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International Taxation of E-Commerce: Persistent Problems and Possible Developments

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Abstract

Taxation of e-commerce is a major concern for international agencies and tax authorities worldwide. Taxation itself is a complex and controversial issue. Hence, it should not come as a surprise that there are so many arguments regarding taxation of e-commerce. The objective of the paper is to find out whether it is possible to tax e-commerce should it be desirable to do so.

Keywords: e-commerce, International taxation of e-commerce

1. Introduction

The relationships between taxation and technological developments have always been interactive, dynamic and complex. The current debate over taxation of e-commerce has, to some extent, been little more than a rehash of a similarly inconclusive scholarly and legislative debate that raged over mail-order sales during the 1980s. However, in the case of e-commerce, the added question is how to reconcile national fiscal boundaries with the borderless world of the internet.

A government's authority to tax had always been based on territory and jurisdiction. These systems now face a serious challenge from development of e-commerce. The trade in goods and services over the Internet has fundamentally altered the accepted boundaries and conventions. Some of the concepts underlying the principles of international consensus on taxation were always flawed, but those flaws have become much more apparent with the advent of e-commerce. E-commerce makes the concepts of permanent establishment (to determine location of manufacture), point of sale (for the application of relevant tax rates), income classification (based on source of income), product classification (for preferred tax rates), etc. difficult to apply. Within the borderless world of the internet¹, ecommerce effectively obliterates any footprints leading to the buyers and sellers' locations. Governments are already losing millions in tax revenue through the penetration of e-commerce within their jurisdictions, and their tax authorities are finding it increasingly difficult to stem this haemorrhage.

¹ The Internet is essentially a "network of networks" where a common communications protocol (TCP/IP) permits information to be broken down into packets and exchanged among computers connected to the network. See *ACLU v. Reno*, 929 F. Supp. 824, 830

The definition of "tax" is far from straight forward, even if conventional taxes are considered. However, in many countries, in addition to legally imposed taxes, there are also arbitrary and irregular tax-like levies imposed by the authorities. These are part of a larger phenomenon of the necessity to make extra payments when interacting with government officials in many countries, particularly at the local level and at lower levels of bureaucracy. These also form a part of the burden of taxation and have socio-economic consequences. In most countries, conventionally defined legal taxes and levies constitute a significant proportion of GDP, and finance major parts of government expenditure. It is therefore essential that these systems be designed to achieve the appropriate tradeoffs among revenue generation, allocation efficiency, equity, and administration and compliance costs.

Taxation is not simply a matter of efficient economic management and functional governance, but serves to define, enable and constrain the historical meaning of the state and the possibility of society (Cameron, 2006). However, emergence of international and possibly global dimensions of taxation is a far more recent phenomenon. "As this implies, the institutional practices of taxation have been subject to continuous if not constant renegotiation throughout their history in response to the changing forms and functions of the societies they help to constitute" (Ibid). Much argument about the internet proceeds as if the problem were new, and thousands of years of political and legal thought simply irrelevant in light of the internet's uniqueness. Some commentators have argued that this notion is manifestly false: many of the questions that apply to the Internet today arose in similar form during the popularization of other technologies, such as modern shipping, aviation, telecommunications (to name only a few). The answers that human societies forged to those questions then can help us answer analogous questions today. Yet recognizing that the Internet lays on a historical continuum of transformative technologies leads us to ask two interrelated questions that merit attention before delving into others: What characteristics mark the Internet as a novel and genuinely disruptive technology? What about the Internet poses new challenges?

It is difficult to provide a comprehensive answer in this short article, however in response to the second; taxation is definitely one such area where internet and e-commerce have raised concerns. Five or ten years ago, it was fashionable in academic circles to make dire predictions about what Internet would do to the nation state. Nothing less than the very survival of the state seemed to be in question (Goldsmith & Wu, 2006). Today, probably in embarrassment at this former misjudgement, it is fashionable to doubt that cross-border e-commerce is of any consequence to the state's main source of revenue, taxation. The truth, of course, lies somewhere, between these two extreme thoughts. The internet is neither fatal nor irrelevant for the nation state; it is one important factor in its continuous transformation.

The basic question is how e-commerce interacts with traditional principles of taxation. While some authors debate that e-commerce has not transformed the fundamentals of taxation, others argue that there is a need for dramatic change (Westberg, 2002, p.53). Those opposing taxation assert that introduction of an e-commerce tax would do irreparable harm to the growth of the e-commerce, as consumers will return to main-street shops. However, this perception is not accepted without argument. Those who favour taxation of e-commerce cite concerns of lower government revenues due to increasing e-commerce sales, the resulting decrease in public good provision, and issues regarding equity. The concern is for potential revenue loss and the uncertainties created for tax authorities. A provocative and interesting thought is submitted by Krever, who states that "a more sober study will reveal that in many respects much of the hyperbole about e-commerce and tax is just that and in the overall scheme of things the impact of e-commerce on tax system may be limited" (2000, p.151). Li (2003) has also commented that there is nothing absolutely new under that sun. Governments and tax authorities continue to struggle with the same old problems, such as determining, what is the appropriate nexus that permits the exertion of tax jurisdiction over cross-border sales. However, Li (Ibid) maintains that the current international tax regime does not properly address the many vexing challenges faced by tax authorities and multinational firms today. These challenges include increasing regional and global trade and capital market integration, and the movement toward more service-oriented economic activities for many countries. Cockfield (2004a) categorized this broader discourse among tax commentators as 'Doubting Thomases', 'Purists', and 'Pragmatists'.

