# A CRITICAL EXAMINATION OF THE ADVANTAGES AND DISADVANTAGES OF THE INTERNET AUCTIONS AND HOW THEY EXPLAIN THEIR SMALL PENETRATION IN THE GREEK MARKET

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#### **ABSTRACT**

E-Auctions are the web-based auctions where sellers put their commodities/services up for bids during a certain bidding time, after which, the most valued bid wins. The purpose of this paper is twofold: first, to provide a critical examination of the advantages and disadvantages of the e-auctions. Particularly, we point the great facility it offers as regards to their operational hours and the accessibility to everyone. On the other hand, the greatest obstacles are related with the fact that e-auctions face fraudulent activities and the participants are cautious about the offered security. Second, to investigate the degree to which these advantages and disadvantages explain the small penetration in Greece. Specifically, we discuss the present status of the e-auctions in Greece in order to explain the low penetration of the e-auctions in Greece and to propose the necessary actions that should be taken by the Greek e-auctions to be competitive.

Field: E-commerce

#### 1. INTRODUCTION

Each day more and more people use the Internet for their financial transactions. Besides, more and more financial organizations go online to cover customers' needs, one of which is to find something to buy either in a shop or in an auction.

The traditional buying and selling face several restrained factors such as their limited operational hours and the customers' necessity to visit each shop or auction house in order to buy the item he / she wants. On the other hand, e-shops and e-auctions use the Internet to overcome all these restrained factors and enable customers anytime to find and buy anything from everywhere. Particularly, e-auctions provide customers with the opportunity to bid for the item in order to buy it at the price he / she can afford.

The purpose of this paper is twofold: **First**, to provide a critical examination of all the advantages and disadvantages of the e-auctions. According to a report conducted by the US Treasury, e-auctions are helping to cut the public cost and result in savings of around 20 to 25 per cent of the project value through "transparent negotiation" and simpler processes. An analysis of the e-auctions framework: how they work, their global evolution, their advantages and disadvantages are given in the second part of this paper.

**Second**, to investigate the degree to which the advantages and the disadvantages of the e-auctions pertain to its penetration in Greece. For this, we take into consideration a recent paper of ours, where we have critically investigate the advantages and disadvantages of the e-bond auctions and the extend to which they pertain to the issuing of bonds worldwide. Our investigation in the Greek market during the last five years reveals the following: The Internet users have been multiplied in Greece. However, the number of the Greek auction sites is very limited and the number of the items that are up for bids and the number of the Greek participants are also limited. In an effort to find out all the reasons that restrict the growth of the e-auctions in Greece, we thought that is necessary first to discuss the present status of the e-auctions in Greece, second, to point out the reasons that prevent the evolution of the e-auctions in Greece and third, to propose the necessary actions that should be taken by the Greek e-auctions to be competitive. All of these are presented in the third part of this paper.

The last part (fourth) of this paper presents our conclusions about the effects of the e-auctions in our country and points the direction that our future research should take with regard to the issues related to the E-auctions.

## 2. E-AUCTIONS: DEFINITION, THE E-AUCTIONS' OPERATION, GLOBAL EVOLUTION AND THE ADVANTAGES AND DISADVANTAGES OF THE E-AUCTIONS

#### 2.1 General comments, the Definition and the Type of the E-auctions

Auction is defined as the method for determining the value of a commodity in the absence of intermediate market makers or when it has an undetermined price or when there are high fluctuations of demand and/or supply. The whole process contains of buying and selling goods by offering them up for bid, taking bids, and then selling the item to the winning bidder (Wikipedia). Auction examples range from areas of second-hand products to electricity production to portions of the electromagnetic spectrum and to advertising space (Warkentin, 2002).

The information revolution and the rapid pace of the internet technology evolution in our global society induced people to use more and more the Internet for their financial transactions. More specifically, as regards to auctions, Internet has affected both the way goods are offered for bids and the way bids are given. Internet Auctions are defined as web based automated auctions where people submit bids for products or services offered on a website during a certain bidding time, after which the most valued bid wins (Meij, Pau, Heck 2003). They are also known as Online Auctions or E-Auctions.

