumer contracts must be respected under the provisions of law 2252/1994 on general trading conditions

Initially, in order to incorporate the general conditions of trade in this contract, the supplier must indicate the existence of the vendor to the consumer. The general conditions of trade and subsequent agreements established in Greece must be written in the greek language in a clear, specific and intelligible way.

Furthermore, the general conditions of trade must be placed at the latest conclusion of the contract. Therefore, they will not be valid if they are known to the consumer at the delivery of the product or if there is just a reference of them that requires the consumer's request to receive them. Of course, the general terms of transactions are not required to refer to each product presentation on the internet, they just have to sufficiently refer to each order in a prominent place so that the consumer can acknowledge their content, such as through a reference with a link (hyperlink) located at a central point of the supplier's website. It is obligatory that the internet service user is given the ability print out the general trading terms that also have to appear in unity on the screen and. In addition, articles 9&2 of 3131/1003, stipulate that these conditions must be provided by the supplier in such a way as to permit the storage and reproduction of the terms at any time.

And even the general terms of trade contained in electronic contracts are subjects to control by utilitarian according to the provisions of article 2,6 and 7 of law 2251/1994. The general rule of article 2&6 is that the general conditions of trade

which result in a singnificant disturbance of the right and obligations of the parties to the detriment of the consumer are prohibited and are invalid.

After the amendment of law 2251/1994 in the control of abusiveness, the general terms of transactions apply to small businesses as well, perceiving them as consumers. A prerequisite for this is to meet the following conditions cumulativelyQ

- the contract shall include conditions which have not been individually negotiated between parties
- incompatible with the supplier to meet the criteria of the small undertaking in according with article 2 of low 4308/2014
- the antisymballomenos of the supplier to contribute as the final recipient of the products or services provided

A Distance contract is defined pursuant to article 3 par.1 of law 2251/1994, in case any contract conclude between the supplier and the consumer in the context of a system of supply of goods or services from a distance or provision of services without the simultaneous physical presence of the supplier and the consumer with the exclusive use of one or more communications from a distance such as email ,telephone ,skype

# 4.1 ELECTRONIC PLATFORM FOR CONSUMER DISPUTES' RESOLU-TION

A major problem in e-commerce relating to the judical resolution of consumer disputes finds its solution with regulation number 524/2013 of the European Commission on electronic resolution of consumer disputes. This regulation was adopted with the aim of contributing to the achievement of a high level of consumer protection, the

proper functioning pf the internal market, in particular its digital dimension, by providing a EUROPEAN platform for electronic resolution pf various facilitating in order to facilitate the independent impartial, transparent, effective, rapid and equitable judicial resolution of the various consumer and traders disputes electronically for the implementation of this agency the executive law 2015/1051 of 1<sup>st</sup> of july 2015 on the conditions for the exercises of the functions of the online resolution platform, the details relating to the electronic complaint form and the conditions for cooperation between the contact points provided for in regulation 524/2013

The scope of regulation 524/2013 is of course limited as it applies to judicial resolution of various disputes between consumers residing in the union against traders residing within the union covered by directive 2013/11/EE on the alternative resolution of consumer disputes and does not apply to various consumers and trades that coincide with contracts selling services with electronic transactions between traders.

#### 5. TAXATION AND ELECTRONIC COMMERCE IN GREECE

Traditionally, the problem of tax differentials between countries to determine the taxation of bilateral trade resolved through certain principles of taxation, such as a permanent installation. The question of who has the right to tax income was always an
important issue among tax authorities, since tax revenues are one of the main sources
of income for governments of all countries. Previously, tackling this problem was
through bilateral agreements between countries, in light of current fiscal conditions. However, the emergence of electronic commerce, to the parallel flourishing of
international trade and the removal of geographic barriers to commercial transactions,
made it impossible for these differences be resolved through such bilateral agreements. The Borkowksi (2002) states that the emergence of these commercial activities over the Internet significantly affect tax revenues in many countries, highlighting
the serious issue of e-commerce taxation. Today, the rapid development of electronic

commerce is a challenge for traditional approaches but tax and regulatory and tax authorities, both at immediate level and in relation to indirect taxation. Unlike traditional trading activities, which easily can be recorded and prove details of the transactions, the amounts involved, the parties and the place where the transaction takes place, the e-commerce the above processes occur in the virtual world of the Internet using E / H networks, where the transaction traces are difficult to identify, as it can occur in unspecified geographical locations. This virtual nature of the Internet makes electronic commerce intangible in many manifestations, vulnerable in terms of ability to pass on tax havens, and some sort of multi-jurisdictional commercial activity (Doembergetal, 2001). Consequently, it can create serious problems in terms of efficiency of the tax authorities. Of course, although the size and the actual impact of Ecommerce tax revenues has not been fully ascertained and varies considerably from country to country, given the diversity of each fiscal framework, the long term effects of the fiscal policy management can be critical and thus require attention and timely diagnosis problem. The Tanzi (1998), several years ago, has pointed out that the ability of tax authorities to respond and adapt to the demands of electronic commerce is one of the biggest threats of the current tax systems. Indeed, many concerns have been expressed regarding the effective taxation of commercial transactions conducted on the Internet. The Mikesell (2001) argues that there are two main risks of the taxation of electronic commerce, first, the risk of inefficiency on the part of tax authorities and, secondly, the mismanagement of the basic principles of ethics and sound tax policy, taking into account the simultaneous loss of significant tax revenue that must be addressed. Moreover, Krupsky (2003) says that the fundamental principles of taxation, such as justice, neutrality and the avoidance of double taxation can easily be compromised or circumvented in e-commerce, which together offer more tax avoidance and evasion opportunities. The Hanefahetal (2003), exploring the implications of electronic commerce in the collection of tax revenue in Malaysia, concluded that the possibility of fraud in this business-activity increases as the physical location of performance of the transactions becomes more vague, something easy a virtual environment, such as that of the Internet. Similarly, Scanlan (2007) finds that worldwide