Concerns have been expressed that e-commerce could result in the erosion of tax bases. Consumption taxes are levied on the principle of taxation at the place of consumption and according to rates set in individual countries, or in individual states in the case of federal nations. Ecommerce, however, has the potential to undermine the application of domestic and national tax rules. Tax planning for an e-business differs from tax planning for a traditional bricks-and-mortar company. Historically, the generation of income depended on the physical presence of assets and activities. This physical presence, or permanent establishment, generally determined by which jurisdiction had the primary right to tax the income generated. Because of the growth of electronic commerce, new e-business models (including marketplaces, online catalogues, virtual communities, subscription based information services, online auctions, and portals) have emerged. Each allows taxpayers to conduct business and generate income in a country with little or no physical presence in that country. The separation of assets and activities from the source of the income represents a significant departure from historic business models. This change creates new tax planning challenges and opportunities.

There are several issues relevant to the current e-commerce tax debate in relation to direct and indirect taxation. The main concern is how to enforce taxes in the digital environment and how to apply the traditional concepts of taxation to new environment. There are three kinds of problem: enforcement problems; application problems; principal problems.

The enforcement problems are obvious. These are the problems that have been most thoroughly analysed. They are also the problems most urgently needing to be solved. The application problems have also been recognised. and received their due share of attention. The principal problems, those concerning the fundamental principles and assumptions of tax law, have not been thoroughly analysed. In fact they are not recognised as problems. It is believed that these problems are more alarming than the problems of enforcement and the problems of application, but they tend to be overshadowed by these more easily grasped problems. This conservative approach may be justified from the point of view that one should not jump to conclusions. In the long run, however, it will not be tenable. The strain on traditional tax concepts will eventually result in the breakdown of the tax system. If we do not address the fundamental questions, but wait and see, we may wake up one day and find that the tax system has been so alienated from the economic and technological reality, that applying the rules is not just hard but downright impossible. The tax system will lose its legitimacy, which will benefit nobody. Such a breakdown could be avoided if the problems are recognised as problems and included in discussions among legislators.

The concern of new businesses is understandably with markets, growth and profit and not with paying taxes. Any solutions therefore will need to balance the need to maintain the revenue yield without placing unrealistic compliance burdens on these new businesses. It is therefore immediately evident that it is crucial for the online entrepreneur to be aware of and fully understand all the implications of such means of taxation. In the light of this, legislators are increasingly concerned about their responsibility to bring forward, as quickly as possible, solutions to solve the problems introduced by e-commerce. Without workable rules, there will be a stronger incentive, particularly for smaller businesses, simply to ignore indirect tax requirements.²

Obviously if a country wants a competitive taxation regime and a decent level of social services then it needs a taxation base to sustain it. To stay competitive the weight must be kept off direct tax - income tax and company tax - and the indirect tax base must carry the burden of funding

² It is already the case that no consumption tax can be enforced and collected 100 percent or anything like it - the variable is always the relative size and competitive distortion caused by choosing to trade in the black economy. See, Jenkins, P (2000) 'The Application of VAT to E-Commerce', Ernst and Young

social services.³ A narrow base indirect tax cannot do it. To re-weight the tax system out of indirect tax and, by definition, into direct tax is a reverse direction. With the competitive challenges we face we cannot afford errors. Narrowing our indirect tax base, and its consequence of higher direct taxes, could do us great damage.⁴ The changes in technology and communication have brought means that bad-decision making is more evident and reaction to it faster and more severe.⁵ The advantage is greater than ever. The benefits can be greater than before but the margins for error are much smaller.

While examining the impact of e-commerce on taxation, there is always the danger of jumping into a conclusion without adequately understanding the nature of the problem raised by rules that evolved before the dawn of internet or e-commerce. E-commerce is a classic case of economic and technological change which forces us to consider how overlapping sources of national and trans-national law can be shaped to cope with the challenge of rapid and unpredictable market developments. Taxation of ecommerce, then, is fascinating in its own right from the global perspective but, on a broader scale, it offers an intriguing case of limitations and possibilities for moulding an effective tax administrative regime involving national and trans-national, public and private, which is designed to regulate but not to damage the growth of e-commerce. If the Internet and e-commerce are threatening a crisis for global tax administration because of the dangers they create for existing tax regimes, they have created opportunities as well. Some of the long-standing problems in taxing crossborder income flows will require new forms of international fiscal cooperation and an inevitable reduction in national fiscal sovereignty. Internally, the concept of individual privacy may be severely tested as governments struggle to maintain their revenues in the face of new pressures to expand the underground economy, with its concomitant tax evasion. When it comes to the implications of e-commerce for taxation, we may perhaps be at the end of the beginning, but we are still a long way from the end. An interesting irony of e-commerce, in fact, is that both consumption and income taxation seem to be equally threatened (Bird, 2003).

2. Is E-Commerce Taxable?

³ The Hon Peter Costello MP Treasurer to The Sydney Institute, Commonwealth of Australia 'Challenges and Benefits of Globalisation', Wednesday, 25 July 2001, The Commonwealth Treasurer - Speeches - Challenges And Benefits of Globalisation (25-07-2001)

⁴ Ibid

⁵ Id

In order to find out whether it is possible to tax e-commerce, we should consider the problems that arise because of e-commerce for taxation. This section, deals with the problems; it will consider the issues of classification and jurisdiction. However as I have explained before there could be many challenges for enforcement of transactions related to e-commerce. These are anonymity of identity and location of parties, anonymity transactions and accounts, disintermediation, transfer pricing issues, online delivery and digital cash, easy access to tax havens and low tax jurisdictions. identification oftaxing jurisdiction, new opportunities, recovery of tax, and exchange of information. The general opinion seems to be that existing tax rules are applicable and should be applied in a digital environment. The problems caused by new forms of communication are not seen as new problems, only as bigger ones.

