

# Bitcoin Transactions: The New Frontier of Income Tax Evasion in Thailand

Dr.Tan Weng Chiang David



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### Abstract

Bitcoin is this intangible cyberspace currency or money use in the purchasing and selling of goods and services. Thus far, governments and monetary regulators of many countries have defined Bitcoin as either a kind of currency or money or an asset. However, given that Bitcoin transactions take place solely in cyberspace with: each seller and purchaser identify by a string of numbers; and a blockchain or a cyberspace ledger keeping track of transactions, it is difficult for the tax authority to account for the identity of the income receiver and the amount of income derived from the transaction.

Tax authorities of different countries have attempted, in numerous ways, to grapple with the kind of income from Bitcoin transactions. However, these attempts may not help to properly tax the amount of income generated by each Bitcoin transaction in cyberspace.

This paper aims to: (1) Highlight the impacts of Bitcoin technology on a person's desire to generate more income, make more profit and accordingly renders the responsibility to pay income tax; (2) Survey the meanings of Bitcoin as defined by the tax authorities of various countries and their attempts to tax income derived from Bitcoin transactions; and (3) Examine the adequacy of specific Thai income tax law in taxing income derived from transactions using Bitcoins, this includes considering the income tax provisions in a Royal Decree or Por Ror Gor Amending the Revenue Code (No.19) 2018.

**Keywords:** bitcoin, cryptocurrency, digital asset

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Received 17 May 2018, Revised 14 August 2018, Accepted 22 August 2018.

## 1. Introduction

Electronic commerce using cryptocurrency is the new frontier of income tax evasion. Cryptocurrency is define by Section 3 of the Royal Decree on Digital Asset Business B.E. 2561 (2018) (“DAB”) as “An electronic data unit created by an electronic system or network with the objective of using as a medium of exchange for the acquisition of goods, services or other rights...” With the explosion of the news on panama and paradise papers to the world, income tax evading has now shifted to take place in cyberspace at an alarming rate, rather than hiding income in shell companies located in tax haven countries.

In recent years, the most transacted cryptocurrency is Bitcoin. In comparison with other cryptocurrencies, Bitcoin has an average daily 261,710 transactions in the last quarter of 2016 and for the period between January to February 2017 an average daily 286,419 transactions, Ethereum, the second most transacted cryptocurrency, has 42,908 average daily number of transactions in the last quarter of 2016 and for the period between January to February 2017 47,792 average daily number of transactions.<sup>1</sup> and<sup>2</sup> This making Bitcoin the most popular cryptocurrency in electronic commerce. Given this popularity, this paper will focus on Bitcoin instead of cryptocurrency in general when discussing in a global context. On discussing and analyzing specifically in a Thailand context, since the author cannot gather any academic research data on Bitcoin’s popularity in Thailand for 2016 and 2017, the word ‘cryptocurrency’ is used instead. As we shall see, given that Bitcoin transactions with its blockchain technology taking place in an intangible cyberspace i.e. “A descriptive term for the cryptocurrency geography of the online

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<sup>1</sup>Garrick Hileman and Michel Rauchs, **Global Cryptocurrency Benchmarking Study** (Cambridge: Cambridge Centre for Alternative Finance, Judge Business School, University of Cambridge, 2017), p. 20.

<sup>2</sup>Bitcoin has also dominated the increase in the total cryptocurrency market capitalization for the period from February 2016 to March 2017 - rising from around 7 Billion U.S. Dollars to almost 25 Billion U.S. Dollars. Ibid., p.16.

world.”<sup>3</sup>, its anonymity on sellers and buyers, fast transaction speed, easy set-up and tax-free features is causing sale and purchase of goods and services using cryptocurrency to grow at an exponential rate.

While various governments of the world and their monetary authorities try to grapple with defining what is a cryptocurrency and Bitcoin, its economic and tax implications, millions of Bitcoin transactions are taking place in cyberspace minute-by-minute free of income tax being levied and undetected. A Bitcoin transaction in this paper means any kind of selling and buying involving Bitcoin (“Bitcoin Transaction”). It should be noted here that this paper does not deal with cryptocurrency issued on a centralized basis or from a network that branches out from a central point i.e. currency issued by an identifiable central administrator, organization, governmental entity etc. This paper deals only with decentralized Bitcoin cryptocurrency i.e. a cryptocurrency that can be bought directly from any anonymous seller in cyberspace. This reason for this focus is that a cryptocurrency bought from decentralized networks in cyberspace can be obtained promptly – without having to go through a medium thereby allowing the subsequent Bitcoin Transaction to take place earlier. This kind of Transaction can take place at any minute, at any location in the world, including its underlying income tax evasion. This nature provides the potential for such Transactions to be popular and commonplace.

On May 13, 2018 a Royal Decree or Por Ror Gor Amending the Revenue Code (No.19) 2018 (“Royal Decree”) comes into effect. This Decree provides for the kind of income tax and the tax rate to be levied on a transaction involving Bitcoin. This paper will consider the Royal Decree and discuss the enduring challenges post by Bitcoins, despite this new law.

