

MASTER'S THESIS INTERNATIONAL BUSINESS TAXATION LL.M

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THE ROLE OF THE REALIZATION RULE IN INCOME TAXATION

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1 INTRODUCTION

The precondition that income shall be realized before it can be subject to income tax has been a very controversial matter in the tax doctrine for over the past years. Under the realization requirement, an accrued gain or loss is not taken into consideration for income tax purposes before a realization event takes place, for instance, a disposal.

The academic literature supports the idea that the realization rule is either a normative feature, that is, an attribute of the legal concept of taxable income or a rule of administrative convenience for obtaining the taxable income.

For those who embrace the normative feature of the realization, there would be no income for tax purposes before the realization event and, therefore, any previous gain would be a mere paper gain. On the other hand, there are academics that believe that the realization is just a rule of administrative convenience that indicates at what point in time the taxpayer will report the gain already obtained.

Nowadays, the academic debate over the appropriateness of the realization as a rule for income taxation has grown tremendously and there are numerous scholars defending the progressive withdrawal of the above-mentioned rule, due to inefficiencies and inequities. Although the discussion is not recent, the arguments based, *inter alia*, on the violation of the principle of equality and the continuous overcoming of practical obstacles to accrual taxation have shown strength and should be analyzed more carefully.

Despite the existence of the two above-mentioned doctrines, regarding the feature of the realization rule, the present work aims at assessing the possibility of the withdrawal of the realization requirement in both cases. As it will be demonstrated over the Thesis, assuming that the realization is an attribute of the concept of income, the argument for its abandonment is more difficult to sustain. Nevertheless, not being the realization an attribute of the concept of income, its removal shall also be scrutinized, due to all the arguments that support the overcoming of the obstacles that maintain the realization as a rule of administrative convenience.

As a result of the possibility of the withdrawal of the realization from the income tax systems, proposals such as a partial accrual tax system or a mixed system that embodies features of the realization and also the mark-to-market frame will be addressed. It is not absurd to imagine a partial accrual system, since it seems to offer many advantages. Therefore, this work aims to demonstrate why proposals of accrual taxation, even if only partial should be taken into

account by the legislators and policymakers, as submitting gains as they accrue to income taxation may provide a more comprehensive reflection of the real wealth accumulation.

1.1 Developing the Research Question

The main framework of this Master's Thesis is the role of the realization rule in the determination of taxable income. The research question and sub-questions will be followed and, thereafter, answered by a descriptive, normative and comparative approach regarding the aspects of the realization rule and its relation with income taxation.

The normative aspect of the realization rule will contribute to answers concerning its nature and purpose. The descriptive and comparative aspect of the Thesis aims at assessing the legislation of countries adopting the Continental and the Anglo-Saxon approach towards the commercial accounting, as well as the CC(C)TB (Common Consolidated Corporate Tax Base) proposal, and evaluating how the realization rule is treated in the different income tax systems and why this treatment favors the idea that the realization is just a rule of administrative convenience.

1.2 Research Question and Sub-questions

Given the above-mentioned frame, the following research question and sub-questions will be guiding this Thesis:

What is and should be the role of the realization rule on income taxation? The criteria to evaluate the role of the realization will be the ability to pay principle and the fiscal justice. If on one hand scholars argue that without the realization the taxpayer would not have an ability to pay the income tax, due to liquidity problems, on the other hand, the use of the realization as it is adopted in the current tax systems may jeopardize the principle of fiscal justice, because it may lead to differences in treatment between taxpayers, as it will be described in the further topics.

Is the realization requirement a normative feature, that is, an attribute of the legal concept of taxable income? Or is it just a rule of administrative convenience for obtaining the taxable income?

How does the realization limit the scope of legislative procedures in the structuring of the income tax system? And under which circumstances may the realization requirement be withdrawn?

Is there a possibility of combining a tax system that blends the realization with a partial Mark-to-Market taxation?

1.3 Research Design

The present work aims at providing answers to the questions elaborated in the previous item. To do so, the following topics will be addressed and analyzed:

- (i) In Chapter 2 an attempt of defining income will be made, followed by the three major concepts of income (the Schanz-Haig-Simons concept, also known as foundation concept of income, the financial accounting income and the taxable income).
- (ii) In Chapter 3 the concept of realization will be developed. Accordingly, the development of the doctrine will be addressed, as well as the two main features of the realization rule (as a normative feature, that is, an attribute of the legal concept of taxable income, or as a rule of administrative convenience).
- (iii) Subsequently, in Chapter 4, the main arguments against the realization rule will be analyzed. The chapter will demonstrate that these arguments are mostly based on the fact that the effects the realization rule generates are not in line with the foundation concept of income.
- (iv) And, consequently, Chapter 5 will promote the main arguments for the realization requirement. Over the past century scholars argued that realization is a rule that grants stability to the income tax systems over the world. This chapter will address the reason why this argument is put forward by the doctrine and critically analyze the practical obstacles that are responsible for the difficulty of abandonment of the realization rule.
- (v) In Chapter 6 a descriptive and comparative analyzes of different legislations of the Continental and Anglo-Saxon approach and the CC(C)TB proposal will take place.
- (vi) Furthermore, Chapter 7 will discuss a possibility of alternative systems of taxation, such as a partial accrual Tax System and a mixed Tax System that combines the realization rule with a partial Mark-to-Market taxation (retrospective taxation). The main advantages of an adoption of a system that features partial accrual taxation will be addressed.
- (vii) Finally, Chapter 8 will deliver conclusions performed throughout the Thesis.

1.4 Research Methodology

An essentially two-fold form will embody the methodology of the present work. The ultimate part of the research is literature based, specially regarding the analyses of the realization requirement (as a normative feature or a rule of administrative convenience), as well as the main arguments for and against the rule. In order to assess how the realization rule is treated on the different income tax systems, a legal comparison will be made. The research procedure will be conducted with an investigation feature, in order to analyze the information collected and evaluate and assess the alternatives regarding the role of the realization rule in income taxation.

2 AN ATTEMPT OF DEFINING INCOME

It is arguable that a scientific concept of income does not exist. Income is not a natural phenomenon, it cannot be found in nature and it is not something tangible¹. Therefore, income will necessarily be an abstraction, and uncertainties may arise whenever the premises and purposes on which the concept is based suffer some sort of variation. How income is determined will depend on the purpose of which a given definition is proposed².

In this section we will discuss the following concepts of income: (i) The Schanz-Haig-Simons Concept of Income; (ii) The Financial Accounting Income and (iii) The Taxable Income.

2.1 The Schanz-Haig-Simons Concept of Income

The model developed by Schanz, Haig and Simons can be seen as the benchmark measure of income in the field of economics. Schanz stated that in order to value the income of a person, one should look at the economic power that was accrued in a given period (that did not harm the person's capital nor reflected debts)³. In his work, Haig considered income as the money value of the net accretion in a person's economic power in a given period⁴. Simons, in its turn, defined income as the sum (i) of the market value of the goods consumed (consumption expenditure) and (ii) the change in the value of the assets held by the individual (savings) between the beginning and the end of the calculation period⁵.

1 MACDONALD, Graeme. The Taxation of Business Income. Aligning taxable income with accounting income. The Institute for Fiscal Studies. TLRC Discussion Paper n° 2. London. April. 2002. P.3.

2 ABREU, Alice G.; GREENSTEIN, Richard K. Defining Income. 11 Fla. Tax. Rev. 295. 2011. P. 299

³ HOLMES, Kevin. The Concept of Income: a multi-disciplinary analysis. IBFD Publications BV. Amsterdam. February. 2000. P. 57

4 HAIG, Robert Murray. The Concept of Income – Economic and Legal Aspects. *In*. HAIG. Robert Murray. The Federal Income Tax. New York. Columbia University Press. 1921. P.27.

⁵ HOLMES, Kevin. The Concept of Income: a multi-disciplinary analysis. IBFD Publications BV. Amsterdam. February. 2000. P. 66

As a result, the Schanz-Haig-Simons concept, also known as foundation concept of income, defines income as the increase in a person's economic power over a period⁶.

The foundation concept of income takes into account all increases in economic power (consumed and spared) and is measured using the market value on a current basis, that is, without the need of realization⁷. The logic underlying the Schanz-Haig-Simons concept of income is that the mere increase in the economic power already grants the taxpayer an access to wealth, which would make irrelevant the moment when the gain is realized⁸.

Moreover, in the last century economists in Europe designed the preservation of source doctrine, which reinforces the foundation concept of income⁹. According to this doctrine, income will only exist if the original capital is maintained. In other words, the increase in wealth that can be considered income will be assessed after all the expenses regarding a person's necessities and urgent needs is considered.

However, it is important to highlight the fact that Simons himself acknowledged the practical inapplicability of a concept of income which is based on the lack of realization¹⁰. The idea of income based on the value fluctuation in a given period may be problematic, due to the fact that, at that time, the feasibility of the evaluation of all assets on a periodic basis was questionable. Furthermore, it was also questionable that the taxpayer should be obliged to pay the tax before turning the accrued gain into cash.

As it will be addressed in the further topics, nowadays with the nonstop evolution of the capital and financial markets, the problems regarding the periodic valuation of at least some range of assets is surpassed.