2.1 Issue of Classification

The problem of classifying digital products has been a subject of attention for several decades, and has become more important with the arrival of ecommerce. In taxation, it is often necessary to classify a transaction or the object of a transaction. Transactions are classified, for example, as income from employment or from royalties, and the objects of the transactions are classified, e.g. as products or services. I will focus here on the classification of products and services. Traditionally, distribution of information has depended on the distribution of the media. When the information has been fixed, e.g. on a CD, the information has been distributed in fixed form. These transactions have traditionally been taxed as transactions in goods, without regard to the fact that the actual object of the transaction is the information contained in the physical product. In these cases, the information product is an object that exists and can be observed in the physical world.

The classification problems connected to e-commerce are primarily related to the principle of neutrality. An information product, e.g. a music album, can be delivered either physically, in the form of a record, or digitally. According to current tax law, the same information product will be taxed differently depending on how it is delivered. It is hard to find a way to classify information deliveries within the framework of current tax law, which at the same time satisfies fundamental taxation principles and considers the characteristics of information. Classification problems occurred in the traditional physical environment. As long as information was distributed mainly in physical form, these problems were of little importance. As production and distribution move out into the networks, the problems grow more pressing.

In the end, the problem of neutrality may seriously endanger the legitimacy of the tax system. The dominant view among the tax subjects is or will be that the two forms of delivery are just that: different forms of delivery of the same product. The law, which treats them as different

products, will then seem out of touch with the real world. These problems may to some extent be problems of terminology. However, underlying them there are more fundamental assumptions related to tax law. These assumptions are deeply rooted in the history of tax law and its connection to trade in goods. The discussion regarding classification can contribute to the discussion of information taxation mainly by highlighting the fact that products in networks are neither good nor services in a traditional sense. Information simply does not fit into tax law, because tax law is rooted in the production and distribution of physical products, and not services, still less information. This is even more evident from the discussion of localisation problems.

2.2 Issue of Jurisdiction

The key issue that the Internet poses for tax policy is not so much its potential to create a world without borders but rather to create a world of only borders – a world in which everyone is as responsive to local taxation as people who live on geographic borders (Goolsbee, 2000). In legal terminology, 'jurisdiction' describes the legal authority of the state. The scope of that authority is manifest either in terms of a "prescriptive jurisdiction, the power to legislate or otherwise prescribe legal rules; or enforcement jurisdiction, the power to apply such rules through judicial or executive action" (Ott, 1987, p.137 cited in Gordon, 2001). The state exerts its legal sovereignty over physical and conceptual spaces. The application of state law requires that a territorial connection can be made between the legal question and this physical or conceptual state place. That connection is an imperative of international law, and is necessary to distinguish the applicability of one state's laws from another's. Even when expressed in terms of "prescription" and "enforcement", the concept of jurisdiction evokes certain geography, one that articulates the scope of state sovereignty in territorial terms (Gordon, 2001). There are two aspects that disconnect between geographic jurisdiction and Internet (Kobrin, 2001). First, enforcement of law or regulation based on territorial jurisdiction may become problematic in the e-commerce environment. As Dryden (2000) notes, internet is not a lawless frontier; the issue is not the absence of law and regulation, but rather problems of enforcement through territorial jurisdiction. Second, and perhaps more important, there are serious questions about whether territorial jurisdiction provides a legitimate conceptual basis for the governance of internet (Kobrin, op. cit.).

Difficult jurisdictional issues arise when the world's principal tax systems begin to collide with the emerging world of global e-commerce. Several taxation concepts relate to the physical or geographical location of a person, a company, or a transaction. This is because taxes are national. Tax jurisdictions are very much dependent on the territorial nexus

principle and the status of a tax payer. It is therefore always necessary to attribute a transaction to a certain geographic location. The aim is always that the creation of value should be taxed where the value is actually created. The connection can be formal, e.g. connected to where an organisation is registered. It can also be based on where a transaction is regarded as taking place. Whether or not the physical location of an Internet user can be determined with any degree of accuracy is still controversial. An IP address is a network organizational construct only loosely related to a geographical location. The question is whether and how geography can be inferred from the available data (Kobrin, op. cit). Kobrin (2001) argues that the idea of territorial jurisdiction is compromised if it is not possible to describe a transaction in cyberspace vectorially, in terms of two-dimensional geographic coordinates. Given the lack of clarity about the meaning of a virtual presence, there may well be circumstances when it is difficult, if not impossible, to locate a transaction geographically. If the parties to a transaction cannot be located geographically with any degree of certainty and if regulatory authorities are unaware of the transaction, enforcement becomes difficult.

Conceptually, there are two distinct issues. The first is the issue of when it is appropriate for a state to subject persons outside its borders to the economic burden (as opposed to the administrative burden) of a particular tax because of contacts with that state, which are in whole or part electronic in nature. The second significant issue is to determine when a state can legitimately ask that a foreign person be asked to assist in the collection of a tax on others, where those others are within the state's legitimate taxing jurisdiction. The distinction made here, between jurisdiction to impose the burden of a tax and jurisdiction to impose a duty to help collect a tax, is not one that is reflected in the actual law of jurisdiction that has developed, but in a more global and technologically sophisticated economy it may become increasingly important to make this distinction. However, governmental entities should be cautious about imposing jurisdictional oversight and protections that will have extrajurisdictional implications.