There are three types of Internet auctions: business-to-person or vendor-operated, business-to-business and person-to-person or direct-sales. Most Internet auction sites are person-to-person auctions, like those of eBay.com, uBid.com and Amazon.com, where individuals or small businesses want to buy or sell items and often go through third-party sites in order to accomplish this goal. Business-to-person auctions usually involve businesses as the sellers and, sometimes, as the buyers. Some vendor-operated auctions go through third-party sites also, but many others use software to create their own online auctions. Business-to-Business auctions involve businesses as both the sellers and the buyers. The person-to-business internet auctions may be formed theoretically but not practically.

In the rest of this paragraph, we will first discuss how exactly the e-auctions operate and then their global evolution. Also, we will list the advantages of the e-auctions and finally we will point out the disadvantages and the difficulties of the auctions.

#### 2.2 The Operation of the Internet Auctions

Internet auctions work similarly to traditional auctions. Particularly, there are sellers who place items up for bids and buyers-bidders and winners and losers, just like in the traditional auctions. At the end of the auction, winners are supposed to pay for what they bid on. However, there are several differences in the way the auctions are carried out.

The auction site acts as the auctioneer that brings together sellers with bidders within the auction process. Besides, trade objects and a rule base are obviously necessary during the transaction phase. The rule base provides the necessary structure for listing, displaying, bidding, and paying for goods and services online. In most cases, the seller has physical possession of the commodity and the auction site will not take responsibility for any problems that may arise between buyers and sellers.

Online auction sites require both buyers and sellers to obtain a user account and password before bidding or placing items for bid. Registration is necessary in order the bidder to be able to track items he bids on, the seller to be able to track items he sells and the auction site to keep up with the bids, to determine the winning bidders and even to build a database on both sellers and bidders behaviour.

Auction sites allow sellers to set a fixed price, at which a buyer can purchase the commodity without competing against other bidders, or they allow buyers to bid on a commodity or they offer a combination of both. In some cases, sellers set a "reserve price", which is the lowest price they will accept for a commodity. Reserve price is different than the "start price" of an eauction, which is the price from which the auction begins and bidders know it, while the reserve price is not revealed.

Moreover, there are auction sites which ask buyers to determine a price and see if sellers will match it. There are other auction sites which even ask buyers to request goods or services they wish to buy. Bidders can find products or services on an auction site by browsing through different categories or by using keywords.

Besides, most Internet auctioneers set a time limit on bidding. When the bidding for each auction closes at the scheduled time, the commodity is sold to the highest bidder, provided that his bidding is at or above the reserve price. Otherwise, the auction closes without a winner bidder. At the end of a successful auction, the seller is responsible for communicating directly, usually by email, with the highest bidder to arrange for payment and delivery.

Most auction sites do not make profit by selling any products or services that they own. Some of them charge seller fees on listing, whether the item or the service is sold or not. Other auction sites receive a (per centage) commission on completed sales.

Even though, credit and debit card, personal and cashier's check, money order, cash on delivery and escrow services are all acceptable forms of payment for most internet auctions, all sellers may not accept all of them. An escrow service acts as an independent third party which protects winner bidders from ending up empty-handed after paying their money. More

specifically, after an internet auction is successfully completed, an escrow service receives the payment from the buyer and assures the seller that he can provide the commodity to the buyer. As soon as the buyer informs the service that he has received the product he had bidden and he is satisfied with it, the escrow service transfers the money to the seller.

#### 2.3 The Global Evolution of E-auctions

The first e-auctions based on Internet news groups appeared in 1993 (Lucking-Reiley, 2000). However, the first Internet auction sites opened in September 1995 when eBay (www.ebay.com) went public. Nowadays, internet auctions are one of the most rapidly growing e-commerce areas.

Thousands of internet auction sites have been developed and their number is highly increased in response to the popularity with consumers. More specifically, according to a research conducted by Jupiter Communications during 1999, the number of USA online auction purchasers was projected to grow from 1.2 million in 1998 to 6.5 million in 2002. In addition, the number of the auction buyers was estimated to reach an 11 per cent of the total internet buyers in 2002. Besides, it was projected that bidders will have spent about \$7.1 billion via internet auctions until the end of 2003.

Another research conducted by Forrester Inc. during 2000 was even more optimistic. Particularly, they predicted that the value of e-auctions will have grown from \$1.4 billion in 1998 to \$19 billion in 2003.