Given that paying income tax is not only a legal obligation but a responsibility of ALL income earners to contribute to the public purse and thus relieving somewhat the burden of all taxpayers and provide for building public

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<sup>3</sup>Peter J. Dyson, *The PC User’s Essential Accessible Pocket Dictionary*, 2nd ed. (San Francisco: Sybex, 1995), p. 135.

infrastructures and facilities, funding for the poor, health care and the aging population, any shortfall in income tax measures should be addressed or risk tax evasion.

## 2. History of Bitcoin and its Social Impact

Bitcoin is a cryptocurrency in cyberspace created by a programmer or a group of programmers using the pseudonym Satoshi Nakamoto, he or they own the source code of the Bitcoin software. Bitcoin currency does not have to rely on the support and approval of transactions by a financial institution or any third party: "...allowing any two willing parties to transact directly with each other without the need for a trusted third party"<sup>4</sup>. Also, cryptography is used to encode each Bitcoin transaction, and this allegedly protects users from fraudulent practices<sup>5</sup>. Cryptography is defined as, "...the computerized encoding and decoding of information."<sup>6</sup> These are the strengths of Bitcoin Transactions. On the other hand, such encoded Transactions with Bitcoins are used for payments of illegal goods and services, laundering of monies made from such payments and evasion of income tax payments.

Users of the Bitcoin network are first required to download a necessary software that creates a digital wallet. This wallet provides the user with a unique user's address and two keys i.e. one 'public' and one 'private' key. The public key is an address for other users wishing to transfer Bitcoins to the user. The private key is used by the user to authorize access to the Bitcoins in the wallet. All Transactions with other users are recorded and broadcasted on a public ledger known as a

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<sup>4</sup>Satoshi Nakamoto, **Bitcoin: A Peer-to-Peer Electronic Cash System** [Online], available URL: <https://bitcoin.org/bitcoin.pdf/>, 2018 (May, 17).

<sup>5</sup>Patrick McLeod, "Taxing and Regulating Bitcoin: The Government's Game of Catch Up," **CommLaw Conspectus: Journal of Communications Law and Technology Policy** 22, 2 (2014): 381.

<sup>6</sup>Merriam-Webster. **Cryptography** [Online], available URL: <https://www.merriamwebster.com/dictionary/cryptography/>, 2018 (May, 1).

Blockchain (“Blockchain”)<sup>7</sup>. This Blockchain is interconnected with other Blockchains in cyberspace so that selling and buying do not have to just transact within one Blockchain, but interconnected with sellers and buyers in other Blockchains as well – a decentralization of networks. The very first Blockchain is presumably started by Satoshi Nakamoto. Both the public and private keys are represented by a string of numbers on a Blockchain, this is the encoding in Bitcoin Transactions that provide the anonymity shield against law enforcement authorities for money made from illegal activities and the Revenue Department of Thailand (“RD”) for income tax evasion.

Income tax evasion here and in this paper refers to a person knowing that he, she or it has to pay income tax but deliberately avoid paying tax knowing that this avoidance is unlikely to be detected and punished<sup>8</sup>.

Similar to the Internet, the Blockchain in cyberspace branches out to various sellers and purchasers – as with the Internet, a massive global network linking up users interconnecting users. They do not arise from one single thought or action of a person that develops but just a network of interconnectedness. The French philosopher Gilles Deleuze and psychiatrist Felix Guattari refers to this as a rhizome, a branching out from a center, ever expansion of connectedness with no single initiation or thought that develops or advances. In their essay “A Thousand Plateaus” they state that a rhizome begins “...from a ramified surface extension in all directions...”<sup>9</sup>. They described the rhizome as having a few distinct characteristics or principles, which by analogy apply to our culture and a person’s intellectual development today. The first is the principle of connections: “...any point of a rhizome can be connected to any other, and must be. This is very different from the tree or root which plots a point, fixes an order.” and makes connections upwards

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<sup>7</sup>Patrick McLeod, *op. cit.*, p. 382.

<sup>8</sup>Aleksandra Bal, "Chapter 14: How to Tax Bitcoin?," in **Handbook of Digital Currency: Bitcoin, Innovation, Financial Instruments, and Big Data**, ed. David Lee Kuo Chuen (San Diego, CA: Academic Press, 2015), p. 272.

<sup>9</sup>Brian Massumi, trans., **A Thousand Plateaus**, by Gilles Deleuze and Felix Guattari (Minneapolis: University of Minnesota Press, 1987), p. 7.

from the root<sup>10</sup>. Another rhizome characteristic is described by Deleuze and Guattari as multiplicity: “Multiplicity” that it ceases to have any relations to the One...”<sup>11</sup> In other words, the nature of the rhizome does not change; it just multiplies and multiplies with interconnections branching out in every possible direction without any hierarchy. Though its nature does not change, multiplicity ceases to have a relation to a pivotal rhizome, it is a process that does not have a beginning or end. A Blockchain which facilitates and records transactions of sellers and buyers has the same rhizomatic characteristics of connections and multiplicity. The Blockchain connects a seller and buyer to enable a sale contract to take place and it connects out to multiple Blockchain interconnections, it is not from a pivot point that branches upwards but extends out to connect with multiple others of the same nature i.e. Blockchains at the same level. This kind of connectivity therefore has no beginning or end, it just keeps connecting.