When an online purchase is made, either directly or through the intervention of an electronic agent, programmed with the background, assets, and preferences of its human principal/buyer, has the buyer

⁶ Hellerstein has divided the issue of jurisdiction to tax into two components— substantive jurisdiction to tax and enforcement jurisdiction to tax—though he recognizes that these may not be mutually exclusive concepts. Substantive jurisdiction refers to states' power to tax the activity and enforcement jurisdiction refers to states' ability to compel collection of the tax. He argues that substantive jurisdiction arises from either a source or a residence connection. Enforcement jurisdiction normally arises because a state has personal jurisdiction over the earning entity or jurisdiction over a withholding entity. See Hellerstein, Walter (2003) Jurisdiction to Tax income and Consumption in the New Economy: A Theoretical and Comparative Perspective, Georgia Law Review, 38, pp 1-70

stepped into a new place or simply used a different means of communication, much like a phone, fax or satellite link, to affect that purchase? More specifically, if I order a book online from my home in Belfast from a seller physically located in California, is it as if the bookseller boarded a plane and delivered the book to me in Belfast, or is it as if I flew to California to purchase the book off his shelf? Does the 'push' and 'pull' of technology make a difference in how the law should be applied?

The Internet penetrates deeply into domestic economic, political and cultural structures; tax issues go to the heart of a wide range of social issues from beliefs about social spending and the role of government to the distribution of income and wealth. Tax codes are used to discourage activities deemed undesirable by society. They are the basis of attempts to redistribute wealth and income through a graduated income tax or inheritance taxes. What is seen as an appropriate rate of taxation reflects social views about the role of government and collective versus individual solutions to social problems (Kobrin, op. cit). Although the principle of formal sovereignty, in theory, remains the underpinning of international taxation, developments such as economic integration and global ecommerce challenge the state's ability to adhere to or invoke this principle. It is beyond any argument that e-commerce particularly digital e-commerce has impaired the State's ability to tax the income generated by confusing traditional source rules thus making it more difficult to characterize income. If a state cannot characterize income according to traditional source rules, it cannot effectively determine whether it has a right to tax that income. This could result either in double taxation or nontaxation, thus inhibiting the growth of e-commerce or allowing these transactions to go completely untaxed (Basu, 2003).

The autonomy and the anonymity with which people are able to move through the electronic world prevent any legitimate chance of effective self-governance. The virtual identity of a person most of the times has no relation to their actual identity. It is possible to govern cyberspace with set of norms, which could banish a user from a community electronically (Basu & Jones, 2008). However, the technology is not yet developed enough to prevent them from wreaking havoc under a new identity. Even if it were possible to virtually govern online activity, such governance ignores the impact that virtual activity has on the physical world. Jurisdiction is the area of law that deals most directly with the contact between the two worlds. "It is more important that the applicable rule of law be settled than that it be settled right". The question is then how to settle this point of law with the bounds of the traditional legal framework. It is my submission that incremental and conservative change in

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⁷ Burnet v Coronado Oil and Gas Co., 285 US 393, 447 (1932)

jurisdiction law is right because it is the best choice. This means that the defined parameters of the law should be applied to the new factual situations. Governments should take steps to align "enforcement jurisdiction" with "substantive jurisdiction" to ensure that technological developments do not undermine sound tax policy (Hellerstein, 2003).

3. Should E-Commerce be taxed?

So far, I have analyzed to what extent e-commerce can be taxed and apart from trade in digitalized goods, the conclusion has been that it is possible to tax e-commerce. However, just because it is possible to tax (part of) ecommerce it is not obvious that it is socially desirable to do so.8 However, two related concerns have focused the international response (Bolkestein, 2001): (1) that a transaction with a cross-border aspect may be taxed more lightly than a similar purely domestic transaction, stimulating tax evasion and tax competition between governments; (2) and, that reallocation of resources in response to tax conditions rather than market conditions will create economic distortions that diminish productivity (Salter, 2002). International tax regimes are 'sets of implicit or explicit principles, norms, rules and decision-making procedures around which actors' expectations converge in a given area of international relations' (Paris, 2001, p.3). A general theme in tax research is how the necessary tax revenue to support the public services can be raised in the most efficient and equitable way. The debate about e-commerce taxation divides into two primary groups.

The first group, the pro-taxation group, believes that e-commerce should be taxed just like regular commerce. Arguments for taxing e-commerce are based on equity, economic neutrality, revenue (or lower tax rates), and simplicity of compliance and administration. First, failure to impose the tax on online purchases would cause significant revenue losses for state and local governments. Second, if e-commerce is given a no-tax status, then businesses can locate themselves in states where there is no sales tax or VAT (and still serve almost all of their audience online) for electronic purchases, thus making the loss of tax revenues a bigger problem. Differential taxation can also keep businesses from adopting the best business practices. In the case of companies with both traditional and online operations, the need to avoid nexus may prevent some otherwise desirable business practices. For example, in order to prevent nexus, 'Barnes and Noble' stores may not be able to accept returns of merchandise purchased from its online sister company. Companies may be required to maintain separate call centres and warranty and repair operations for their traditional and online customers.

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⁸ Some commentators have argued that it is desirable to tax e-commerce and conventional retail trade differently.

operating only through e-commerce may need to avoid locating warehouses in the best sites, building demonstration centres for their products, in order to prevent establishing nexus. Third, allowing tax exemption for electronic goods and services that are identical to goods and services purchased in traditional stores is not fair, e.g., not taxing an electronic book that is downloaded directly online while taxing the hardcopy of the same book sold in a store. Fourth, it is also unfair to consumers when their tax liability depends on how they buy a good rather than how much they buy. Especially since mostly the richer consumers have access to e-commerce services, banning taxes on electronic transactions allows the richer community to pay less consumption taxes while the poorer part of the community still has to pay VAT or sales tax. Many studies have found the sales tax or VAT to be regressive against current income, meaning the percentage of income paid in sales taxes or VAT falls with income (Fox, 1998). The evidence indicates that ownership of computers and e-commerce access by low-income households is much below that for high-income households. This digital divide can result in uneven taxation that disadvantages low-income households in effect this means even more regressive sales tax or VAT. Empirical research into the impact on e-commerce has concluded that there is a significant relationship between local VAT or sales tax rates and the likelihood that a person will shop online.