2.2 The Financial Accounting Income

The financial accounting, as well as the economics science, will measure the economic phenomena according to their own premises. In other words, although accounting seeks to portray the economic substance of transactions in search of providing trustful information, it will always apply its own methods and criteria when valuating the economic data, which means that accountants may deviate from the foundation concept of income.

For a long period, accountants have been influenced by the doctrine of conservatism and prudence; therefore, income recognition was usually subject to realization, due to the

⁶ HOLMES, Kevin. *The Concept of Income: a multi-disciplinary analysis*. IBFD Publications BV. Amsterdam. February. 2000. P. 35

⁷ SHAVIRO, Daniel N. *The Forgotten Henry Simons*. 41 Fla. St. U. L. Rev. 1. 2013

⁸ See BULHÕES PEDREIRA, José Luiz. *Imposto de Renda*. Justec. Rio de Janeiro. 1971. Item 2.11 (12).

⁹ HOLMES, Kevin. *The Concept of Income: a multi-disciplinary analysis*. IBFD Publications BV. Amsterdam. February. 2000. P. 85

¹⁰ SHAVIRO, Daniel N. *The Forgotten Henry Simons*. 41 Fla. St. U. L. Rev. 1. 2013. P. 29

uncertainty regarding the measurement of unrealized gains and losses¹¹. Thus, mere changes in value of a person's assets (holding gains or losses) were not recognized until an external transaction took place. However, accounting scholars have been developing a concept of "comprehensive income"¹², which embodies holding gains and losses in its concept. This accounting model of income measurement includes mere increases in values of assets and liabilities through the calculation period, without the need of realization.

Nonetheless, despite the fact that a worldwide accounting standard still does not exist, there is a tendency towards the harmonization of accounting and financial reporting through the work of the International Financial Reporting Standards (IFRS). Therefore, this part of the work focuses on the IFRS framework.

In its definition of income, the IFRS explicitly includes unrealized gains, for instance, those gains arising from the revaluation of marketable securities and those resulting from increases in the carrying amount of long term assets¹³. The inclusions of unrealized revaluations are, nevertheless, subject to a reliable measurement with a sufficient degree of certainty. Furthermore, the IFRS incorporates principles, like the fair value accounting, which may collide with the realization rule in some situations¹⁴.

With regards to the fair value accounting in the IFRS framework, it is important to mention that the measurement basis most commonly adopted by companies when presenting their financial statements, according to the IASB, is still the historical cost, usually combined with other measurement bases. Nonetheless, in most recent standards the fair value is often adopted as a measurement basis¹⁵.

Given the fact that the IFRS framework aims at providing a faithful representation with reliability, the fair value was mainly introduced to bring meaningful and relevant information with regards to financial assets (specially derivatives), since the historical cost was not able to picture the economic reality in this case. In general, for financial instruments the market price is available and it indicates in a reliable way the value of the instrument (fair view). After the

¹¹ HOLMES, Kevin. *The Concept of Income: a multi-disciplinary analysis*. IBFD Publications BV. Amsterdam. February. 2000. P. 112

¹² HOLMES, Kevin. *The Concept of Income: a multi-disciplinary analysis*. IBFD Publications BV. Amsterdam. February. 2000. P. 127-130

¹³ ESSERS, Peter HJ.; RAAIJMAKERS, Theo.; RUSSO, Ronald.; VAN DER SCHEE, Pieter.; VAN DER TAS, Leo.; VAN DER ZANDEN, Peter. *The Influence of IAS/IFRS on the CCCTB: Tax Accounting, Disclosure and Corporate Law Accounting Concepts*. Kluwer Law International. Amsterdam. June 2009. P. 17

¹⁴ ESSERS, Peter HJ.; RAAIJMAKERS, Theo.; RUSSO, Ronald.; VAN DER SCHEE, Pieter.; VAN DER TAS, Leo.; VAN DER ZANDEN, Peter. *The Influence of IAS/IFRS on the CCCTB: Tax Accounting, Disclosure and Corporate Law Accounting Concepts*. Kluwer Law International. Amsterdam. June 2009. P. 42

¹⁵ See IAS 2, 17, 18, 21, 32, 39, 41 and also IFRS 1, 3, 4, 5.

introduction of the fair value measurement for financial assets and liabilities, it was also allowed and even sometimes required to use fair value standards for other types of assets such as investment property, biological assets and also assets and liabilities acquired in a business combination.¹⁶

It is worth noting anyhow that the degree of normative linkage between the financial accounting and the tax accounting of each country will depend on how close the accounting standards are to the legal framework of income taxation.

2.2 The Taxable Income

The determination of the income that will be subject to income tax will depend on the national tax legislation of each country. However, most of the jurisdictions have a common feature: the idea of income as an increase in wealth over which the taxpayer has complete control.

The challenges regarding the determination of the taxable income are related to the arbitration of the taxable base. The taxable base may suffer deviations as to which inflows are characterized as income, how these inflows are evaluated, which expenses are deductible from the base, the minimum time that should be considered for the calculation and also the predominance of a schedular or global tax system may influence the taxable base.

Furthermore, it is important to notice that the legislator, while designing the tax legal order, might have tried to incorporate features of the foundation concept of income and the accounting income. However, that does not mean that the concepts will always converge harmonically. Most often there will be differences between economic, accounting and taxable income, differences that usually reveal the existence of timing issues, that is, the moment in which income shall be deemed to exist.

Essentially, the economic (and also in some cases the accounting) income is derived in an earlier moment than the taxable income, given the fact that the latter is usually levied upon a realization event.

Despite the fact that most jurisdictions use the realization rule as a means of assessing the taxable income, it is important to discuss whether the realization rule is in fact an attribute of the legal concept of taxable income or if it is just a rule of administrative convenience. Depending on the result, especially if the realization requirement is deemed to be just a rule

¹⁶ ESSERS, Peter HJ.; RAAIJMAKERS, Theo.; RUSSO, Ronald.; VAN DER SCHEE, Pieter.; VAN DER TAS, Leo.; VAN DER ZANDEN, Peter. *The Influence of IAS/IFRS on the CCCTB: Tax Accounting, Disclosure and Corporate Law Accounting Concepts*. Kluwer Law International. Amsterdam. June 2009. P. 19-20

of administrative convenience, the arguments against the realization tend to be more solid and its appropriateness should be scrutinized more carefully.

3 THE CONCEPT OF REALIZATION

The realization is a rule related to the moment at which income shall be deemed to exist for tax purposes. It is considered one of the reasons of tax complexity in many countries, whereas it is also a fundamental requirement of stability of many tax regimes.

Although usually this rule is not formally enacted in most tax legislations¹⁷, it implies that the taxpayer shall only be liable to income tax when the assets are exchanged on the market. In other words, an income tax shall not be levied on mere changes in value of the taxpayer's assets. Accordingly, an accrued gain (or loss) shall not be taken into account for tax purposes until a disposal occurs (transaction in the market), at which time the asset will be exchanged for cash or other good¹⁸.

There is, however, a debate in the academic literature regarding the feature of the realization rule: if it is either an attribute of the legal concept of income or if it is just an administrative aspect of an income tax system.

On the one hand, authors who stand in favor of the imperative character of the realization argue that its role is to exclude from taxation an uncertain gain (that could not be deemed as taxable income)¹⁹ and that the income tax is linked to a realization event²⁰.

On the other hand, part of the doctrine defends that the realization rule only serves to indicate the moment in time at which the taxpayer will report the gain he had already obtained²¹, that is, the realization event does not create income; it is only a rule of administrative convenience, as a result of the impossibility of taxation of the accrued gains, in accordance with the Schanz-Haig-Simons concept of income. For this reason, these authors argue that, nowadays, in some situations, the legislator could withdraw the realization requirement, since the existence of income itself does not depend on its previous realization. Thus, legislators should seek to adapt their income tax legislation in order to align as much as possible the taxable income to the Schanz-Haig-Simons concept of income.

¹⁷ SHAVIRO, Daniel N. An Efficiency Analysis of Realization and Recognition Rules Under the Federal Income Tax. 48 Tax Law Review. 1992. P. 11

¹⁸ KWALL, Jeffrey L. When Should Asset Appreciation Be Taxed?: The Case for a Disposition Standard of Realization. Indiana Law Journal. Vol. 86. 2010. P. 79

¹⁹ See HALPERIN, Daniel. Saving the Income Tax: An Agenda for Research. 77 Tax Notes 967. 1997

²⁰ SHAVIRO, Daniel N. An Efficiency Analysis of Realization and Recognition Rules Under the Federal Income Tax. 48 Tax Law Review. 1992. P. 18

²¹ CUNNINGHAM, Noel B; SCHENK, Deborah H. Taxation without Realization: A "Revolutionary" Approach to Ownership. Tax Law Review. Vol 47. 1992. P. 741

Given the fact that the accounting concept of income is becoming closer and closer to the foundation concept of income, through the IFRS framework, for instance, and also the fact that most jurisdictions adopt the accounting result as a starting point for income taxation, it is important to understand the role of the realization rule in the taxation of income and the reasons why mere increases in the value of assets are generally not taxed until the time of disposition of the asset.