As argued by Deleuze and Guattari in their essay, this interconnection is a never ending extending out, interconnecting with other rhizomes or Blockchain on one flat level. Though Blockchain connections appear to be growing, its nature remains unchanged, there is no chronological or hierarchical growth upwards from one point. There is only propagating and multiplying on a flat level - a plateau. An ever expanding plateau of selling and buying driven by the desire to make more profit rather than gaining intellectual growth.

Furthermore, Bitcoin technology reduces space and accordingly time for a seller and buyer to transact, this reduces the possibility of well thought out decision making, examination of goods and services. The world in which business is conducted becomes a lot smaller with poorer decision making ability in buying and selling.

Bitcoin technology is not free as it appears, we need to pay for the Internet services to get connected to the technology, as more transactions and regulating

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<sup>10</sup>Brian Massumi, trans., *Ibid.*, p. 9.

<sup>11</sup>*Ibid.*, p. 7.

takes place, we have to buy more expensive hardware and software to keep it operating, also invests in the training of updating and enhancing the necessary skills required for using the technology. These means making more money to pay for these.

Companies and employees who do not invest and update their knowledge and skills with the development of the Bitcoin technology will lose out in business competition or lose their jobs. Perhaps invest is not the fully appropriate word to use here because, with the continual advancement of the technology, the only return to be obtained from buying into training or education for knowledge and skills is by generating more income from sales of goods and services. The Bitcoin related software and hardware (if any) is difficult to be sold off because people want to buy the most up to date technologies. Accordingly, Bitcoin technology of the past will be worth lesser.

Desire to make more and more profit is carry out by interconnectedness and speed in Bitcoin Transactions. Bitcoin technology therefore enables the driving of exponential growth in sale and purchase transactions on a daily basis, this leading to lesser human interactions replacing by more greed to receive more income, completely undisclosed to the tax authorities. Countries may increasingly suffer from losses in income tax that should have been levied and collected.

Given these negative intellectual, technological and taxation impacts of Bitcoin technology, they justify tax to be levied on income derived from Bitcoin transactions.

### **3. Pro-activeness of Foreign Governments**

Part of the sovereignty of a country is to have laws that provide for the needs of its people. After all, the people elected the government of the state and the state is entrusted to represent its people. The current tax laws of many countries do not seem to have laws that ensure proper taxation on income from Bitcoin Transactions. As a result, tax free income may be made on a greater and greater scale as sellers and service providers opt for Bitcoins transactions, rather

than currency or money transactions. The public purse therefore becomes substantially poorer, accordingly affecting funding for infrastructure building, health care, the aging population, the poor etc.

Governments of various countries have started to grapple with cryptocurrency and Bitcoins by first deciding on what is Bitcoin? If it is deemed an intangible asset then capital gains tax should be levied when trading in for real currency or if it is considered a currency or money, then income tax should be levied on the proceeds from all sales and purchases of goods or services using Bitcoins. I will now survey the considerations of various countries here:

The 2013 Annual Report to Congress, the United States Taxpayer Advocate considered the need to issue guidance addressing tax treatment of digital or cryptocurrency, as this is a serious problem facing the Inland Revenue Service ('IRS'). The National Taxpayer Advocate recommended for the IRS to answer the following: When receiving or using digital currency generate gains or incur losses, will the gains be taxed as income or as capital gains, and what information reporting, withholding and record keeping requirements apply to cryptocurrency transactions?<sup>12</sup>

In March 2013, a department of the US Treasury, the Financial Crimes Enforcement Network ('FinCen') clarifies that persons creating, obtaining, distributing, exchanging, accepting or transmitting cryptocurrencies must be registered as money transmitters with the FinCen under the rules on money-services business<sup>13</sup>. On March 25, 2014, the IRS issued a notice stating that cryptocurrency or digital currency is treated as property and not as a currency for US federal tax purposes. Therefore the general tax principles that apply to property transactions also apply to transactions using digital or cryptocurrency. It is further clarified that a tax payer who receives a cryptocurrency as payment for

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<sup>12</sup> Aleksandra Bal, op. cit., p. 280.

<sup>13</sup> Ibid.

goods or services must accordingly include the fair market value of the cryptocurrency in computing gross income.

On December 3, 2013, the central bank of China and other government ministries and commissions jointly issue the Notice on Precautions against the Risks of Bitcoins. Defining it as a special kind of cryptocurrency commodity and it is not a currency. Therefore, it should not be circulated and used in the market as a currency or money. Bank and other payment institutions in China are therefore prohibited from buying and selling with Bitcoins and cannot price goods and services in Bitcoin currency<sup>14</sup>.