A basic principle of taxation is economic neutrality (Committee on Fiscal Affairs, 1998), and it is difficult to argue that web-based vendors deserve the advantage of a tax holiday versus their bricks and mortar competitors. ¹⁰ If e-commerce is not taxed consistently with other forms of commerce, market distortion and consequent inefficient allocation of resources would arise (Salter, op. cit.). Issues of equity and fairness also arise. The digital revolution may lead to a shift in the tax burden to assets and individuals who are 'nailed down,' the more immobile elements of society. While some shift in tax assessment and collection are unavoidable, revisions to the tax code should be made because of a deliberate societal process that considers revenue needs, equity, efficiency and effectiveness, rather than by default. Finally, some seem to believe that e-commerce should receive preferential treatment, in order to encourage its development. There are several problems with this view, which is reminiscent of 'infant industry' arguments for tax incentives often heard

⁹ This estimation is based on study conducted by National Telecommunications and Information Administration and U.S. Census Bureau, U.S. Department of Commerce using population surveys for the year 2000 as cited by Prof William Fox in 'Taxing E-Commerce: Neutral Taxation is Best for the Industry and the Economy'

 $^{^{10}}$ One survey found that 58% of respondents considered it unfair for Internet businesses to have an artificial tax advantage over their main street counterparts.

in developing countries. A differential tax treatment must not be adopted 11 as it offers an easy tax avoidance mechanism and creates administrative complexity. What is crucial is that e-commerce represents a fast growing base, which no country can afford to exclude from the tax net.

There is no evidence that e-commerce needs preferential treatment and as Goolsbee (2001, p.19) says, it appears that "most arguments regarding externalities are based on politics, not economics". E-commerce is growing rapidly and is likely to continue to do so, with or without preferential tax treatment. The situation commonly found in developing countries contemplating tax incentives is vastly different from the present situation in one important respect. In developing countries, there is generally no competing local economic activity to be harmed by the tax-motivated development of new tax-preferred industries. By comparison, much of e-commerce does compete with local vendors who would be disadvantaged by preferential tax treatment of e-commerce.

The broader issue of the taxation of access to the internet is often confused with the issue of the taxation of e-commerce. "Whether the idea is to impose a tax on the flow through the pipeline, on the size of the pipeline, or on the size of the connection, however, it has little merit (Bird, 2005). The proponents of a tax free internet argue that internet access taxes and fees result in rate hikes making access more expensive for the consumer and thus restricting the growth of internet use and e-commerce. Further, these proponents argue against imposing the requirement to collect and remit transactional taxes on remote e-commerce vendors because of the cost of compliance with multiple taxing jurisdictions. Such cost is viewed as a barrier to market entry for small, start up e-businesses.

On the other hand, believers of anti-taxation argue that Internet has created many jobs by moving retailing to the net. Among these jobs, they count trucking and package-delivery sectors. They also argue that by lowering the cost of products for the consumer, e-commerce allows the consumer to buy more things, thus benefiting a wider number of manufacturers. In addition, taxing the e-commerce the same way as conventional businesses brings about other concerns and complications, because first, due to the Internet, many small businesses are now able to serve consumers outside of their area. Imposing taxes on e-commerce will force these businesses curtail their presence on the internet (and will keep such other small businesses away from the internet) resulting in huge losses for these businesses as well as the economies they support (Uzuner & McKnight, 2001). Second, the opponents of e-commerce taxation

¹¹ It has been also argued by some authors that a differential tax structure may be quite costly to enforce *see* Rasmussen, Bo Sandemann (2004) 'Preferential Taxation of E-Commerce: Imperfectly Competitive Retail Markets and Trade Costs', (Working Paper Series No. 2004-09:, Department of Economics, University of Aarhus)

commonly argue that because the Internet has had such a profound effect on productivity, there is no need for states to collect the revenues on these transactions. Internet has been the driving force of the economy in many countries and imposing taxes on e-commerce would result in slowing down its growth, costing the governments' huge revenues in the end. Given the future higher revenues expected from e-commerce, a tax ban on ecommerce could be viewed as a reasonable government subsidy for a developing industry. Favouring e-commerce over other commerce thus may lead to short-term market distortion and inefficiency, but that has been perceived as a rational price to achieve longer-term objectives (Salter, op. cit.). Third, the existing tax laws are inappropriate for the Internet due to the electronic and border-spanning nature of the Internet. Serious modifications and different enforcement mechanisms necessary in order for these laws to work for electronic marketplace. Finally, some advocates of exempting e-commerce from taxation, have adopted a theory advanced by the mail order industry that remote vendors should not be required to collect tax because they do not benefit from services provided by the states where their customers are located. This argument and counter-arguments that accept the validity of its basic premise confuse the issue by focusing on services provided to remote vendors, which should be essentially irrelevant. The point is that purchasers pay the sales tax or VAT and it is to them that states provide services; the remote vendor would merely collect the tax. There is no reason to believe that a consumer of a given product consumes fewer state services simply because the product is bought from a remote vendor.