Besides, according to the above survey contacted by the Jupiter Communications, the auction sales in the retail auction sites will have reached \$2.1 billion in 2003. In addition, Jupiter communications estimated that person-to-person auctions dominated the market during 1999. However, they predicted that business-to-consumer sales will have reached 66 per cent of total e-auction sales (\$13 billion) by 2003. As regards to the value of merchandise sold on e-auction sites, they predicted that it will have grown from \$460 million in 1998 to \$3.2 billion in 2002.

According to another survey conducted by E-Commerce Times, the Consumer-to-consumer auction sales reached about \$3 billion during 1999. Besides, they estimated that during 2000 the worth of the daily merchandise that was sold at auction on eBay reached \$12 million.

A newest research conducted by Jupiter Communications during 2003 predicted that the online auction sales would reach \$15.1 billion in 2004.

Moreover, a survey contacted during 2002 by Carrie A. Johnson with Kate Delhagen and Amy Dash, had predicted that e-auctions will boom during 2007. Particularly, until the end of 2007 internet auction sales were projected to reach \$54.3 billion or 25% of US online retail sales.

As regards to eBay, the largest retail auctioneer in the world, Jupiter Communications (1999) estimated that its sales grew 724 per cent in 1998, reaching \$47.4 million. During 2000, it was growing at a rate of 10 per cent each month and it managed to gain a 90 per cent market share. While, E-Commerce Times estimated that during November 2000 it was the tenth-most-visited Internet site. Besides, more than 25,000 new items are added each day and more than three million items have been sold on eBay since its inception.

Moreover, the great evolution of e-auctions is accompanied with the increase of fraud cases. More specifically, the Internet Crime Complaint Center has estimated that Internet auction fraud was the most reported Internet crime during 2004, with 71.2 per cent of all complaints received. However, according to the eBay CEO Meg Whitman, fraud is rare among users of eBay, as less that 1/100th per cent of its 700,000 daily auctions have problems.

#### 2.4 The Advantages of the E-auctions

**First**, e-auctions offer great facility to buyers and sellers in different time zones as regards to their operational hours. Any bidder with Internet access has the possibility to visit an e-auction and place a bid 24 hours a day, 7 days per week, 365 days per year.

**Second**, e-auctions are only a mouse click away. All the potential bidders need is a computer that is connected to the Internet. Besides, as regards to commodities that can be delivered via the internet such as music or videos, e-auctions are ideal to bring together sellers and bidders from all over the world. More specifically, as soon as the e-auction is completed, both the seller can receive his / her money electronically and the winner bidder can get the item he / she has bidden instantly.

**Third**, the e-auction offers sellers a very cheap form of Internet marketing for their products or services. More specifically, sellers, apart from the possibility to get a high price for their commodities, can take advantage of the high traffic volume, that Internet provides, and attract many potential customers.

**Fourth**, less time is needed for e-auctions, as they take place through the internet, without many intermediates. In traditional auctions, potential bidders have to travel to wherever the auction office is. On the other hand, the development of standardized search functions have facilitated potential bidders to go online, search for the item they need and place their bids online (Klein, 1997). Besides, e-auctions provide parallel bidding as opposed to serial bidding that is being followed in traditional auctions. Parallel bidding can decrease even more the necessary time. However, we have to refer that according to our research (August, 2007) and depending on the e-auction site, bids are not always placed instantly. More specifically, in some auction sites bidders have to mail their bids and wait to get informed whether they are the winner bidders.

**Fifth**, another advantage of the e-auctions is the possibility of anonymous bidding. E-auction sites enable a potential bidder to acquire information about items he / she is interested in without having to give up any facts about him. Later, if he / she decides to bid, he / she has just to register, using a login and password. Other bidders will only be able to know his / her login and not any other personal information.

**Sixth**, an important advantage for the start-up e-auctioneers is the lower market entry barriers. In traditional auctions, enormous investments are needed to build up a distribution network, allowing established auctioneers to be well protected against new competitors. On the other hand, the Internet provides new companies with instant access to the auction markets at an affordable cost, freeing newly established auctioneers from any legacy burdens and increasing competition.