This chapter will, therefore, scrutinize the origin of the realization doctrine, as well as the possible two features that this requirement might have: as an attribute of the legal concept of taxable income or as just a rule of administrative convenience for obtaining the taxable income.

3.1 The Development of The Realization Doctrine

The realization rule appeared in the beginning of the XX Century, concomitant with the very emergence of the income tax model as we have nowadays²². Since then, it became a solid attribute of all income tax regimes.²³

Courts from many jurisdictions reasoned that income should be dissociated from the capital that generates it²⁴. Consequently, income in a legal sense should consist of only the gains that were realized through a realization event, for instance, a disposal of an asset in a market transaction.

In the United States, the Supreme Court ruled on a remarkable case, *Eisner v. Macomber*²⁵, that the imposition of the federal income tax was constrained to realized gains only. Moreover, in its ruling, the Supreme Court linked the realization requirement to a constitutional ground.

Subsequently, as most of US scholars sustain, this precedent was superseded and the realization came to be understood as a criterion of administrative convenience. Some precedents of the Court's new position are the *Brunn v. Helvering* and *Glenshaw Glass v. Commissioner*²⁶. According to this reasoning, the realization cannot be understood as an attribute of the concept of income, yet it exists only to report the point in time that the accrued gain shall be recognized for tax purposes.

²² BENSALOM, Ilan; STEAD, Kendra. Realization and Progressivity. Columbia Law Journal of Tax Law. Vol. 3:43, 2011. P. 49

²³ SCHIZER, David M. Realization as Subsidy. New York University Law Review. Vol. 73. 1998. P. 1551

²⁴ HOLMES, Kevin. The Concept of Income: a multi-disciplinary analysis. IBFD Publications BV. Amsterdam. February. 2000. P. 178

²⁵ *Eisner v. Macomber*, 252 U.S. 189 (1920)

²⁶ See SURREY, Stanley S. The Supreme Court and the Federal Income Tax: Some Implications of the Recent Decisions. III. L. Rev. Nw. U.S. 779. 1941

3.2 The Possible Normative Feature of The Realization Rule

As mentioned in the previous topics, some scholars argue that the realization is an attribute of the legal concept of taxable income. Therefore, under this doctrine, the realization would be an imperative normative feature of an income tax²⁷.

According to this reasoning, income in a legal sense cannot consist of mere increase or decrease in value of an asset. In order for a gain to be qualified as income under this doctrine it should not only be realizable but it should also be effectively realized²⁸. Thus, there would be no income in a legal sense if the putative gain is not definitely realized (through the so-called realization event).

Therefore, it can be stated that the main argument of this doctrine is based on the uncertain nature of an accrued gain, that is, the increase in value is not certain until it can be associated to a transaction. The potential reversibility of the accrued gain, in the sense that the current increase may be overcome by a future decrease, would only be surpassed by the occurrence of a transaction (realization event).

When a transaction takes place, the uncertainty of the accrued gain (which until then is considered to be only an estimate gain) is overcome. Accordingly, the parties involved in the transaction would attribute an effective 'value' to the asset and the difference between the acquisition price and the transaction price would then be considered income. In other words, in the absence of a realization event, the increase in value of an asset is only potential and it represents an uncertainty, which is incompatible with the legal certainty required by the tax law.

Hence, under the reasoning of this doctrine, the realization event is responsible for the creation of the income itself and not simply used to determine the point in time at which the accrued gain shall be reported. In other words, the realization event indicates that the changes in value of an asset are incorporated to the taxpayer's patrimony in a definitive way. One can define the realization as the necessary occurrence for the existence of the legal concept of taxable income. Some may also argue that the realization is a matter of constitutional order²⁹.

²⁷ See Joint Comm. On Tax'n, Estimates of Federal Tax Expenditures for Fiscal Years 2004-2008 (Comm. Print, 2003). 2003 TNT 247-20. Available at LEXIS, Tax Analysts File. In. SCHENK, Deborah H. A Positive Account of the Realization Rule. New York University Tax Law Review. Vol 57. 2004. p. 356

²⁸ See SELIGMAN, Edwin. Are Dividends Income? 9 Am. Econ. Rev. 517, 519 (1919). In. SCHENK, Deborah H. A Positive Account of the Realization Rule. New York University Tax Law Review. Vol 57. 2004. P. 357

²⁹ See ORDOWER, Henry. Revisiting the Realization: Accretion Taxation, The Constitution, Macomber, and Mark to Market. 13 Va. Tax Review. Vol 13. 1. 1993

However, whether the realization rule is classified as an attribute of the legal concept of taxable income will depend highly on the legislative features of each specific jurisdiction.

3.3 The Possible Administrative Feature of The Realization Rule

Notwithstanding the above-mentioned position, many scholars sustain that the realization is not an intrinsic feature of the concept of income. That is, income is earned as the increase in value of an asset occurs (in accordance with the foundation concept of income), and not when the realization event through a market transaction takes place. Although the realization is not necessary for the characterization of income under this reasoning, it is still commonly used to determine the point in time at which the taxpayer shall report the income (accrued gain)³⁰, as an administrative requirement that is convenient for the functioning of a tax system.

One may argue that the realization is a “necessary evil”, given the practical impossibility of its abdication, as it will be demonstrated with further details in the following chapters. Problems related to liquidity, evaluation and volatility end up imposing the need of the realization requirement, turning it into an administrative rule of practical convenience³¹ (although it is not linked to the definition of income itself). Some authors define realization as “the second-best model”³², given the practical impossibility of taxing mere increases in value³³. These scholars tend to advocate for the mitigation of the realization requirement with regards to certain gains, due to the gradual overcoming of the practical obstacles (such as valuation and liquidity concerns) that will be described in more detail in the following chapters.

4 MAIN ARGUMENTS AGAINST THE REALIZATION

The main arguments against the realization requirement are based on the fact that the effects it generates are not in line with the foundation concept of income. This position entails that the legislator should seek to tax the economic concept of income and the decision to use the realization rule causes, therefore, an undesirable deferral³⁴.

Scholars who defend the withdrawal of the realization from income taxation argue that the measurement of wealth should be made on a market value and, for that reason, mere increases

³⁰ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 358

³¹ SCHENK, Deborah H. An Efficiency Approach to Reforming Realization-Based Tax. *New York University Tax Law Review*. Vol 57. 2004. P. 503

³² SHAVIRO, Daniel N. An Efficiency Analysis of Realization and Recognition Rules Under the Federal Income Tax. *48 Tax Law Review*. 1992. P. 5-7.

³³ TAVARES, Tomás Cantista. *IRC e Contabilidade. Da Realização ao Justo Valor*. Coimbra. Almedina. 2011. P. 77

³⁴ LAND, Stephen. Defeating Deferral: A Proposal for Retrospective Taxation. *52 N.Y.U Tax Law Review*. 1997. P. 47

in value that generate more wealth should be considered income, insofar as they provide real benefits for its owner³⁵.

The realization would be responsible for an undesirable deferral of taxation, causing a reduction on the effective tax rate for certain types of income. An immediate consequence of the reduction of the effective tax rate would be the imposition of different treatments among taxpayers, based on the nature of the asset that generated the gain and not on the amount of income earned (which in its turn, would constitute a violation of the principle of equality in its horizontal and vertical dimensions). That is, only a certain type of income would be subject to the deferral caused by the realization.

In summary, the realization would be responsible for causing a difference in treatment between taxpayers according to the characteristics of the income earned, which is subject to income tax (capital income, such as shareholdings, is treated more favorably than labor/wage income, for instance).

Moreover, realization may cause investment distortions, since some assets are taxed higher than others and taxpayers may also use the deferral to engage in strategic behavior. Hence, this chapter aims to address more carefully each of the arguments put forward against the realization requirement.

It is important to highlight, however, that these arguments against the realization tend to have solid grounds and be more appropriate if one considers the realization requirement as a mere rule of administrative convenience and that the income is actually earned when the increase in value occurs.

Otherwise, if the realization is recognized as an attribute of the legal concept of taxable income, one might argue that this concept of income cannot be used in comparison with the foundation concept of income (which is in principle an economic concept) to justify a deferral that is only economic and not juridical, for instance. In other words, one could not consider a deferral that is a consequence of the comparison between a juridical concept of income (if the realization is understood to be an attribute of the legal concept of taxable income) and an economic concept of income (foundation concept).

4.1 Deferment of Taxation

As introduced in the previous item, most of the arguments against the realization requirement circumvent the idea that it causes a deferral of the tax payment on the accrued economic

³⁵ MCCAFFERY, Edward J. *Income Tax Law*. Oxford University Press. 2002. P. 49

gains. Taxpayers would then use the deferral to reduce the effective tax rate, given the fact that the asset would be held while it appreciates in value³⁶.

The mismatch between the time the increase in value was added to the taxpayer's wealth (foundation concept of income) and its actual taxation (through the realization event) would have the effect of reducing the effective rate on the appreciation of the asset, precisely because of the cost of money over time. Moreover, because of the deferral, taxpayers have the possibility of reinvesting the amount that would have been paid as income tax at the moment the income was economically generated, increasing, therefore, the return on their investment just by taking the advantage of the deferral option. In other words, taxpayers may reinvest the amount that would have been due as income tax, as if the taxpayer had received a government loan (equivalent to the value of income tax due) at zero rate interest³⁷.