Taxation raises a number of fundamental issues, which illustrate the more general regulatory problems involving international e-commerce. The digital revolution may lead to a shift in the tax burden to assets and individuals who are "nailed down," the more immobile elements of society. While some shifts in tax assessment and collection are unavoidable, revisions to the tax code should be made because of a deliberate societal process that considers revenue needs, equity, efficiency and effectiveness, rather than by default. Although arguments both for and against taxation exist, the important thing is for authorities to understand the Internet and its unique nature as well as its potential and weak points before a decision is made. Especially, understanding the border-spanning and global nature of the Internet is very important before a global tax agreement is reached. The future lies in developing a system suitable for the digital world of e-commerce, which is simplified in terms of compliance and administration.

4. Tax Avoidance and Tax Evasion

The two critical problems in taxation are: first to identify the tax base and then to enforce the tax. "The anonymity and mobility associated with ecommerce make both of these tasks more difficult" (Bird, 2003). Even if they can identify and measure the tax base, how can they enforce taxation

in view of the disappearance of the third party intervention that has for long served as the practical basis of tax withholding, not to mention the possibility of basing activities in such no-man's-lands as satellites and offshore ships (Cockfield, 2001)? Tax avoidance and tax evasion are important issues when it comes to concerns about tax compliance in relation to e-commerce (Westberg, 2002, p.79). In an e-commerce environment the possibilities of hiding transactions are vast and the possibilities of identifying parties to a transaction are in many cases virtually non-existent. The opportunities for tax evasion seem endless. Tax evasion is always unlawful. Tax avoidance and tax evasion have always been problems with which tax authorities have had to contend. have always been certain businesses that choose to locate their corporate headquarters or to conduct their business activities from states that offer low or no tax regulation. The cost of conducting offshore activities, however, can often outweigh the benefits of tax relief. For this reason, tax avoidance and evasion opportunities of this nature have generally been exploited by only a small number of businesses, as the majority are unable to support such schemes. Traditionally businesses have also been deterred from locating in tax haven countries by other problems inherent in these countries. Although they can offer appealing tax rates, businesses must also consider other characteristics that may not be conducive to maintaining a globally competitive business. Such characteristics include a climate or geography that is not suitable to the particular business, high labour costs, low education levels, poor infrastructure, political instability or a small consumer base.

A business operated through a commercial website, however, is not subject to the same physical constraints as a "bricks and mortar" business. For example, a small or medium sized business in UK can easily post its Web site with a host who operates from a tax haven country. Here it will still be able to access profitable consumer bases while having its financial information hidden by the privacy protection that tax haven countries often provide. The fact that an e-commerce business requires no physical presence other than a server also makes the problems identified above irrelevant. It is now not only affordable for virtually any e-commerce business to locate in a tax haven, but all of the incentives for doing so remain while the disincentives are gradually disappearing. Therefore, when business is conducted on the Internet the problem of tax competition reaches a new level of complexity. For some business, many of the physical constraints on tax evasion or avoidance remain. However, now a category of digital goods and services can be transacted entirely over the With respect to these transactions, states cannot rely on physical controls to prevent or deter tax avoidance and evasion.

5. Implications for Tax Base

All taxes, direct and indirect, under whatever jurisdiction, must operate within global economy. Where e-commerce presents its challenge to the established order is in the fact that it exists in borderless virtual world whereas conventional wisdom regulates commerce and taxation through international treaties, which rely heavily on the establishment of the location of each of the transacting parties. The most fundamental threat to the international tax system posed by e-commerce is the erosion of worldwide tax base and in consequence the damage to economic balances, economic efficiency, and competitive fairness among vendors. Tax rules have historically emphasized the taxation of transactions that involve tangible goods or the taxation of income derived from the economic activity associated with these tangible goods (e.g., royalties from the sale of traditional books) (Cockfield, 2002, p.606).

The base of a tax means the thing, transaction, or amount on which the tax is raised. Identifying the correct tax base is the most important step in structuring a tax. The concept of a tax base refers to the specific measure to which a tax is applied. For direct taxes, which are levied on persons rather than commodities or transactions, the three main types of tax base are income, consumption, and wealth. Among those who have considered the subject, each of these taxes has been suggested as a proxy for the benefits received from civil society (Duff, 2005).

Each tax will have a limited tax base, the limits being of two kinds: the general limits on that kind of tax, and specific exceptions. Clearly, the wider the tax base of a tax, the more revenue it will collect. Hobbes (1651) suggested that the benefits that individuals enjoy under a commonwealth are best measured by what they consume. In more recent times, consumption taxation has also been favoured on the basis that it is neutral between saving and spending and therefore affects individual choices less than most other kinds of tax. On this basis, some have argued that consumption taxation is most compatible with libertarian principles (Duff, op. cit.).

Notwithstanding these arguments for consumption and wealth taxes, others regard income as the best measure of the benefits received from civil society (Duff, op. cit.). According to Adam Smith (1776), for example, "the subjects of every state ought to contribute towards the support of the government ... in proportion to the revenue which they respectively enjoy under the protection of the state". Graeme Cooper (1994, p.493) makes a similar argument, reasoning that "the creation, maintenance and protection of a society within whose markets individuals can pursue and accumulate income and wealth, is a benefit derived from government," that this benefit "manifests itself in the income derived by individuals," and therefore that "income is an appropriate measure of the benefit". Although libertarians may question the extent to which the state is responsible for the creation and maintenance of income and wealth, many appear to accept these arguments in favour of personal income taxation

(Duff, op. cit.). Epstein, for example, endorses the idea of a broad-based or comprehensive income tax on the basis that "everything of value protected by government is subject to taxation" (Epstein, 1985, p.60).