there are increasing signs that the Internet is being exploited by consumers so they can evade taxes. The Bristol (2011) also shows that companies often try to take advantage of their commercial activity on the Internet, attempting to minimize the payment of VAT, while online transactions generally assist avoid various taxes consumption, such as the Goods and Services Tax in force in New Zealand. Consequently, the commercial activities conducted through the Internet raise serious concerns in regulatory and administrative level, while at the same time create a fertile ground for conflicts and disputes at transnational level concerning the definition of the tax base of transactions and the place where they will They should be taxed. The main difficulty posed by electronic commerce on tax of most countries systems comes from the fact that existing national laws governing income tax shall, at least until recently, as based on the assumption of the physical presence of the parties involved in various commercial and business transactions (Horn, 2003). However, this legal framework is incompatible with the taxation of e-commerce transactions, while physical presence justifies the concept of permanent establishment, as defined for the avoidance of double taxation. However, e-commerce, the need for the physical presence in the country received the goods or services do not exist or at best limited. This issue poses a problem as to determine the right tax profits arising from electronic transactions, causing serious inherent consequences for the full harvest of tax revenue by governments. Recognizing the importance of this problem, most economically developed, industrial and commercial countries, with leaders of the US, UK, France, Germany and Australia, have designed and adopted a series of political interventions in the late 20th century, highlighting the impact of electronic commerce in each tax regime and ensuring ways and means for collecting the tax revenue. Of course, it seems that these policies are divergent approaches, and data of different social, political and ideological characteristics of countries. In conclusion, e-commerce is undoubtedly pose significant tax provisions and rules governing trade have been designed for the traditional trade, where physical presence can easily be identified and documented and thus can not be applied to e-commerce environment. A typical example is the beginning of a permanent establishment, which has been widely used as

a demarcation point of taxation of corporate profits that are active in international trade. Of course, besides this example, there are other important tax matters, such as double taxation, evasion and avoidance. Challenges to the laws and tax systems. Many researchers, professional groups and regulators have pointed out that the existing.

#### **6. CONCLUSION**

E-commerce is a huge boom in recent years as more and more consumers are buying online products and services while increasing electronic and cross-border transactions between businesses. This growth is due to the progress of electronic commerce in the more mature markets, such as those of the US and the EU and the emerging markets of Asia, especially China and India. Meanwhile, further development prospects are extremely favorable, considering the wider world of international trade liberalization regulatory framework and technological progress in the field of electronic transactions and trading. Given, then, the ecommerce importance to the economy, is proportional to the importance of the fiscal framework governing it. Indeed, e-commerce poses significant challenges to the financial authorities of the countries, over its evolution has been observed that large taxable amounts evade the tax authorities, resulting in the phenomenon of tax evasion or avoidance have gotten critical dimensions in several countries world. As a result of these developments, international regulators, notably the OECD and the EU have issued guidelines based on specific tax principles that should govern the taxation of electronic commerce, which form the basis for planning the corresponding tax regimes in all advanced economically and commercially in the world. Considering the above, there are two key issues that deserve special attention in the taxation of electronic commerce, first, the principle of territoriality under which framed the matter of direct taxes, and secondly, the problem of VAT, based on the principle taxation of goods and services at the place where they are consumed. While at the end of the years various proposals have been made about the optimal tax system of e-commerce, such as the imposition of a single bittax, actually in recent years most countries converge on a relatively similar tax framework, based on the guidelines of OECD and the EU. Indeed, recent regulatory developments at EU level which will apply from 2015 on the imposition of VAT on the provision of digital services in the place where they are consumed, is to rationalize further this issue. Similar regulatory developments identified in rest of the world, such as Australia, Canada, Japan and China. In conclusion, the future arrangements regarding the taxation of electronic commerce are faced with two major challenges. On the one hand, it should pay particular attention to the need to preserve basic Internet advantage, namely the freedom to secure the favorable development of electronic commerce conditions, which contribute decisively to economic growth and employment. However, on the other hand, fiscal, financial and regulatory authorities should ensure that e-commerce will not create unfair competition in the market, nor will it make the Internet as a fiscal promiscuity field.

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