In the U.K., the Revenue and Customs Department, issued a Revenue and Customs Brief 09/14 of March 3, 2014 stating that income received from activities involving Bitcoins and other similar cryptocurrencies is subjected to the general rules on income tax and capital gains tax<sup>15</sup>.

In April 2013, the Canada Revenue Agency (“CRA”) announced that Bitcoin users have to pay tax on transactions. The rules on barter transactions apply to the transactions involving Bitcoin i.e. Bitcoin(s) in exchange for goods and services, while the legal provisions on trade in securities applies to Bitcoins bought and sold for speculative purposes<sup>16</sup>.

The Inland Revenue Authority of Singapore (IRAS) explained that if digital currencies are used to pay for goods or services, the transaction, as far as income tax is concerned, will also be regarded as a barter trade<sup>17</sup>.

The Finnish Tax Authority (*Verö Skatt*) clarifies its treatment of Bitcoin for income tax purposes in a notice issued on August 28, 2013. This notice provided several examples on how to calculate taxable income from Bitcoin transactions. For profits derived from sales of Bitcoins for real currency will be taxed as

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<sup>14</sup>Aleksandra Bal, *Ibid.*, p. 278.

<sup>15</sup>*Ibid.*, p. 279.

<sup>16</sup>*Ibid.*, p. 278.

<sup>17</sup>*Ibid.*, pp. 279-280.

capital gains. However, the *Vero Skatt* regards Bitcoin neither as a currency nor as a security<sup>18</sup>.

On March 25, 2014, the Danish tax authorities (SKAT) explained that Bitcoin cannot be regarded as a currency or a legal tender since it is not subjected to regulating by a central bank and cannot be withdrawn from circulation. Taxpayers who uses Bitcoins in buy and sell of goods and services in its ordinary course of business are subjected to the general rules on income tax i.e. profits are taxable and expenses are deductible. But changes in the value of Bitcoins and its exchange rate fluctuations should not be subjected to tax on its capital gain.<sup>19</sup> It remains to be seen how the profits from using Bitcoins in the selling and buying of goods and services will be taxed. Given that the selling and buying with Bitcoins takes place in cyberspace, how can such transactions be accounted for to SKAT and henceforth how will the profits thereof be taxed?

Judging from the efforts that the governments in various countries have come up with, it seems that they are still playing catch-up on taxing income from Bitcoin transactions. Defining and categorizing Bitcoin as a currency or an intangible asset or income may have not taken into consideration the singular and decentralized cyberspace medium of Bitcoin transactions and the anonymity provided to sellers and buyers. An intangible asset can be easily moved in a singular and decentralized cyberspace to another location and the Blockchain technology that facilitates a Bitcoin transaction maintains anonymous the identities of the seller and buyer thereby renders the income unaccounted for. These may result in a fair amount of income tax evasion. Before discussing these in detail, it is necessary to first explore where income tax should be levied on transactions using Bitcoins.

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<sup>18</sup> Aleksandra Bal, *Ibid.*, p. 278.

<sup>19</sup> *Ibid.*, p. 279.

#### 4. Income Tax Levy on Transactions Using Bitcoins

Income deriving from transactions using Bitcoins can come from two kinds of transactions: (1) Income from sale of goods and services in cyberspace, whether recorded in a Blockchain or not; and (2) Income deriving from Bitcoins exchange into real Baht currency or trading in of Bitcoins to get real Baht currency in return.

In the first kind, Bitcoin is used as a form of currency in cyberspace for the sale and purchase of a good or service, for example, the purchasing of a handbag from a seller or paying for consultation fee to a doctor. Given that the Blockchain maintains the accounting on these transactions, the profit realized from the sale transaction is also recorded there. In the second kind, when the Bitcoins are traded in for real Baht currency, there is income derived as a form of capital gain, if there is an increase in the value of the Bitcoins in comparison to Baht currency. For example, Mr. A used 100 Baht to buy 10 Bitcoins on February 1. On April 1 Mr. A traded in his 10 Bitcoins and received 150 Baht. Mr. A has realized a capital gain of 50 Baht. This is the income in the second kind, income from selling Bitcoin as an asset. Tax should be levied on income derived from both cases i.e. income derived from using Bitcoin as a currency for a sale and purchase transaction and income derived from selling off Bitcoin as an asset or a capital gain.

Referring also to the attempts by the various governments in the preceding section in defining Bitcoin and cryptocurrencies as an intangible asset or currency or both, we need to clarify here that defining Bitcoin as a currency or money is applicable to the first kind of transaction and defining Bitcoin as an asset or commodity is applicable to the second kind of transaction. Though the author is doubtful as to how Bitcoin can be considered a currency when it is not regulated by a central bank and is therefore not a legal tender. The quantity of Bitcoins in the market is not released or withdrawn by a central bank. This view is also echoed by the Danish tax authority (SKAT).