A narrow definition of a tax base creates problems for desired neutral tax treatment between traditional economic activity and activity involving ecommerce in intangibles. The risk of tax base erosion in connection with ecommerce is seen in two different situations, one of which focuses on the changed pattern of doing international business and the other one relates to the ease of offshore establishment (Westberg, 2002, p.234). Business functions could be moved to low-tax jurisdictions and bank accounts and other financial assets could be held offshore. There are numerous examples of avoidance reducing tax revenues and, in some cases, tax rates have had to be reduced in order to stem the revenue losses. Empirical research also supports the view that taxation influences international investment flows, although some studies find little effect (Leibfritz & Bibbee, 1997). The inability to tax e-commerce, on the one hand, and non zero tariffs on physical cross-border trade, on the other, may hasten the pace of substitution of the mode of transactions to virtual commerce as it gets technically feasible to do so. This in turn will further erode the tax base on tradable goods.

However Westberg (op. cit. p.225) argues that dynamic effects of e-commerce have been forgotten when it comes to taxation. Instead of worrying only about lost tax bases, we must also look for opportunities for new source of revenue. E-commerce generated new businesses, new products being created and new markets are being opened. Traders who generate new business will increase the tax base for income tax purposes. The value of their supply of goods or services will be the basis for the taxation of consumption. If e-commerce is used for cross-border transactions, the tax base will be increased in the country where the business activity takes place as well as in the country of consumption. In the first country this will increase the base for income tax purposes and in the other the base for consumption taxation. For a given country this may result in a change from one form of taxation to another. From a global point of view, it means a further step in the direction of more consumption taxes and possibly fewer income taxes (Westberg, op. cit., pp. 225-226).

6. The Optional Way

The issue of taxation of e-commerce is not about the desirability but it is more about the possibility. It would be unjustified if e-commerce is held responsible for all the fallacies of international taxation, particularly revenue loss. With very few exceptions, e-commerce raises no new conceptual issues for tax administrators. A significant portion of potential tax revenue is not collected because of poor tax administration. The complexity of the tax structure and tax administration by itself has been

unable to fulfil the revenue objectives implied by the tax structure. It is widely recognized that tax policy and tax administration is intrinsically linked. In this interrelationship, however, tax policy formulation is generally seen to precede tax administration. This is because only when a tax structure is legislated does tax administration come to play its role in the implementation of the law. However, for the purpose of taxation of ecommerce the direction of the link may not be quite so apparent. Indeed, it is can be said that in case of e-commerce tax administration is tax policy. Effective tax administration must include the power and means to enforce the substantive tax rules, the ability to obtain information and to protect the tax base from businesses which locate in tax havens and to collect taxes generally is essential. It is a fine balancing act to legislate on the basis of an intellectual and equitable framework on the one hand and to take proper consideration of enforcement barriers and administrative practicalities on the other. Inaction on the part of taxation authorities in today's e-commerce environment is simply not an option.

Consumption and income taxation share the same problem in respect of cross-border e-commerce: the supposed difficulties in securing tax compliance. "It is an understatement to write that it is complicated and difficult to secure compliance related to the taxation of income and consumption in connection with cross-border e-commerce" (Westberg, op. cit., p 242). There is nothing more destructive of taxpayer's morality than the suspicion that others are not paying. This means that people should be able to understand the rules. This thought leads to another of the paradoxes of tax. The simpler the rules are, less fair they are. But the fairer they are the more complex they are. The more complex they are, the harder they are to understand and to put into effect. There is also another part although the effectiveness of a tax system depends upon its enforcement, however it also related to cost-effectiveness. So the optional ways for consumption taxation and income tax should take into consideration the enforcement problems for tax authorities in terms of consumption taxation and in relation to income tax pressure e-commerce created on the concept of source of income and transfer pricing arrangements.

It is not possible to advocate for one solution, there are number of potential reform alternatives for income generated by e-commerce transactions. A detail discussion of each and every potential reform is beyond the scope of this article, and some of the reforms may not be practical. Each option has some positive and some negative aspects embedded within. Given the complex structure and significant ramifications of our tax system today, the apparent need is for

¹² For detailed discussion see Basu, Subhajit (2007) Global Perspectives on E-Commerce Taxation Law, Ashgate, pp 334

simplification. Kobrin argues that in discussions of e-commerce taxation four assumptions should work. First, taxation should be economically neutral that is, it should not influence the location or form of economic activity. Second, there should not be double taxation neither taxation should be avoided. Third, there should be an equitable distribution of tax revenue. Fourthly, fiscal sovereignty based on geographically defined nation-states should be maintained (Kobrin, 2002, p.671). As the question of permanent establishment (PE) indicates, however, it will be difficult to satisfy all four of these principles simultaneously. Indeed, given the non-geographic nature of e-commerce transaction (Berman, 2002, p.335), "it may be impossible to resolve jurisdictional issues, distribute revenue, or even collect sufficient revenues to sustain governmental activities while maintaining the practice or principle of mutually exclusive jurisdiction-political and economic control exercised through control over geography" (Kobrin, 2000, pp. 666, 672). Bird and Wilkie (2000) have argued that the most important issue is how to identify measure, assess and effectively tax income. From this perspective, what seems most important is not so much about establishing the correct principles, but to determine what can be done and then, within the limits set by feasibility, to determine how it should be done, by whom and in what way (Bird, 2003). The emphasis on rules rather than principle implies that a gradualist approach rather than a holistic approach should be adopted. It is in my view that more attention should be paid to the process by resolution to international (e-commerce) tax issues are reached and less to the alleged and often disputable normative principles.