4.2 Investment Distortions

The distortion of investment argument is directly related to the deferment of taxation that the realization rule may cause.

The taxpayer uses the realization when it is considered an advantage to do so. In other words, since the deferment may cause some assets to be taxed at a lower rate than others, a taxpayer (specially those who have diversified portfolio investments) would use the strategic trading option to hold on to the appreciated assets, while selling the depreciated ones to realize a loss³⁸.

This event gives the taxpayer the ability to deduct his investment losses when it is convenient, while deferring the income tax on the gains, optimizing, therefore, the return on the capital income investment³⁹.

Furthermore, it is argued that the realization prevents the portfolio reallocation on the market⁴⁰. Taxpayers might hold on to their appreciated assets aiming merely at the decrease of the effective tax rate over time, although there are other investments available on the market that could generate a higher return.

Therefore, the incentive that the realization causes on holding the appreciated assets causes investment distortions that would not exist if the income tax were levied on an accrual basis.

³⁶ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 384

³⁷ KORNHAUSER, Marjorie E., *The Story of Macomber: The Continuing Legacy of Realization*. Tax Stories: An In-Depth Look at Ten Leading Federal Income Tax Cases. Foundation Press. 2009. P.94-98

³⁸ CHORVAT, Terrence R. Perception and Income: The Behavioral Economics of the Realization Doctrine. *36 Connecticut Law Review*. Vol 75. 2004 P. 105

³⁹ BROWN, Fred B. Complete Accrual Taxation. *San Diego Law Review*. Vol 33. 1996 P. 1568

⁴⁰ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 389

4.3 The “Lock-In Effect”

The “lock-in effect”, in its turn, is an underlying consequence of the deferment and the investment distortions that the realization rule may cause, since it encourages the taxpayers to hold on to the appreciated assets for a period that is beyond the optimal.

Due to the fact that the disposal of the asset entails the payment of the income tax on the accrued gains, it increases the rate of the tax. For this reason, in order for a taxpayer to dispose its appreciated assets, the return on the appreciation should be high enough to compensate the income tax that will result from the realization event. This encouragement to hold the assets just for tax reasons is the so-called “lock-in effect”⁴¹.

4.4 Economic Inefficiency

The abusive operation strategies that taxpayers may engage on by conveniently using the realization rule may cause economic inefficiency on the market. The realization may cause the deferment of income tax and it may also lead to a distortion in resource allocation, given the fact that taxpayers increase their tax planning actions.

Although the consequences of the “lock-in effect” may not be enormous, it certainly contributes to capital “misallocations” by discouraging investors to sell certain assets and investing in others, such as venture capital.

Furthermore, it is argued that the changes in the effective tax rate that the realization requirement may cause on different types of capital income tend to result in an inefficient allocation of capital. For that reason, some authors sustain that without the realization the rates of return on investments would be equal, independent of the nature of the asset⁴². Therefore, the income tax should affect as little as possible the economic decisions of investors.

4.5 Principle of Equity

To conclude the main arguments against the realization requirement, this last item will address the breach of the principle of equity caused by the realization rule.

The horizontal equity principle entails that taxpayers who derive the same income will be subject to the same amount of income tax, regardless of the source of the income⁴³ (if it is labor/wage income or capital income, for instance).

⁴¹ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 389

⁴² BROWN, Fred B. Complete Accrual Taxation. *San Diego Law Review*. Vol 33. 1996 P. 1570

⁴³ ENDRES, Dieter; SPENGEL, Christoph. *International Company Taxation and Tax Planning*. Wolters Kluwer. The Netherlands. May. 2015. P. 27

Therefore, scholars argue that the realization may cause a violation of the horizontal equity⁴⁴ given the fact that taxpayers are distinguished by reason of the nature of the income (if it arises from labor/wage or capital), since their income as a whole is not properly considered. Thus, a taxpayer who earned labor income is taxed immediately, on a periodic basis, whereas a taxpayer who earned the same amount of income from the appreciation of shares in the market can use the realization to postpone indefinitely the income tax.

The vertical equity principle is responsible for ensuring that taxpayers with a higher amount of income are taxed higher than those with a lower income (the effective tax rate should, for this reason, be higher for the wealthier taxpayers)⁴⁵. It is said, however, that the realization requirement promotes a regressive tax system, given the fact that taxpayers with higher income are more likely to detain the assets responsible for generating income that are subject to the deferral option.

Considering the consequences of the deferral over the effective tax rate, it can be stated that the tax burden is higher for taxpayers who have lower ability to pay tax (usually those who earn labor income, specially wages). As a result, a realization-based tax system would eventually undermine the principle of progressivity and the redistributive ideals⁴⁶.

5 MAIN ARGUMENTS FOR THE REALIZATION

As previously mentioned, although there are several arguments against the realization rule, different practical issues were pointed out over the last century as being responsible for the impossibility of its abandonment.

The possible explanations for the difficulties of the abandonment of the realization rule can be summarized as: liquidity concerns, valuation problems and other political and psychological issues, which will be addressed more carefully throughout this chapter.

5.1 Liquidity

Liquidity is usually pointed out as one of the main concerns of a tax system based on value fluctuation. It is argued that without a trading market transaction the taxpayer would have no ability to pay the income tax due. This statement is believed to be an issue especially with regards to assets with a thin market or those that are not easily separable (small and closely

⁴⁴ LAND, Stephen. Defeating Deferral: A Proposal for Retrospective Taxation. 52 N.Y.U Tax Law Review. 1997. P. 49

⁴⁵ ENDRES, Dieter; SPENGEL, Christoph. International Company Taxation and Tax Planning. Wolters Kluwer. The Netherlands. May. 2015. P. 28

⁴⁶ LOUIE, Mark L. Realizing Appreciation Without Sale: Accrual Taxation of Capital Gains on Marketable Securities. Stanford Law Review. 1982. p. 4.

held business or a house owned by an individual, for instance)⁴⁷. The liquidity concern focus, therefore, on the lack of cash flow that would arise if an income tax system is designed to tax mere increases in value.

Nonetheless, liquidity itself cannot be the reason why the realization requirement is essential to an income tax. Monetization cannot be the cornerstone of the problem, since many transactions in almost every tax system are taxed even if a receipt of cash does not occur. For example, accrual basis taxpayers (which is the rule adopted for most legal entities around the world) and investors in pass-through entities generally have to comply with tax duties regardless if receipts are cashed. Therefore, a result of a defaulted sale, or a sale that had its payment made in installments will trigger income taxation even if the transaction has not yet generated the necessary resource for the taxpayer to fulfill its tax obligation. Thus, it should not be necessary that the tax levied holds a direct relation with the resource arising from the transaction that triggered the taxation in the first place.

For this reason, scholars sustain that liquidity concerns can be simply treated as another transaction cost that economic operators should take into account⁴⁸. Economic operators should, therefore, plan their actions by taking into account the need to obtain resources for the tax payment of unrealized increases in value, just as they do with other taxes and costs, which are included in the calculation of an investment's return.

Another argument that should be taken into account when assessing the liquidity concern, is that some types of assets, such as shareholding of other financial instruments, might not be realized but they are certainly realizable. That is, nowadays in a high liquid capital and financial market, taxpayers who own such type of assets can easily engage in market transactions and the conversion into cash may occur immediately.

However, cash flow may be a serious issue in cases regarding taxpayers that do not own a diversified portfolio, for instance, small business (without the cash generation potential) or individual taxpayers whose only asset is hers or his home and, therefore, would have no source to finance the tax due (just the option to dispose of the one asset). Consequently, with respect to this case-scenario, the legislator could maintain the realization rule or exempt from taxation certain gains, excluding, for example, the increases in value in the one house owned by individuals and also from pensions.

⁴⁷ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 360

⁴⁸ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 362

As a result, the legislator could adopt a mixed tax system, while exempting these types of assets from the taxation without the realization (precisely those assets in which the liquidity problems may end up causing an exaggerated distortion of the economic agents decisions), giving, thus, a certain balance to the new system.

These exceptions would ensure that taxpayers with real liquidity problems could pay their taxes only when their assets were disposed of, so that only in situations where in the absence of illiquidity the tax would be levied prior to the realization event (as it will be demonstrated in the further topics, this is the idea of a mixed tax system that embodies the realization rule and also the mark-to-market precept).

5.2 Valuation

Another common argument in favor of the realization requirement is associated with the practical problems of the valuation of all assets at the end of each accounting period that an accrual tax-based system would trigger⁴⁹. Therefore, it is argued that the administrative burden of the annual valuation of all taxpayer's assets would be too high not only for the taxpayers but also for the tax authorities.

Some range of assets, such as stocks in closely held corporations, expensive artwork and jewelry, that are not usually held for trading would be difficult to value. The difficulties of the valuation of these assets are related to the lack of satisfactory criteria and also by the lack of an active market. Besides that, the value assessed for tax purposes of the asset that was not disposed may have arbitrary features and may lead to litigation disputes between the taxpayer and the tax authority.

It is worth mentioning that the valuation on a periodic basis would entail high costs not only for the taxpayer but also for the tax administration, which cannot be disregarded. The tax administration would have to expend additional resources in monitoring the valuation assessment made by the taxpayers. Moreover, the tax administration would be in a considerable disadvantage, given the fact that the taxpayers usually have no interest in revealing personal information to the tax authorities. Also for this reason, it would make little sense to adopt a new technique that is unfeasible due to the high administrative costs for both the taxpayer and the government.