**Seventh,** e-auctions are very important for the selling of perishable items, whose value at a given point in time will be zero. A characteristic example of a perishable commodity is an

airplane ticket. Each flight has a fixed cost and each sold ticket will generate revenue to cover this cost. However, as soon as the airplane leaves the airport, the unsold tickets will make zero in revenue. On the other hand, unsold tickets could be sold at an auction site to a price which more than covers the marginal cost of the ticket and the cost of the auction function (Wrigley, 1997).

**Eighth**, the common infrastructure and the informal exchanges and feedback between the potential bidders and sellers make them feel more comfortable with each other and actuated the creation of a community between them. More specifically, many auction sites enable members to make remarks upon items that are placed up for bids and buyers and sellers leave a positive or negative feedback for each other. This form of communication between the members of the auction site protects other buyers and sellers to avoid any fraudulent activities.

#### 2.5 The Disadvantages and the Difficulties of the E-auctions

**First**, the security and privacy of the on-line transactions are the most difficult impediments for the evolution of the main e-finance platforms, e-banking, e-stock exchange and e-bonds correspondingly, as we have concluded in three of our papers (Anargiridou, Papadopoulos, 2004-2005). E-auctions face the same problems as the above e-finance platforms. Particularly, bidders are cautious about on-line payments, which are used heavily in e-auctions, and there are doubts about their willingness to bid on line.

**Second**, e-auctions face several fraudulent activities. There are cases that sellers failed to send the goods they offered or they delivered something far less valuable than the one they offered. In addition, there are cases that sellers did not turn over commodities in time or they could not manage to disclose all relevant information about a commodity. According to the Federal Trade Commission (FTC), Internet auctions have now become the fastest growing category of Internet crime. The number of Internet auction fraud complaints received by the FTC has nearly doubled, rising from 51,000 in 2002 to 98,000 reported cases in 2004.

A common fraudulent practice, which is known as "bid siphoning" involves a third party who emails bidders in a currently open auction, offering the same or identical items at a price below the current bid, thus luring bidders off legitimate seller's auction sites. They intend to trick consumers into sending money without delivering the item.

A second fraudulent practice is known as "second chance offers" when a third party pretends to offer losing bidders of a closed auction a second chance to purchase the item that they lost in the auction, while the real reason is to take bidders' money. The second chance offer can take place when the winning bidder fails to buy the item, or when the auction ends without the reserve price being met and the seller choose to offer the item to a non-winning bidder.

Another fraudulent activity is known as "shill bidding," when fraudulent sellers or their partners bid on sellers' items to artificially increase an item's price.

In addition, "bid shielding" involves bidders who submit very high bids to discourage others from competing for the same item. Just afterwards, they retract their bids so that people they know can get the item at a lower price (Federal Trade Commission, 2006).

**Third**, even though e-auctions have reduced the costs of the bidders, sellers may find them costly to run. The costs can outweigh the savings in case the current seller is already

competitive. Precisely, technology is a great difficulty for the evolution of the e-auctions. Specifically, standards for secure payments (e.g. SSL and SET) are necessary to encourage sellers and bidders to use e-auctions. The cost of establishing secure e-auction sites has deterred financially unsound operators from establishing a significant web presence (UNCTAD, 2002).

**Fourth**, in case an escrow service is used, it will provide security but it can delay the bidding and the delivery of items. Besides, the escrow service must be checked thoroughly before signing on to the service. More specifically, we could refer to a case where a criminal pretended a seller of a Porsche in an eBay auction. The reserve price was not met and this auction ended without a sale. However, eBay uses "Second Chance Offer" feature, which allows sellers to sell an item to the next highest bidder. So, the fraudulent seller contacted the bidder, telling him he was the next highest bidder and he had to send the money into an escrow service called Escrowoncall.net in order to receive the car. The bidder sent the money and after many delays he has found out that the escrow service had been created by the fraudulent seller (Steiner, Steiner, 2002).

**Fifth**, another obstacle for the evolution of the e-auctions is the likely conflict between the online channel and the existing traditional channels, which presents new challenges and concerns for any e-commerce initiative. However, it should not prevent auctioneers from organizing auctions online. The sellers and the bidders, after the evolution of the e-auctions, could have the option either to use the traditional auctions if they are close to them or they can use the e-auctions if they are at home or at work and have access to the Internet.