The Thai personal and corporate income tax laws do provide for tax to be levied on income from both sale of goods or services contract and capital gains.

However, there is no specific personal and corporate income tax law on sale of goods and services using Bitcoins or cryptocurrency.

Having said that, income derived from any kind of Bitcoins or cryptocurrency transaction by an individual person (not juristic person) can be considered as an assessable income for withholding personal income tax. Referring to Section 39 of the Thai Revenue Code (“TRC”), income that is subjected to tax or assessable income for tax means: “Such income also includes a property or any other benefit received which may be computed into a monetary value...” and Section 40 (8) of the TRC provides for assessable income for withholding personal income tax: “Assessable income is income of the following categories...Income from business, commerce, agriculture, industry, transport or any other activity ...The amount of tax under paragraph one, which is paid for by the payer of income or by any other person on behalf of taxpayer...” This is income tax at the source of the income or the payer of income has the duty to withhold tax and make payment of tax for the receiver of income. Income received from Bitcoin transactions can be an assessable income because it is income from “...any other benefit received...” or “...any other activity...”. Therefore, under the current tax laws, personal income derived from the sale of goods and services using Bitcoins or cryptocurrency can be subjected to personal withholding tax under the provisions of Sections 39 and 40(8) of the TRC.

On evading payment of personal income tax, Section 27 of the TRC provides that; “A person failing to pay or remit tax...shall pay surcharge of 1.5 percent per month or a part of a month of the amount of tax payable...” The criminal penalty comes in Section 37 Bis for “A person intentionally failing to file tax returns ...in order to evade or in an attempt to evade tax, shall be subjected to a fine of not exceeding five thousand Baht or an imprisonment for a term not exceeding six months or both” Though this is prescribed with imprisonment penalty, in terms of obtaining evidence to prove the crime, enforcement of Section 37 Bis is quite another matter. Any payer of income under Section 40 (8) has to complete a withholding tax return form – a Por Ngor Dor form. This form is filed at the RD and the tax withheld is paid there, the tax return form confirms and evidenced that tax

has been withheld by the payer of income and the seller has received income. Enforcement of the law is futile if the individual payer of income does not file a Por Ngor Dor tax return form. Without receipt of this tax return form, the RD would not know and has no evidence that a sale transaction had taken place.

## 5. Royal Decree on Digital Asset

Taking into consideration the: Threat to public safety posed by cryptocurrency being used as the currency for money gain from criminal activities and for money laundering channels – with the help of Blockchain technology; Its impact on the Thai economy from unaccounted for cryptocurrency transactions in cyberspace; and The public confusion on whether a cryptocurrency is a legally valid currency or asset or both, the Thai government invokes Section 172 of the Thai Constitution 2017<sup>20</sup> to passed two Royal Decrees i.e. the DBA and the Royal Decree. These Decrees have the same legal effect as binding laws. According to the Royal Decree or Por Ror Gor that came into effect on May 13, 2018, a 15% personal withholding tax is levied on the gains derived from trading in or exchanging cryptocurrency for real currency i.e. Baht currency. The tax withheld by the payer of income is for the capital gain from investing in the cryptocurrency and selling away the cryptocurrency for real currency. Accordingly, the Decree goes on to provide for inclusion to be made to the relevant sub-section of Section 40 of the TRC on withholding tax on capital gain.

However, the Decree has no provision on withholding tax being withheld by a payer of income for sale of goods and services using cryptocurrency as the currency. This implies that the current laws on withholding tax for sale of goods and

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<sup>20</sup>“For the purpose of maintaining national or public safety or national economic security, or averting public calamity, the King may issue an Emergency Decree which shall have force as an Act.

The issuance of an Emergency Decree under paragraph one shall be made only when the Council of Ministers is of the opinion that it is an emergency of necessity and urgency which is unavoidable. In the subsequent sitting of the National Assembly, the Council of Ministers shall submit the Emergency Decree to the National Assembly for its consideration without delay....”

services in general apply i.e. Sections 39, 40(8), 27 and 37 Bis of the TRC discussed in preceding section.

On March 28, 2018 the Minister of Finance of Thailand, Mr. Apisak Tantivorawong confirmed that the Royal Decree will also provide for a 7% value added tax (“VAT”) payable by investors who buys and sells cryptocurrencies. This 7% VAT is exempted if the trading of cryptocurrency is carried out through exchanges. However, investors are required to pay the 7% VAT if no capital gains are realized.<sup>21</sup> In the Decree that came into effect on May 13 there is no provision on VAT payable by investors who buy and sell cryptocurrencies. We can only presume here that the current laws on VAT apply.