Therefore, it is argued that the multiplicity of assets and the natural uncertainties as to the valuation methods would become another factor of litigation between the tax administration and the taxpayers, putting in question the reasonableness of the taxation of unrealized gains. Precisely because of this, the use of an income tax based on the realization would avoid the

⁴⁹ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 367

occurrence of such problems, proving to be in some points more practical, given the fact that only after the realization event i) the value of the gain or loss would be assured; ii) the taxpayer would be guaranteed the necessary resource to pay the tax and; iii) another potential litigation factor between the tax administration and the taxpayers would be eliminated.

Nonetheless, it is difficult to sustain that the realization requirement should still prevail nowadays. Firstly, with regards to assets such as mobile property and real estate, taxpayers could use as a reference for income tax purposes the values already paid by way of property taxes, for example. Furthermore, this evaluation is normally carried out by the tax administration on a periodic basis and with a low rate of litigation.

Secondly, financial assets that are traded on stock exchanges, for instance, can be easily valued and this information is available to the general public.

Additionally, it is important to mention that with the evolution of the accounting standards to value an asset on a mark-to-market basis and the trend towards greater harmonization of its practices worldwide through the IFRS framework, information concerning the market value of assets and liabilities appears to be easily obtainable and increasingly reliable, including for tax purposes⁵⁰.

Therefore, we think that the problems related to the valuation of assets cannot be taken as an advantage of a tax system completely based on the realization rule because those problems are surpassed for a relevant number of assets. Thus, it would not be absurd to propose a tax system that would relativize the realization requirement, due to the overcoming of valuation problems with regards to a range of assets.

5.3 Stability

It is also argued that the realization requirement could not be withdrawn due to its political stability acquired overtime⁵¹.

The realization rule would, therefore, be in line with the common knowledge that taxpayers have that income shall be taxed only when there is no uncertainty left over the accrued gains, that is, when there is no possibility that the gain can suffer a change and become, for instance, a loss. The aversion that taxpayers have to this risk would characterize the economic income (before the realization) as merely potential.

⁵⁰ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 367

⁵¹ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. P. 360

However, this reasoning by itself cannot indicate that the realization rule is an imperative requirement to an income tax system, mainly if one considers the realization a mere rule of administrative convenience and not an attribute of the legal concept of taxable income. The idea that the economic income (especially in the field of financial and capital market) provides an effective access to wealth has been gaining strength over the years. For this reason many scholars sustain that an income tax system based on the mark-to-market valuation is feasible, notably with regards to a certain range of assets and also taxpayers⁵².

5.4 “Paper Gain” Argument

The “paper gain” argument is directly related with the stability that the realization may provide. It concerns the uncertainty of the existence of the gain (increases in the assets value) before an actual disposal occurs (realization event).

Scholars defend that before the realization event the gain is merely potential and based on the estimate of an ideal transaction. The market value that is estimated before the realization event might be different from the real value of the asset at the moment of the disposal. Furthermore, the estimated gain might even turn into a loss when the realization event takes place. Therefore, estimated gains (based on a hypothetical transaction) would indicate only “paper gains”⁵³.

The ephemeral characteristic of the “paper gains” would be a strong argument against a tax system based on the mark-to-market valuation, since the certainty as to the real value of the gain, which can be stated as crucial for the imposition of an income tax, in theory would not exist. Moreover, the capital appreciation of the asset (“paper gains”) would not be sufficient to provide the taxpayer the ability to pay the tax because it does not exist in the “real world”.

Notwithstanding, the decisions of investment in the financial market are certainly guided by the estimates published by all the economic agents⁵⁴ and the mark-to-market valuation cannot be at the same time a suitable means to support an investment and not to express a taxable gain.

Moreover, tax legislations usually impose several hypotheses in which the tax must be anticipated before the occurrence of the taxable event (such as accrual basis taxpayers that generally have to comply with tax duties regardless if receipts are actually cashed). And as such, in cases of an anticipation event, the reference will always be based on an estimated

⁵² See MILLER, David S. Toward an Economic Model for the Taxation of Derivatives and Other Financial Instruments. Harvard Business Law Review Online. 2013. Vol. 3.

⁵³ SCHENK, Deborah H. A Positive Account of the Realization Rule. New York University Tax Law Review. Vol 57. 2004. P. 360

⁵⁴ SHAVIRO, Daniel N. An Efficiency Analysis of Realization and Recognition Rules Under the Federal Income Tax. 48 Tax Law Review. 1992. P. 12.

value. For this reason, a mark-to-market tax system that functions as a mere anticipation and that guarantees a full compensation of eventual subsequent losses would not be far from the existing tax law regimes.

5.5 Investment Subsidy

Lastly, scholars argue that the realization requirement may be beneficial to an income tax system, due to the fact that it actually taxes investments less than other income⁵⁵. Despite the fact that the realization rule is not analyzed as optimal in many senses, it can be considered as an effective tax incentive for investment and, therefore, an optimal policy.

Although this argument admits that the realization rule causes distortive effects it argues in favor of the positive features that these investment distortions may cause.

However, as previously mentioned, the lower income taxpayers usually do not get the ability to benefit from the realization requirement as the wealthier taxpayers. That is due to the fact that lower income tax payers usually receive income in form of wages, which are taxed on a periodic basis, while the wealthier taxpayers, normally the capital owners, can use the benefit of deferment and realizing the capital gain on their sole discretion. Thus, given the fact that the realization rule grants benefits for just a range of taxpayers, jeopardizing the principle of equity and fiscal justice, this argument loses credibility in our opinion.

6 THE TREATMENT OF THE REALIZATION IN DIFFERENT LEGISLATIONS AND IN THE CC(C)TB PROPOSAL

In countries such as France, Italy and Germany, the so-called Continental approach is the common feature with regards to commercial accounting. It can be stated that the emphasis is on the protection of the creditor and the maintenance of the company's capital. To assure these objectives the prudence principle plays a major role. This principle entitles that the business profits will have a moderate taxation, which means that they shall only be taxed once they are realized and losses will already be taken into account at the moment when there is a fair probability that they will occur⁵⁶.

Nonetheless, there are countries that adopt the so-called Anglo-Saxon approach towards the financial accounting, such as the Netherlands, Ireland and the United Kingdom. In this case, the interests of the shareholders are more significant than the creditor's. Thus, the emphasis is

⁵⁵ SCHIZER, David M. Realization as Subsidy. *New York University Law Review*. Vol. 73. 1998. P. 1552-1553

⁵⁶ ESSERS, Peter HJ.; RAAIJMAKERS, Theo.; RUSSO, Ronald.; VAN DER SCHEE, Pieter.; VAN DER TAS, Leo.; VAN DER ZANDEN, Peter. *The Influence of IAS/IFRS on the CCCTB: Tax Accounting, Disclosure and Corporate Law Accounting Concepts*. Kluwer Law International. Amsterdam. June 2009. P. 37

to provide information to the capital market based on a true and fair view (with regards to some assets). These countries have, therefore, a conservative way of determining fiscal profits where the realization principle also plays an important role.

Although the realization can be seen as an important mechanism in the taxation of income in these countries, there is not enough evidence that supports the idea that the realization is an attribute of the concept of taxable income itself, that is, that income is only created when the realization event occurs. In other words, the systems of fiscal accounting described above contribute to the idea that income is not essentially earned at the time of the realization and that the realization should be treated as rule of administrative convenience to only report the point in time at which the actual gain accrued and, therefore, it can be withdrawn in some cases.

It is important to mention that some authors in the Netherlands often criticize the great emphasis that the prudence principle receives, given the fact that it may cause a long-term deferral of the taxation of some profits, for instance, work in progress and undervaluation of assets such as real estate and goodwill⁵⁷.

Despite all the criticism against the realization rule, it is still considered as a stability mechanism in most income tax systems. Furthermore, with respect to the process towards a Common Consolidated Corporate Tax Base (CCCTB) in the European Union, the overall proposal seems to determine that profit and losses shall be recognized only when realized⁵⁸.

In essence, the European Commission (EC) re-launched, in October 2016, a Common Consolidated Corporate Tax Base (CCCTB) project in a two-step approach, with the publication of two new interconnected directive proposals on a Common Corporate Tax Base (CCTB) and a Common Consolidated Corporate Tax Base (CCCTB). The EC aims with these proposals at first introducing a Common Tax Base, through the adoption of the CCTB, and then when that would be achieved, the legislative process relating to the introduction of a CCCTB would take place. With the two-phase approach of the CCCTB implementation, the EC tends to achieve a business-friendly environment and also the improvement of the functioning of the Single Market in the European Union, not to mention the constant battle against aggressive tax planning⁵⁹.