### 3. HOW THE ADVANTAGES AND DISADVANTAGES OF E-AUCTIONS PERTAIN TO THEIR PENETRATION IN GREECE

#### 3.1 General Comments

Even though e-auctions offer many advantages, their growth in Greece is still very limited. As we have found out the number of e-auctions in Greece is considerably small. Besides, according to our research, there are only fifteen Greek auction sites, and people are cautious to use them because they do not provide the necessary security measures.

To understand how the advantages and disadvantages of the e-auctions pertain to their evolution in the Greek economy, we should devote the paragraph 3.2. in a description of all the Greek auction sites, the categories of the auctions they conduct, the services they offer, their bidding characteristics (including the number of the current open auctions), and the level of security they provide. This will permit us to point out the reasons that prevent the development of the e-auctions in Greece (3.3.). Finally, we discuss the steps that the Greek auction sites should take to become competitive (3.4.).

#### 3.2 The Present Status of E-auctions in Greece

Our research reveals that there are only 15 auction sites in Greece. The first Greek auction site (http://www.coubertin.com/) was developed in 1999 and other three Greek auction sites were developed in 2000. However, during the next five years, only four new Greek auction sites were developed. The situation changed during the last couple of years (2006-2007), when the number of the Greek auction sites was almost doubled.

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		Greek	Auction	Sites p	y Categ	ories o	f the iter	Greek Auction Sites by Categories of the items that are up for bids	up for	bids				
Auction site	Yehicle	Flower	Real	Book	Ser-	PCs	Food &	Antiques Jewell-	Iewell-	House	Ani-B	us. & E	Ani-Bus. & Entertai-	Coll-
			Estate		vices		Drinks		ery	Equip-	mals	Ind.	nment	ecti-
										ment	Α	Assets		bles
http://www.124sold.gr/	Y	Z	Y	Y	Y	Y	Z	Y	Υ	Y	Z	Y	Y	Y
http://www.b2brealestate.gr/	Z	Z	Y	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z
http://www.emarket.gr/	Y	Z	Y	Y	Y	Y	Y	Z	Z	Y	Y	Y	Y	Y
http://www.mercury-auctions.gr/	Z	Z	Z	ċ	Z	Z	Z	Y	Z	Z	Z	Z	Z	Y
http://auction.pin.gr/	Y	Z	Z	Y	Z	Y	Z	Z	Y	Y	Z	Z	Y	Y
http://www.usurum.gr/	Z	Z	Y	Y	٠	Y	?	¥	Y	Y	Z	Z	Y	Y
http://www.auctions-free.com/	ċ	ċ	Z	ċ	ċ	Y	ċ	Z	Z	ċ	ċ	Z	Y	ċ
http://www.karamitsos.com/	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Y
http://www.coubertin.com/	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Υ
http://www.dhmoprasies.gr/	Y	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z
http://www.freesell.gr/	Y	Z	Z	ċ	Z	ċ	Z	Z	Z	Υ	Z	Z	Z	ċ
http://www.skroutz.gr/auctions/al	11 Y	Z	Z	ç.	Z	Y	Z	Z	Z	Z	Z	Z	Y	Z
http://www.ibid.gr/	Y	Z	Y	Y	Z	Y	Z	Y	Y	Y	Υ	Z	Y	Υ
http://www.sillektiki.com/	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Y
http://kinitopazaro.gr/	Z	Z	Z	Z	Z	Y	Z	Z	Z	Z	Z	Z	Z	Z
Total Per Centages	47	0	33	33	13	53	7	27	27	40	13	13	47	09

Besides, we have found out that the collectibles category (stamps, coins...) is the one that exists in most of the Greek auction sites. In addition, PCs (computers, telephones...) are up for bids in eight Greek auction sites and 47 per cent of the Greek auction sites include the entertainment category and another 47 per cent of them include the vehicles category (cars, motos, boats). While, www.124sold.gr and www.emarket.gr are the two auction sites which provide most of the existent categories. The previous table (Table 1) presents which of the 15 categories of the commodities are up for bids in each one of the 15 Greek auction sites. The "?" is used for the existent categories which currently have no items up for bids.