No area of the law is closer to the subject of sovereignty than taxation. In legal theory, countries are totally able to determine their own internal tax policies; in reality these same internal policies have an impact far beyond a country's borders and are a legitimate concern of other sovereign nations. As the e-commerce process unfolds further with the introduction on m-commerce, it may be increasingly difficult to sustain the current methods of taxing e-commerce companies operating in different tax jurisdictions. In the absence of true international tax law in the sense of a multilateral tax convention or legislation of an international tax organisation, national tax sovereignty will result in divergent policies and principles governing the taxation of international income. However instead of taking each jurisdiction as a separate entity, consideration may need to be given to the adoption of the unitary or world-wide tax base for the corporate income tax, with an internationally agreed system of tax credits or allocation procedures to prevent double taxation and to maintain international competitiveness.

The problems concerning the application of consumption taxes on ecommerce are generally recognised as having more immediacy than the issues concerning direct taxation. Historically, tax treatment of crossborder sales is uniformly decried as terribly complex, burdensome and inefficient (Greve, 2003). To effectively tax a consumption transaction under traditional taxation principles, tax collectors need to know where the transaction takes place and whether the transaction involves a good or a service (Ligthart, 2004). Incidentally the intangible nature of ecommerce eliminates the paper trail which is a fundamental component of international tax audit and verification practices of most self-reporting system (Forgioni, 2004). Vendors of intangibles often do not know—and usually do not need to know—the physical location of their customers. The relative anonymity of the Internet makes it easy for customers to hide their identity and their physical location, either for privacy reasons or to avoid the payment of tax. The nature of e-commerce also makes it difficult for the tax authorities to determine the locations of the vendors, which normally collect consumption taxes (Ligthart, op. cit.).

The basic incompatibility of the sales tax system¹³ with the VAT system¹⁴ is also a major unsolved tax problem. So far, the post-Ottawa process had shied away from a radical solution to this problem as being impractical to implement. It may be so that with the continuing growth in e-commerce, this cautions position would have to be reconsidered by the OECD and the international community. However, OECD member States have already developed guiding principles for a framework to tax international e-commerce transactions, including a desire to use traditional international tax principles that promote neutral treatment between physical commerce and e-commerce, low compliance costs, and flexible rules to keep pace with technological developments (OECD, 2000). Indeed developments in technology would be indispensable at least for collection of consumption taxes on e-commerce to provide an automated tax charging and collection mechanism. A system for collecting taxes must be technically feasible, efficient, and cost-effective.

In what circumstances should regulators seek more explicit control over technological developments? For the most part, it is accepted that law should only indirectly influence technological innovations by providing a legal framework for these developments to take place: capitalist democracies accept that law enables private property regimes under the values of liberalism or in an attempt to promote wealth creation by protecting the interests of innovators (Cockfield, 2004c, p.404). Markets in turn determine whether technologies persist or become obsolete. In certain circumstances, however, regulators should take more direct steps to mandate the use of technologies to protect interests and values. Tax

 $^{^{13}}$ Imposed individually by the bulk of the states in the US and a number of other major trading nations

¹⁴ Applied by EU and certain other jurisdictions

authorities may need to promote the use of Internet technologies to perform functions that protect these objectives. For example, technological solutions could: (a) identify the location where the purchaser of information good resides; (b) automatically charge, assess and remit taxes on information good transactions to lower compliance costs; and (c) employ online extranets to enhance information exchange among sub-federal and federal tax authorities (Cockfield, 2002, p.606). The more taxing authorities are driven to share information and to promote identification technology that reveals the jurisdiction of buyers and sellers, the more effective will become the taxation not just of e-commerce but of all international and inter-jurisdictional transactions.

7. Conclusion

There is nothing new about technology affecting taxation (Bird, 2003). What do these analyses imply for how e-commerce should be taxed? Digital fiscal pessimists contend that the digital revolution has overthrown the administrative and informational underpinnings of the present system of taxation. I submit that e-commerce can and will be taxed-the issue is that it should be taxed fairly and efficiently. It would not be acceptable for governments if, as expected, e-commerce continues to grow, to allow a gaping hole in their revenue base. However, there is no quick fix. "What may be a sound rule from a tax policy perspective may be totally unworkable in light of available technology, for example, the ability to make anonymous, untraceable electronic cash payments or the ability to locate a server anywhere" (McLure, 1997). However, in any future solution for taxation of e-commerce, the national governments should play a decisive function, since still taxation is a prerogative of the sovereign governments.

Lawmaking can be slow and tedious, but technology often proceeds at break-neck speed. What are the implications of this apparent temporal gap between technological innovation and legal change? On the downside, the gap in time promotes legal uncertainty where affected parties cannot fully understand their legal rights and obligations. "On the upside, the gap in time would seem to permit more analysis and sober thought prior to unpredictable policy implementation. Moreover, the technological developments suggests that, in many circumstances, legal reform may not be suitable, at least not until the implications of the technological changes can be better understood" (Cockfield, 2004c). Trade, whether conducted via the medium of the Internet or any other, is (very simply trade). Therefore, the taxation of it is a legal issue, not a technological one. While most would agree that the ability to effect transactions through electronic means has dramatically altered the way we conduct business, but not all would agree that such change necessitates a total re-evaluation and re-examination of current fundamental tax principles (Greve, op. cit.). However, if the technology makes it impossible to extract tax, society has a problem; it may become necessary for governments to seek greater control over the development and evolution of this technology that created e-commerce. In my view, technology has the capacity to provide a solution; one which is neither a patchwork of calibration, nor a reengineering that is too tightly structured, but has the flexibility necessary to accommodate the everchanging face of e-commerce.

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