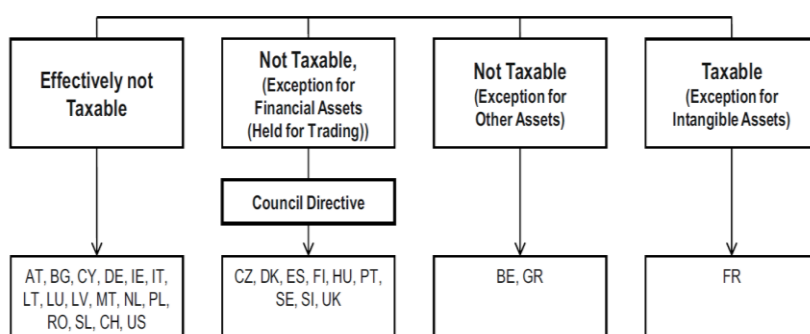
⁵⁷ ESSERS, Peter HJ.; RAAIJMAKERS, Theo.; RUSSO, Ronald.; VAN DER SCHEE, Pieter.; VAN DER TAS, Leo.; VAN DER ZANDEN, Peter. The Influence of IAS/IFRS on the CCCTB: Tax Accounting, Disclosure and Corporate Law Accounting Concepts. Kluwer Law International. Amsterdam. June 2009. P. 38

⁵⁸ Article 6. General principles. 1. In calculating the tax base, profits and losses shall be recognised only when realised: https://ec.europa.eu/taxation_customs/sites/taxation/files/com_2016_685_en.pdf.

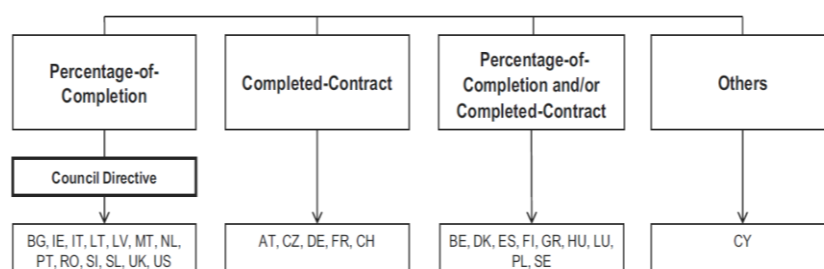
⁵⁹ See: [http://www.europarl.europa.eu/RegData/etudes/BRIE/2017/595907/EPRS_BRI\(2017\)595907_EN.pdf](http://www.europarl.europa.eu/RegData/etudes/BRIE/2017/595907/EPRS_BRI(2017)595907_EN.pdf)

Accordingly, if one analyzes at first the CCTB proposal, one could notice that there are some cases in which the realization rule suffers some sort of deviation, either through the taxation of unrealized gains or through the recognition of unrealized expenses, such as it occurs in the treatment of the financial assets and liabilities held for trading (art. 21), long-term contracts (art. 22) and the computation of the income of a controlled foreign company (art. 60).

Accordingly, the financial assets that are classified as held for trading should be valued at market value and the differences between the market value at the beginning and end of the tax year should be taken into account in calculating the tax base of that year. The figure below shows the current tax treatment in 28 different countries of financial assets held for trading⁶⁰:



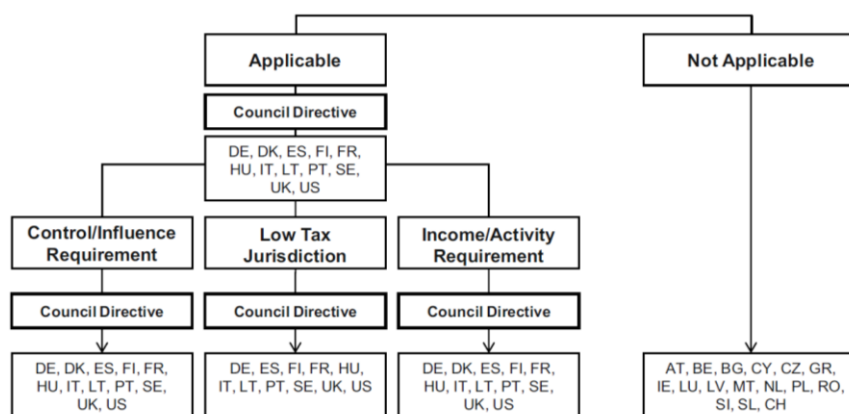
Similar logic applies to the long-term contracts, under which the revenue is recognized to the extent that the cost is incurred. Under art. 22 CCTB, the relation between the costs incurred and the overall estimated costs are taken into account in the so-called percentage of completion method (POC). The figure below also shows the tax treatment given to the long-term contracts in the same 28 countries⁶¹:



⁶⁰ SPENGLER, Christoph; ZÖLLKAU, York. Common Corporate Tax Base (CC(C)TB) and Determination of Taxable Income. An International Comparison. Springer. 2012. P. 27.

⁶¹ SPENGLER, Christoph; ZÖLLKAU, York. Common Corporate Tax Base (CC(C)TB) and Determination of Taxable Income. An International Comparison. Springer. 2012. P. 27.

With regards to the computation of the income of a controlled foreign company, art. 60 of the CCTB proposal can be seen as an anti-avoidance mechanism. Ultimately, the tax base shall include unrealized gains of a controlled foreign company. Nonetheless, elements such as the percentage of participation, the rate used in the country of domicile, as well as the nature of income earned (passive or active income) shall be taken into account when determining the taxable base. The figure below demonstrates the current tax treatment of income of a controlled foreign company in the same 28 countries used as comparison in the above examples⁶²:



It is important to mention that the three above exceptions to the realization rule contemplated in the CCTB proposal are based on different grounds, which also mitigates the argument that the realization is an attribute of the legal concept of taxable income, and thus favors the administrative feature of the realization rule. That is, these exceptions contribute to the idea that the realization is just a stability rule of tax systems used to report the point in time at which the income tax shall be levied, not being responsible for the creation of income itself.

The financial instruments held for trading, for instance, are proposed to be taxed on their market value precisely because they have this condition of being held for trading (sale) in a highly efficient and liquid market. With regards to the long-term contracts, in view of the existence of a prior transaction (the agreement between the parties), the right to receive the revenue is directly related, from a temporal point of view, with the relationship between cost incurred and estimated cost. In the case of the rules of taxation of income earned abroad from controlled foreign companies, the aim is clearly to circumvent an indefinite deferral (tax avoidance).

⁶² SPENGLER, Christoph; ZÖLLKAU, York. Common Corporate Tax Base (CC(C)TB) and Determination of Taxable Income. An International Comparison. Springer. 2012. p. 30.

Therefore, in our opinion the treatment given to the realization in the Continental and the Anglo-Saxon approach, as well as the CCCTB Proposals (CCTB and CCCTB), contribute to the idea that the realization is not an intrinsic attribute of the legal concept of taxable income, that is, it is not responsible for the creation of income itself, being just a rule of administrative convenience used to report the point in time that the income shall be subject to income tax.

For this reason, more exceptions to this rule should be developed by national legislators in order to target (as much as possible) the taxation of the income at the moment when it actually accrues, in accordance with the Schanz-Haig-Simons concept of income (foundation concept), so that the increase in a person's economic power over a period of time is subject to income taxation.

7 PROPOSED ALTERNATIVE SYSTEMS

As demonstrated in the previous topics, the abandonment of the realization could be difficult due to practical obstacles. The doctrine points out that the taxation of income before the realization event could cause liquidity problems, in so far as the tax is usually paid with the resources originated from the realization event. Furthermore, the periodic valuation of a range of assets may be challenging, either because the valuation may be burdensome or difficult to pursue. Therefore, as seen, some argue that the realization is a requirement that grants stability to the income tax systems, even if it is not considered to be an attribute of the legal concept of taxable income.

Nonetheless, it is undeniable that in our current income tax systems the taxation of income has been quite inefficient, given the fact that in most of the cases the labor/wage income is severely burdened by the income tax, due to the fact that the effective tax rate is considerably higher, while the income originated from capital is not so efficiently taxed, which in a way undermines the ideal of a fair tax system. This can be seen as a current worldwide problem, in which the reduction of the effective income tax rate takes place on the wealthiest part of the population, generally the capital owners.

Indeed, the taxpayers who own capital income tend to use structures that allow the tax deferral caused by the realization rule. Ordinary examples are: i) the establishment of legal entities, in view of the usual participation exemption regime applicable to distributed profits; ii) the investment in assets in which the value appreciation will not be taxed until the realization moment (which will happen at the sole discretion of the taxpayer), such as in the case of shareholding and real estate and; iii) the use of investment funds, which are based on

the indefinite deferral of the gains generated by them, even if the gains are a result of market transactions embodied by the fund itself.

Therefore, an income tax system based on the realization rule may be jeopardizing the fiscal justice, due to the fact that labor/wage income suffers with a higher effective tax rate. In this context, there should be a concern with the taxation of "big fortunes", an amount of wealth from which States should be more rigorous in forecasting the income taxation, in search of a more equitable means of income distribution. Consequently, the inefficiencies and the tax deferral caused by the realization plays a major role in the pressure for structural reforms in the current income tax systems.

Having that said, if the accrued gain can be safely measured by the market value; if this market value represents the most appropriate means of measuring the increase in wealth; if it also serves as the basis for transactions in a highly organized financial and capital markets and; if it is also the basis for dividends distributions, for instance; then what would be the real problem if this market value of the accrued gain is to be used for income tax purposes?