Moreover, we have found out that almost all the Greek auction sites categorise the items that are up for bids. In addition, 83 per cent of the Greek auction sites provide bidders with the possibility to contact with them for any question. Besides, 75 per cent of the Greek auction sites offer search engines for buyers to use in digging up items of interest. While, another 75 per cent of the Greek auction sites provide details about each item that is up for bids. Very few auction sites propose bidders which items to bid. As regards to the language that is used, we could refer that half of them use only Greek, three of them English, two of them both, and http://www.124sold.gr use Greek, English, Italian and German. Finally, 8 auction sites inform bidders about the bid history of each auction. The following table (TABLE 2) presents the 15 Greek auction sites by the e-services they offer.

Table 2
Greek Auction Sites by Services Offered

Auction site	History	Categorise	Search	Inform	Propose	Contact	Language
http://www.124sold.gr/	Yes	Yes	Yes	Yes	Yes	Yes	EN, GR, IT, DE
http://www.b2brealestate.gr/	No	No	No	Yes	No	Yes	GR
http://www.emarket.gr/	Yes	Yes	Yes	Yes	Yes	Yes	EN, GR
http://www.mercury-auctions.gr/	No	Yes	No	No	No	Yes	EN
http://auction.pin.gr/	Yes	Yes	Yes	No	No	No	GR
http://www.usurum.gr/	Yes	Yes	Yes	Yes	No	Yes	GR
http://www.auctions-free.com/	Yes	Yes	Yes	No	No	Yes	GR
http://www.karamitsos.com/	No	Yes	No	Yes	No	Yes	EN
http://www.coubertin.com/	Yes	Yes	Yes	Yes	No	Yes	E
http://www.dhmoprasies.gr/	No	Yes	Yes	Yes	No	Yes	GR
http://www.freesell.gr/	Yes	Yes	Yes	Yes	No	Yes	EN, GR
http://www.skroutz.gr/auctions/all	Yes	Yes	Yes	Yes	No	No	GR
http://www.ibid.gr/	Yes	Yes	Yes	No	Yes	Yes	EN, GR
http://www.sillektiki.com/	Yes	Yes	No	Yes	No	Yes	GR
http://kinitopazaro.gr/	Yes	Yes	Yes	No	Yes	Yes	GR
Total Percentages	73%	93%	73%	67%	27%	87%	

We have studied the bidding characteristics of the 15 Greek auction sites. Almost all the Greek auction sites have a time limit. In addition, 53 per cent of the Greek auction sites provide bidding on "instant buy" items, which are always offered at a fixed price and the purchase is instant. Almost half of the Greek e-auctions are auctions to buy and sell, while the others are auctions to sell. While, very few Greek auction sites enable buyers to give their offer for the items that are up for bidding. Moreover, the 33 per cent of the Greek e-auctions are Reserve Price Auctions. As regards to the number of the currently open auctions of each site we have

found out that there were three sites without an open auction. Besides, the total number of auctions on 21/8/2007 was 200524, more than half of them are hosted by the http://www.emarket.gr/. In addition, the 73% of the Greek auction sites inform us about their auctions that have been closed successfully and the 47% of them inform us about their auctions that have been closed unsuccessfully. Finally, regarding the cost of the e-auctions we have found out that there is a variety of charge policies. More specifically, three of the Greek e-auctions are free of charge, three of them charge the seller a certain per centage of the price of the items he has up for bids, two of them charge the seller according to the number of items he has up for bids, three of them charge the buyer a certain per centage of the price of the item he has bidden and the other four do not inform us about their charge policy. The following table (Table 3) presents the 15 Greek auction sites by their bidding characteristics.