VAT is the tax levied on the value added to all goods i.e. tangible and intangible properties and services a person or juristic entity purchased per month. As provided in Sections 85 and 85/1 of the TRC: any seller of goods before commencing business or within 30 days after income exceeds 1,800,000 Baht must register himself, herself or itself as a VAT registrant. Such seller of goods, which includes intangible property, is a person or a juristic person selling goods or providing services in the course of his, hers or its business. According to Section 78 of the TRC a 7% VAT is payable by the buyer of goods or services or input VAT. This VAT received by the seller is the output VAT of the seller. Section 82/3 of the TRC provides that if the output VAT exceeds the input VAT i.e. VAT paid by the seller when he, she or it purchases goods or services from others per month, the seller shall pay the excess collected output VAT to the RD. However, if the seller’s output VAT is less than his, hers or its input VAT, then the difference is the seller’s tax credit and is refundable by the RD. VAT is therefore a tax on the excess value added to the goods or services we sell to others. Therefore, it can be concluded that applying the existing laws on VAT, VAT is applicable to both sale of goods and

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<sup>21</sup>Bangkok Post, **Draft Decree on Digital Assets Approved** [Online], available URL: <https://www.bangkokpost.com/business/finance/1436159/draft-decree-on-digital-assets-approved/>, 2018 (April, 17).

services using cryptocurrency as a currency and the sale of cryptocurrency as an intangible property.

## 6. Anonymity Provided by Blockchain Technology and Singularity of the Cyberspace

The current Thai corporate and personal income tax laws, including the Royal Decree, do not provide any indication on tackling the two following ways of income tax evasion. The author believes these two ways are difficult to tackle because they are made possible by the inherent strengths that Blockchain technology provides and facilitates.

In the event of a sale and purchase of goods or services transaction between two individual persons, the identity of the seller and buyer is unknown to the RD when the buyer and payer of the income does not withhold tax and file the Por Ngor Dor withholding tax return form to the RD. When the same transaction takes place in the medium of cyberspace using cryptocurrencies, it gets even more hidden from the RD. Each seller and buyer registered to a Blockchain is known and identifiable to all only by a string of numbers, an encoding. Every sale and purchase transaction made is recorded on the Blockchain and with a string of numbers representing a seller and a buyer respectively. The numbers are encoded for the sellers' and buyers' records only. Due to this kind of anonymity and record keeping provided by Blockchain technology in cyberspace, individual buyers and sellers in cyberspace do not have to keep accounts on each individual sale and purchase transaction taken place through the Blockchain, much less withhold tax for the RD. As a result, income derived from such sale and purchase of goods and services, including any expenses incurred thereof, remain undisclosed to the RD. Cryptocurrency technology had provided an anonymity shield to what may be already a widespread practice i.e. individual sellers avoiding paying income tax.

However, if the purchaser is a juristic person, for example a company, and it purchases from a seller, the purchaser will have to submit a tax return form or Por Ngor Dor form to the RD on withholding income tax. This tax return form evidenced to the RD that a sale and purchase transaction has taken place. Furthermore, Section

68 of the TRC requires all juristic persons to file an annual income tax return form – Por Ngor Dor 50 form within one hundred and fifty days from the closing day of the accounting period. Section 69 provides for this form to show items necessary for tax calculation in the accounting period i.e. income, expenses, net profit and other information together with a balance sheet, an operating account, a profit and loss account etc. The payment made by a company for the purchase of a good or service or a cryptocurrency shall be recorded as expense in the operating account and profit and loss account. As a result, the RD will know about the transaction from the tax return form and the financial statements submitted by the purchasing company. This is not the case with individual sellers and buyers, individual sellers and buyers can choose not to issue any tax return form on withholding personal income tax and further hide their identities behind the anonymity shield provided by Blockchain technology. Given this, a sale and purchase of good or service transaction between an individual seller and buyer may proceed completely unknown to the RD thereby evading the need to account for income received and payment of personal income tax.

Secondly, investors of cryptocurrencies i.e. individual persons and juristic entities who anticipates capital gain from their cryptocurrencies investments may not want to buy and trade in their cryptocurrencies for real currency in Thailand because of the 15% withholding tax<sup>22</sup> or any withholding tax rate that they deemed too high. Given the borderless and country-less features of Blockchain technology in a singular cyberspace, investors will not purchase and sell their cryptocurrencies for real Baht currency in Thailand. Investors will buy and sell their cryptocurrencies at a jurisdiction where there is lesser or no capital gains tax payable. This shying away of investors may substantially reduce the sale of Bitcoins and other kinds of cryptocurrencies in Thailand, thereby, affecting the Thai economy and loss of

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<sup>22</sup>Mr. Korn Chatikavanij, a former Finance minister of Thailand from 2009 to 2011, has said that the withholding tax on investing in digital assets will lead to new businesses moving their start-ups to other countries. Initial Coin Offering (ICO) by companies can be moved to Singapore to raise funds there as there is no capital gains tax there. From Bangkok Post, Ibid.

potentially collectable income tax and VAT. This in turn results in a smaller public purse and henceforth creates a heavier tax burden on people.