If the only barrier to this accrued taxation is the administrative feature of the realization, whose obstacles have been gradually overcome, the legislator should seek to tax the foundation concept of income (Schanz-Haig-Simons), in order to tax the income when it accrues, that is, when the real increase in a person's economic power occurred.

Accordingly, in our understanding, since the realization cannot be seen as an attribute of the legal concept of taxable income, being just a rule of administrative convenience, its gradual abandonment is possible, specially with regards to some range of assets.

In our opinion, the fact that the income is not yet realized does not prevent its owner an access to the wealth generated by the increase in value of the asset (for example, taxpayers may benefit from the money received as a loan, which in its turn is secured by the appreciated asset, while the money received will not suffer income taxation). Therefore, the distortions caused by the deferment of the taxation of the increases in value of an asset can and should be mitigated.

7.1 A Proposal of a Partial Accrual Tax System?

Over the past decades, a doctrine that advocates the abandonment of the realization rule has been gaining strength, especially in the United States, due to the constant overcoming of the traditional obstacles that justify the prevalence of the current taxation model based on the realization rule. The nonstop evolution of the financial and capital markets as well as the effective access to wealth arising from the mere appreciation of the assets and the consequent

increase in economic and consumption power resulting from this appreciation leads to a proposal of an alternative income tax system at least to some range of assets.

Scholars who defend an income tax base that includes unrealized appreciation and depreciation sustain that the realization model of taxation emerged in a historical context where the capital market was incipient and considerably illiquid. Therefore, the need of a tax system that was based on a realization event was undeniable. Income was understood as perceived only after a realization event took place in the market, for instance, a disposal, moment at which the gain was materialized in money⁶³. Others also sustain that during that time the potential gain deriving from the asset's appreciation had a risk element that could only be withdrawn when the realization event happened⁶⁴.

With the constant evolution of the financial and capital market, authors started to defend that the Schanz-Haig-Simons definition of income should prevail with regards to taxation. Operations should be considered based on their economic value, given the fact that unrealized appreciation and depreciation affects the taxpayer's net worth, and, therefore, it should be included in their tax base when it accrues, reflecting the real economic income⁶⁵.

If in the past decades people did not feel richer until their gains had been converted into cash, this situation changed with the aforementioned evolution of the markets and with the perception that income, in its economic sense, can influence not only the sense of net wealth, but also the effective access to this new economic power. In other words, like cash, unrealized gains can be included to the taxpayer's spendable income through the conversion into cash proceeds by borrowing against the appreciated assets⁶⁶.

The doctrine uses several examples to explain the idea that the appreciation of an asset can create a real sense of wealth to the taxpayer. The case of Facebook's IPO is often used because although Mark Zuckerberg chose to retain the ownership of a large portion of his shares (which made him one of the richest men in the world), nothing was paid as income tax with regards to the appreciation of the shares, due to the absence of the realization event (disposal)⁶⁷.

⁶³ MILLER, David S. Toward an Economic Model for the Taxation of Derivatives and Other Financial Instruments. Harvard Business Law Review Online. 2013. Vol. 3. p. 108-109.

⁶⁴ KORNHAUSER, Marjorie E., The Story of Macomber: The Continuing Legacy of Realization. Tax Stories: An In-Depth Look at Ten Leading Federal Income Tax Cases. Foundation Press. 2009. P. 96

⁶⁵ BROWN, Fred B. Complete Accrual Taxation. San Diego Law Review. Vol 33. 1996. P. 1565

⁶⁶ BROWN, Fred B. Complete Accrual Taxation. San Diego Law Review. Vol 33. 1996. P. 1565

⁶⁷ See MILLER, David S. The Zuckerberg Tax. The New York Times. 2012.

The main argument for an accrual tax system seems to lie in the fact that mere appreciation, besides providing an effective sense of wealth, is also capable of being translated into acts of consumption, which clearly demonstrates the taxpayer's ability to pay the income tax.

Consequently, in our opinion, the appreciation of certain assets that can give rise to effective access to wealth is sufficient to entail income taxation. Furthermore, it can also be stated that capital owners, such as Bill Gates, who owns millions of shares of a renowned company, certainly have a greater ability to pay than a salaried worker, even though they might have practiced the same acts of consumption in a given period of time⁶⁸.

Therefore, following this line of reasoning, the accrual taxation (inclusion of unrealized appreciation and depreciation as they accrue in the tax base) should be adopted for assets that are publicly traded in stock exchanges and also financial instruments that are held by large investors. Besides the fact that these assets provide effective access to wealth to their owners, these are assets with high liquidity and with simple valuation through market value ('marking them to the market' is not such a burdensome task).

With special regards to the valuation (marking the asset to the market) argument, it is important to notice once again that assets that are traded on stock exchanges have a market value that is easily accessible by the public and that this market value is taken into account by economic operators when structuring their investment decisions. Besides that, a good part of these assets are recorded in the balance sheets of the companies based on what it is also understood to be their market value, which is used as a way of raising funds, disclosure of results, payment of dividends and bonuses, etc.

Moreover, the inapplicability of the realization requirement will certainly end the deferring in effective tax rates on capital income and, therefore, it is likely that the income tax system will be more efficient in an economic sense, since an accrual taxation would lead to greater uniformity in effective tax rates. In addition, accrual taxation may reduce strategic trading (under the realization rule, taxpayers usually hold on to their appreciated assets and sell depreciated ones) and, thus, reduce an investor's ability to deduct their investment losses while deferring the tax on their gains on their sole discretion⁶⁹.

As many authors sustain, the realization rule causes the lock-in effect of some assets (the realization provides a timing option that allows the investor to hold or sell their assets in order to save taxes), reducing the portfolio reallocations of investors. Therefore, an accrual taxation could encourage taxpayers to change their investments, since there would be no reduction of

⁶⁸ SCHENK, Deborah H. A Positive Account of the Realization Rule. *New York University Tax Law Review*. Vol 57. 2004. p. 380

⁶⁹ BROWN, Fred B. Complete Accrual Taxation. *San Diego Law Review*. Vol 33. 1996. P. 1568

the effective tax rate for longer holding periods of assets, which could lead to efficient allocation of capital and also economic efficiency.

Besides the increase of economic efficiency, an accrual tax system may provide better horizontal and vertical equity than the current realization based system. That is, taxpayers with the same economic income will be taxed equally, and taxpayers with greater amount of economic income will suffer a higher tax burden than those with lower economic capacity.

An accrual tax system would require taxpayers to evaluate and report the market value of the assets at the end of each accounting period; therefore, taxpayers could also simply adjust the income earned on those assets for inflation by using an inflation rate, as it would not be fair to tax an inflationary gain. In other words, the taxpayer would readjust the income by multiplying the appreciation value of the asset by the inflation rate and then subtract that amount from the income tax base. The adjustment for inflation should also take the liabilities into account⁷⁰. This possibility of full offset for inflation can also be seen as a benefit resulting from the adoption of an accrual tax system.

It is worth mentioning that the adoption of a partial accrual tax system may lead to some implications with regards to the inclusion of losses as they accrue in the tax base. If the changes in value of assets are included in the tax base, logically the changes in values of the liabilities of the taxpayer should also be taken into account. Therefore, the system should provide unrealized gains when the liabilities decrease in value, but also for losses when the liabilities increase in value⁷¹.

However, allowing unrealized losses to offset gains may lead taxpayers to invest in risky assets so that they are more likely to produce losses and use that to maximize the associated tax reduction. Furthermore, one may argue that if an income tax were to be levied on an accrual basis, the States would have to face a decrease in tax revenue (this could lead to negative implications regarding budgetary “bottleneck”) at times when, *inter alia*, an economic crisis affects the market value of certain assets, creating thus losses.

That is a problem that governments fear with regards to accrual taxation, since it might lead to budgetary implications with the reduction of the levying of income taxes. As a solution, tax policymakers and legislators may seek to limit the allowable annual deduction on the loss offset for such unrealized losses.

Besides limiting the allowable annual deduction, legislators may also create rules to efficiently link the offset of a certain type of loss to the same source of income (for instance,

⁷⁰ BROWN, Fred B. Complete Accrual Taxation. San Diego Law Review. Vol 33. 1996 P. 1177

⁷¹ SHAKOW, David J. Taxation Without Realization: A Proposal for Accrual Taxation. University of Pennsylvania Law Review. Vol 134. 1986 P. 1163

losses originated from financial assets can only be offset against income resulting from the appreciation of financial assets and not from income originated from the appreciation of a real estate).

These loss-offset limitations could serve as a means to prevent investors from artificially generating such capital unrealized losses and also to curb strategic trading on assets that are more likely to generate losses in the future, not to mention the protection against the negative budgetary implications.

It is important to notice that a big advantage regarding the adoption of a partial accrual tax system, especially in Europe, is that it would lead to the abandonment of the current exit taxation regulations. The institute of exit taxation is adopted by Member States to preserve the integrity of the tax base of the emigrating state and also to prevent tax avoidance in cross-border reorganizations, especially when companies relocate their assets.

Exit taxes are, therefore, structured to ensure that when a taxpayer moves assets or its tax residence from one Member State to another, the emigrating State has the right to tax the unrealized gains that were created within its territory. Although it is a very controversial matter, since it restricts the fundamental freedom of movement of taxpayers within the European Union, it is also important nowadays to assure that the latent gains that arose within a Member State's jurisdiction is taxed accordingly.