Table 3
Greek Auction Sites by Bidding Characteristics

Auction site	Inst Buy	Buy/ Sell	Reserve Price	Time Limit	Buyer Offer	Open	Succeed	Un- succeed	Cost
http://www.124sold.gr/	Yes	Yes	No	Yes	No	33801	Yes	?	No
http://www.b2brealestate.gr/	No	Sell	No	Yes	No	0	?	?	?
http://www.emarket.gr/	Yes	Yes	Yes	Yes	Yes	136879	Yes	Yes	Sel %
http://www.mercury-auctions.gr/	No	Sell	No	No	No	1127	Yes	?	17%
http://auction.pin.gr/	No	Sell	Yes	Yes	No	0	Yes	Yes	?
http://www.usurum.gr/	Yes	Sell	Yes	Yes	No	145	?	?	Sel IT
http://www.auctions-free.com/	Yes	Yes	No	Yes	No	4	Yes	?	Sel IT
http://www.karamitsos.com/	No	Sell	No	Yes	No	4150	Yes	Yes	18%
http://www.coubertin.com/	No	Sell	No	Yes	No	1629	?	Yes	Sel%
http://www.dhmoprasies.gr/	No	Yes	No	No	No	85	Yes	?	2%
http://www.freesell.gr/	Yes	Yes	Yes	Yes	Yes	5	?	?	No
http://www.skroutz.gr/auctions/all	Yes	Sell	Yes	Yes	No	314	Yes	?	?
http://www.ibid.gr/	Yes	Yes	No	Yes	Yes	21659	Yes	Yes	Sel%
http://www.sillektiki.com/	No	Sell	No	Yes	No	0	Yes	Yes	?
http://www.kinitopazaro.gr/	Yes	Yes	No	Yes	No	726	Yes	Yes	No
Total Percentages	53%	47%	33%	87%	20%		73%	47%	
Total Open Auction Sites in Greece	(21/8/2	(007)				200524	On	Average	13368,27

In addition, we have found out that the 20 per cent of the Greek auction sites are plain html pages, which as we know do not disable anybody from reading the source code and do not provide security. While, almost half of the Greek auction sites are php pages, two are asp pages and the other two use correspondingly javascript and cold fusion markup languages which provide security to some degree. Besides, 33 per cent of the Greek auction sites ensure privacy protection and confidentiality. Moreover, all of the Greek auction sites ask their visitors to enter a user code / password combination in order to bid. Finally, we have found out only http://www.auctions-free.com/ uses Digicert security technology. Digicert is one of the leading secure sockets layer (SSL) Certificate Authority enabling secure e-commerce and communications for Websites, intranets, and extranets. The following table (TABLE 4) presents the 15 auction sites by level of security they offer.

As regards to Business-to-Business e-auctions in Greece, cosmoONE, which is a joint venture between OTE (Hellenic Telecommunications Organisation) and other companies, was developed during 2000 to provide services for B2B e-commerce. More specifically, it is the first and the larger organisation that hosts Business-to-Business e-auctions in Greece. According to CosmoONE, there were 91 Business-to-Business e-auctions in Greece during 2002, increased 166% compared with 2001. The number of participants was 501 and the total value of the Business-to-Business e-auctions in Greece during 2002 was 38.130.905.

Table 4
Greek Auction Sites by Level of Security

					•			
Auction site	Html	Php	JS	Asp	CFM	Privacy	Code	Digicert
http://www.124sold.gr/	No	Yes	No	No	No	Yes	Yes	No
http://www.b2brealestate.gr/	Yes	No	No	No	No	Yes	Yes	No
http://www.emarket.gr/	No	No	No	No	Yes	Yes	Yes	No
http://www.mercury-auctions.gr/	Yes	No	No	No	No	No	Yes	No
http://auction.pin.gr/	No	Yes	No	No	No	No	Yes	No
http://www.usurum.gr/	No	Yes	No	No	No	No	Yes	No
http://www.auctions-free.com/	No	Yes	No	No	No	No	Yes	Yes
http://www.karamitsos.com/	No	No	No	Yes	No	No	Yes	No
http://www.coubertin.com/	Yes	No	No	No	No	Yes	Yes	No
http://www.dhmoprasies.gr/	No	Yes	No	No	No	No	Yes	No
http://www.freesell.gr/	No	Yes	No	No	No	No	Yes	No
http://www.skroutz.gr/auctions/all	No	No	Yes	No	No	Yes	Yes	No
http://www.ibid.gr/	No	No	No	Yes	No	No	Yes	No
http://www.sillektiki.com/	No	Yes	No	No	No	No	Yes	No
http://kinitopazaro.gr/	No	Yes	No	No	No	No	Yes	No
Total Percentages	20%	53%	7%	13%	7%	33%	100%	7%

#### 3.3 The Reasons that Prevent the Evolution of the E-auctions in Greece

The Internet users in Greece during the last years have been multiplied. Internet World Stats has estimated that their number reach 3,8 millions (representing 33.5% of the population) during June 2007. However, our investigation shows that Greek people are not familiar with the knowledge of the technique and the possibilities of the E-auctions. According to our research, we conclude that in our country the E-auctions are not used a lot.