Newly enacted law(s) on taxing transactions using cryptocurrencies must address income tax evasion at the very point it happens, not just a law providing for taxing transactions. Unfortunately, for now, it seems that the technology of the Blockchain and a singular cyberspace are preventing the law from doing just that.

## 7. Tracking Cryptocurrency Transactions

If technology can also develop as far as tracking cryptocurrency transactions, it will accordingly allow the RD to track and tax these transactions. The current computing technology in normal computers does not have the ability to monitor or track transactions using cryptocurrencies via a Blockchain. However, advancements are being made towards building a quantum computer or super computer which, in addition to other abilities, may have the ability to track online systems and their stored information. When such a quantum computer does get developed and build, it probably will have the ability to monitor and track transactions that go through the Blockchain. Given this, it will be a valuable technology for the RD to invest in and use in due course.

The normal computer that we have today stores or encodes a quantity of data in binary bits of '1' or '0'. In terms of a sphere, these represent only two poles of the sphere. However, a quantum computer has the ability to store data that represents all points of the sphere or the data is stored in quantum bits or qubits<sup>23</sup>. This simply means that data can be stored and exist in more than one state at a time, or the qubits can exist at any point of the sphere. Therefore, a computer using these qubits can store and process a much larger amount of data and using less energy than a normal computer.

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<sup>23</sup>The word quantum comes from quantum physics in its study of the ability of subatomic particles to exist in more than one state at any time.

Also, quantum computer has the ability of finding very large prime numbers. “Since prime numbers are so important in cryptography, it’s likely that quantum computers would quickly be able to crack many of the systems that keep our online information secure”<sup>24</sup>. This can include cryptocurrency related systems and Blockchains which maintain the anonymity of sellers’ and buyers’ identities and their transactions.

Given the super power of a quantum computer, it may have the technological ability to detect the identities of the seller and buyer in a Blockchain and the transaction(s) they engaged in. Also, possibly gain access into investors’ records who have exchanged their cash for cryptocurrencies and vice versa at an exchange outside Thailand. The current software technology is not adequate to track cryptocurrency transaction, neither does it have the capacity to track the infinite and interconnected cryptocurrencies transactions held together by Blockchain technology. Therefore, unless and until a quantum computer (or other technology with a similar ability) gets fully developed and build, there is no possibility to track cryptocurrencies transactions taking place in cyberspace and levying income tax on these transactions.

## 8. Conclusion

Governments should not yield to increasingly sophisticated cryptocurrency technology and the anonymity of sellers and buyers it provides. But clarifying whether cryptocurrencies are intangible assets or currency so as to be able to levy withholding tax on capital gain and VAT may be falling short of addressing income tax evasion. These tax measures may chase away cryptocurrencies transactions from Thailand and resulting in more income tax evasion, and lesser tax collected by the

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<sup>24</sup> Abigail Beall and Matt Reynolds, **What are Quantum Computers and How do They Work**, **Wired Explains** [Online], available URL: <http://www.wired.co.uk/article/quantum-computing-explained/>, 2018, (February, 16).

state<sup>25</sup>. With the anonymity that Blockchain technology provides and the vast, singular and decentralized cyberspace, investors of cryptocurrencies will move to purchase and sell their cryptocurrencies at an exchange outside Thailand that has no or very little capital gains tax, while sellers and buyers will continue to hide behind the Blockchain anonymity shield when selling and purchasing goods and services. The Royal Decree is instead compelling sellers, buyers and investors to use Blockchain technology for income tax evasion outside Thailand.

Perhaps, instead of focusing on taxing income derived from a cryptocurrency transaction, it may be more effective to openly embrace cryptocurrencies transactions by allowing these transactions to take place in a single government operated cryptocurrency exchange and a single government operated market for business transactions using cryptocurrencies i.e. sale and purchase of goods and services using cryptocurrencies. These two government regulated exchange and market would invest in the Blockchain technology on a scale that facilitates the sales and purchases of goods and services and the exchange of real currency to cryptocurrencies or vice versa or the exchange of one cryptocurrency for another. Financial intermediaries, who are experienced with these kinds of transactions, can register themselves at these exchange and market as licensed intermediaries. Lower income tax rates are levied on the cryptocurrencies transactions conducted in both the exchange and the market.

The two governmental regulated and operated cryptocurrency exchange and market can better address the threats to public safety posed by cryptocurrency being used as the currency for money gain from criminal activities and for money laundering channels and the impacts to the Thai economy from unaccounted for cryptocurrencies transactions i.e. the aims of the two Royal Decrees. As all sellers and buyers, including their intermediaries, are registered and approved by the exchange or the market or both and having to account to the exchange and market

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<sup>25</sup>Martin Young, **Dark Days Loom for Thailand's ICO Industry, but Individual Crypto Tax Waived** [Online], available URL: <https://www.newsbtc.com/2018/05/15/op-ed-dark-days-loom-for-thailands-crypto-industry/>, 2018, (May, 18).

for all their sale and purchase transactions, money or cryptocurrency gain from criminal activities or is in the process of being laundered may have a greater possibility of being detected or prevented. Secondly, the single government regulated and operated exchange and market can facilitate better liquidity for cryptocurrencies as all transactions are conducted in one place rather than in scattered exchanges and markets. Also, this provides a clearer picture on the supply and demand for cryptocurrencies and goods and services transacted with cryptocurrencies as this is reflected in their prices and quantity traded in the exchange and the market. Lastly, with more specific importance for this paper, having cryptocurrencies transactions carrying out under an exchange and a market oversee, regulated and operated by the government, rather than in scattered and decentralized exchanges and markets, this justifies lowering the Thai income tax rates, provides better accountability on tax payment as the tax is paid to the RD at the exchange and market thereby reduces Thai income tax evasions.

The solution to income tax evasion lies not in solely tightening up tax laws, but also in facilitating and creating supply, demand, prices and quantity of goods, services and cryptocurrencies and liquidity for cryptocurrencies. Also, more attractively, reduced income tax rates. The DAB goes as far as to provide for the meaning of an exchange for sale and purchase of digital asset, this including cryptocurrency. Section 3 of the DAB provides: “A Digital Asset Exchange means a center or a network established for the purpose of purchasing, selling or exchanging digital assets, operates by matching or arranging the counterparty or providing the system or facilitating a person who is willing to purchase, sell or exchange of digital assets to able to enter into an agreement or match the order, the normal course of business,...” It further provides in Section 26 that an operator of a digital asset business, this including a Digital Asset Exchange, must have received approval to operate from the Minister of Finance with recommendation from the Securities Exchange Commission (“SEC”) and Section 27 states that the approved operator of the Exchange shall comply with the rules, conditions and procedures as specified in the notification of the SEC. Such approval granted to an operator of Digital Asset Exchange is granted to anyone who satisfies the requirements of the Minister of

Finance and SEC. This may give rise to a situation where approved operators of Exchanges being scattered or decentralized, rendering opportunities for cryptocurrencies associated with criminal activities, money laundering channels and failure to detect or prevent income tax evasion to arise. Secondly, having multiple Exchanges rather than one Exchange does not facilitate the required supply, demand and liquidity of cryptocurrencies that a single exchange can provide to sellers and buyers. Thirdly, the multiple exchanges will have varying exchange rates for exchanging real money to cryptocurrency or vice versa and for exchanging one cryptocurrency for another cryptocurrency. This will cause certain sellers in one exchange to have to pay a higher capital gains tax while sellers in another exchange pay lesser tax.

In the DAB there is no provision on the setting-up, regulating and managing of one cryptocurrency exchange by a responsible Ministry or government department, neither is there any provision for the setting up and regulating of a market for the selling and buying of goods and services using cryptocurrencies. This may, in the long term, render the DAB a futile attempt to prevent income tax evasion. Clear legal provision on the setting-up of a cryptocurrency exchange and a market places the obligation on the Finance Ministry to do so, this is crucial to facilitating, regulating and effective taxing of all kinds of cryptocurrency transactions under one roof.

After having the cryptocurrency exchange and market in place and operating, any kind of Thai income tax evasion ought to be slapped with heavy criminal penalties to deter income tax evasion. Yes, the criminal law should provide for income tax evasion as a crime, carrying criminal penalty i.e. the possibility of spending time in prison if convicted. The police will have to work closely with the RD to investigate and gather evidence to dispense with the burden of proving tax evasion. Also, a crime begs the use of extradition treaty for a tax evader located outside Thailand. This is very applicable to cryptocurrencies transactions as one party may be located overseas. These beg the question of: does the government want to seriously put a stop to income tax evasion by cryptocurrency transactions? It is a social responsibility to pay tax. However, given that income tax evading has been epidemic over many years – the parking of money in tax haven countries with offshore bank accounts and now with cryptocurrencies and Blockchain technology,

categorizing clearly income tax evasion as a crime will not only carry imprisonment penalties and act as a deterrent, but also hopefully compels rigorous enforcement of the law by the RD officers and the police.

The approach towards cryptocurrency transactions should be a ‘supporting and taking’ approach rather than just simply collecting more income tax as this will encourage income tax evasion with the help of technology and chasing away sellers, buyers and investors. New tax measures should not be just collecting more tax, punishing tax evaders, but also to help businesses flourish responsibly and legally. This can be done with an exchange for cryptocurrency investors and a market for sale and purchase transactions using cryptocurrencies regulated and operated by the Finance Ministry and having its participants: investors, sellers, buyers and financial intermediaries registered at the exchange and/or the market. In this way, investors of cryptocurrencies who exchange their cryptocurrency back to Baht currency or exchange one cryptocurrency for another will have their capital gain accounted for at the exchange and paying the lower withholding tax. Sellers and buyers in the market using cryptocurrencies for their sale contract will have to account for their transactions at the end of the day and pay the required lower income tax.

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