As we have seen above, the number of the Greek e-auction sites is very limited. Besides, most of them offer commodities of very few categories. In addition, most of them host a very limited number of e-auctions and bidders can not easily find the commodity which appeals to them.

Most of the Greek e-auction sites have been developed very recently and they are not completely functional. Moreover, they have not been advertised quite well. A large number of the Greek Internet users do not know that there are any Greek e-auction sites.

According to our research, the starting prices of most of the items that are up for bids in Greek e-auctions are very high. Bidders are not willing to take part. A large number of Greek e-auctions close without any bid. This situation gets even worst as many Greek e-auction sites charge the sellers even if they did not manage to sell their commodities, making them avoid putting something new up for bids.

Another important reason is that, as we have seen above, the Greek auction sites are not well protected against fraudulent activities. Besides, there are no escrow services in Greece. Greek bidders are all alone, so they are very afraid to take part.

As regards to business-to-consumers e-auctions, most of the Greek businesses have not yet understand the lower marketing costs that the e-auctions can offer them. More specifically, they have not found out that when a company puts something up for bids, it achieves to advertise the particular commodity and the whole company in general at a low cost.

#### 3.4 The Necessary Auctions Needed to be Taken by the Greek E-auctions to be Competitive

The Greek e-auction sites, to increase their market position and become competitive to all other e-auctions in the world, should realize that a better coverage of sellers' and bidders' requirements is necessary. This can be done by the decrease of the charges and the focusing in providing higher services than the traditional ones.

The effective pursuit and management of strategic alliances is another possibility for the future success of the Greek e-auctions. Specifically, the Greek e-auctions should cooperate with other e-auction sites in the entire world. These co-operations could provide Greek e-auction sites with the experience they do not have. It is very important the Greek e-auctions to take into consideration any fraudulent activities that happened in other e-auction sites and to adapt their system to provide as much security as possible.

The Greek e-auctions, in order to attract new bidders and sellers, should try to increase advertising themselves in other sites. On the other hand the Greek e-auction sites could gain money if they host advertises.

As the e-commerce is a reality in Greece and it is fast developing, the traditional auction houses need to determine new policies in order to exploit the possibilities that the internet offers and to gain an important web presence. Chief Executive Officers (CEOs) of the traditional auction houses should be the first to get informed about the e-business tendency and its possibilities and adopt an e-business strategy for the quick and successful implementation of the e-auctions in Greece.

Finally, the traditional action houses should seek to utilize a strategy of outsourcing to computer specialists who complement and supplement in their internal capabilities. This is a realistic situation in Greece since there are already some new Greek companies which focus on facilitating the auction houses to gain a web presence.

#### 4. CONCLUSION AND SUGGESTIONS FOR FURTHER RESEARCH

The evolution of e-auctions has just started. The number of the e-auctions participants will be continually increasing, as new auction sites will be developed and the existing ones will offer a larger number of different items and will get known (Jupiter Research, 2002). However, this evolution is accompanied with an increase of fraudulent activities. As we have seen, Internet auction fraud is the most prevalent fraud committed over the Internet.

Our investigation of the Greek financial system allows us to point out that even though there are many Internet users in Greece, there are not many e-auctions in Greece and those ones are not used a lot. The most important reason for this is the fact that there are no escrow services in Greece and that the Greek auction sites do not provide all the necessary security measures.

Some Greek traditional auction houses have already gained a web presence, but not an important one. The Greek auction sites which have more customers are those which did not started as traditional auction houses. The Internet changes the rules, as it allows newer players to quickly gain market position and become serious competitive threats.

The adoption of a legal framework for e-auctions is a necessary, but not a sufficient step for the evolution of e-auctions in Greece. The main responsibility of the Greek e-auctions, according to our view, is to make their sites as safe as possible. Their next responsibility is to communicate the fact that sellers and bidders are a community and have a responsibility as well to keep the security of the auction sites. Finally, they should try to reduce charges and to advertise their sites in order to attract more customers.

As regards to the traditional Greek auctioneers they should also try to use the web technology in order to gain a larger audience. The Greek traditional auction houses, that will avoid technology, will soon find out that they could not compete with Greek and foreigner e-auctions. How the Greek traditional auctioneers could use the technology to provide their services via the Internet will be the subject of our next paper.

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