The exit tax as treated in the Anti-Tax Avoidance Directive (ATAD) is especially intended to curb taxpayers who aimed at reducing their tax burden in an artificial way by shifting their tax residence and/or assets to a low-tax State⁷². Due to the fact that such abusive practices (known as aggressive tax planning) were distorting the internal market, since the State of departure lost its taxing rights over the latent capital gains that arose within its territory, the exit tax measure serves to prevent the tax base erosion in the Member State of departure.

In spite of the fact that the ATAD grants the taxpayer the possibility of immediate taxation or the deferment of the taxation until the moment of actual realization (with the assessment of the tax due being made at the moment of the migration), taxpayers could still be required to provide guarantees as a condition for the deferment option (and may also be subject to interest payment on the deferred tax). Member States could request, for this purpose, that the taxpayers concerned includes the necessary information in a declaration, which is a burdensome consequence for both the taxpayer and the tax authorities that have to inspect and assess all the information provided by the taxpayer.

⁷² See <http://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32016L1164&from=EN>

For this reason, the adoption of a partial accrual tax system where assets that are publicly traded in stock exchanges and also financial instruments that are held by large investors are taxed according to their increase in value without the need of realization would lead to the gradual abandonment of exit taxes and extra burdensome consequences for taxpayers and tax authorities acting within the European Union.

Furthermore, one may argue that the adoption of an accrual tax system will influence the functioning of the rollover reliefs as they are implemented nowadays. On a tax system based on realization, the tax due on income originated from capital gains may be postponed if a business reinvests the proceeds from the sale of an asset in the replacing of a new or better asset. A rollover relief is an incentive given by the government where the taxation is postponed until after the realization event (disposal of the asset).

Having that said, if the income taxation takes place when the mere appreciation of an asset occurs, the rollover reliefs as they are implemented nowadays would have to suffer modifications, since it is based on the moment of the realization event. However, given the fact that a rollover relief is an incentive granted by the State to the taxpayer to promote reinvestments, in our understanding, governments could consider granting other methods of rollover incentives to adapt to a partial accrual tax system.

Although it is still difficult to imagine a system based on complete accrual taxation, due to the obstacles regarding specially the valuation and liquidity of some assets (such as personal residences, consumer durables and shares of closely held corporations), a partial accrual system seems to offer many advantages and should, for this reason, be taken into account by the legislators and policymakers in order to provide a reasonable income tax reform in the national systems.

Accordingly, taxing gains as they accrue may provide a more comprehensive reflection of the real wealth accumulation⁷³, specially the increase in value of investment assets, because it would reduce in a significant way all the problems inherent to the timing issues (including tax planning) caused by the realization.

7.2 An Attempt of a Mix Tax System that Combines Realization with a Partial Mark-to-Market (Retrospective Taxation)?

As aforementioned, under a mark-to-market taxation system, unrealized gains and losses are taken into account; that is, on the last day of each year, assets are treated as if they had been

⁷³ SHAKOW, David J. Taxation Without Realization: A Proposal for Accrual Taxation. University of Pennsylvania Law Review. Vol 134. 1986 P. 1112

sold on the last day of the year at its fair market value and then reacquired at the same price⁷⁴. However, some may argue that for a range of assets this taxation system may cause liquidity and valuation issues, reason why part of the doctrine proposes a retrospective tax system that combines a mark-to-market valuation with the realization principle⁷⁵.

According to the retrospective taxation proposal, gains and losses are not taxed until a disposal occurs, avoiding, in such a way, the liquidity problem inherent in the pure mark-to-market system.

Therefore, this system seeks to reconcile the idea that income should be considered as earned at the time of the increase in value (according to the Schanz-Haig-Simons idea of income in its economic sense) to all assets, which a holding period can be determined, while it recognizes the practical impossibility of taxation prior to the occurrence of realization event.

In other words, this proposal perceives the impossibility of imposing an income tax before a transaction occurs, just as it also acknowledges that the acquisition of the income is when the gain actually accrues to the taxpayer.

Hence, it recognizes that the taxation at the moment of realization is a real deferment in the income tax and that the consequences of this deferment should be accounted by the taxpayer⁷⁶.

The taxation upon realization, under this doctrine, is considered to be a zero interest government loan from the State to the taxpayer, due to the mismatch between the moment of the real accrual (increase in value of the asset) and the income taxation. Thus, this deferment benefit caused by the realization should be mitigated by the imposition of an interest rate remuneration on the tax that should have been paid at the moment when the income was earned; when it was actually accrued.

Consequently, the incentives that most investors nowadays have to hold on to their appreciated assets and defer the income tax on the unrealized gains would disappear, to the extent that the tax would be due as if the realization had occurred on an annual basis.

Nonetheless the two above-mentioned hybrid tax systems proposals, it is important to mention that the realization rule could still be considered the best option for some range of assets, such as the so-called 'personal assets'.

⁷⁴ LAND, Stephen B. Defeating Deferral: A Proposal for Retrospective Taxation. 52 N.Y.U Tax Law Review 45. 1997 P. 59

⁷⁵ See CHORVAT, Terrence R. Perception and Income: The Behavioral Economics of the Realization Doctrine. 36 Connecticut Law Review 75. 2003 P. 94

⁷⁶ See LAND, Stephen. Defeating Deferral: A Proposal for Retrospective Taxation. 52 N.Y.U Tax Law Review 45. 1997.

Those who advocate this theory sustain that the market value (based on the assets appreciation during time) tend to distance itself from the subjective value that is attributed to those assets by its owners. That is, the market value would not be the best expression of the benefits created by the asset.

An example given by the doctrine is the existence of two different albums of travel photos taken by two different families, in which the first album reveals photos that were taken by a professional photographer and the second album reveals photos taken by one of the family members without any specific technical skills. Despite the obvious difference in the quality of the photos, it is stated that both albums have the same subjective value for each of the family who holds them.

On the basis of this example, it would be intuitively wrong to tax the family possessing the first album more heavily, just because the album has a greater market value, due to the professionalism it embodies⁷⁷.

Furthermore, it is argued that the exclusion of the personal assets from the mark-to-market taxation would be in line with the progressivity ideal of the tax system, since investment assets would be taxed in a more burdensome way and also by the fact that those assets are usually held by wealthier taxpayers with more ability to pay income tax.

Notwithstanding, as aforementioned, a mark-to-market system seems to offer many advantages for a range of assets and should, therefore, be taken into account by the legislators as a means of taxing the income in accordance with the foundation concept of income, that is, at the moment when the gain accrues, even though it respects the time of the realization event with regards to the levying of the tax.

8 CONCLUSIONS

As demonstrated throughout the present thesis, there has been a considerable debate in the academic literature with regards to the appropriateness of the realization rule in determining the taxable base of the income tax. Under a pure realization based income tax, an accrued gain or loss shall only be taken into consideration for income tax purposes when a realization event, such as a disposal, occurs.

The academic literature suggests that the realization rule may have either a normative feature, that is, the realization should be considered as an attribute of the legal concept of taxable

⁷⁷ See BENSALOM, Ilan; STEAD, Kendra. Realization and Progressivity. Columbia Law Journal of Tax Law. Vol. 3:43, 2011.

income, or an administrative feature, being the realization just a rule of administrative convenience, due to the practical impossibilities of taxing an accrued gain.

According to the first doctrine, there would be no income in a legal sense before the realization event. Any previous increases in value of an asset should be treated as paper gains, given the fact that until the occurrence of the realization event these gains are reversible and therefore cannot be measured safely, which makes the realization an intrinsic feature of the concept of legal taxable income, responsible for creating the income itself.

Nonetheless, under the reasoning of the second doctrine, the realization is just a rule of administrative convenience, due to the practical impossibility of taxing the gains at the moment they actually accrue. These scholars sustain that the realization is not an intrinsic feature of the concept of income and income itself should be considered as earned at the moment in which it actually accrues, that is, when the increase in value of the asset occurs (in accordance with the Schanz-Haig-Simons concept of income) and not when a market transaction takes place.

A brief analysis made of the treatment of the realization in the countries adopting the Continental and Anglo-Saxon approach, as well as in the CC(C)TB proposal shows that the realization is usually a means to assure the prudence principle with regards to income taxation. Although these countries and also the CC(C)TB proposal have a conservative way of determining the taxable base for income tax purposes, which the realization plays a very important role (gains are taxed only at the actual moment of realization), the idea that the realization is an attribute of the concept of taxable income is hard to sustain.

The CC(C)TB proposal itself features cases that can be regarded as exceptions to the realization requirement. The realization suffers some sort of deviation, either through the taxation of unrealized gains or through the recognition of unrealized expenses, such as it occurs in the treatment of the financial assets and liabilities held for trading (art. 21), long-term contracts (art. 22) and the computation of the income of a controlled foreign company (art. 60). For this reason, in our opinion, the realization cannot be responsible for creating the income itself, being just a rule of convenience to determine the point in time at which the gain will be subject to income tax.

Nevertheless, as exposed in this work, problems regarding mostly the valuation of the increases in the asset's value and the liquidity issue that accrual taxation may cause ended up given a stability component to the realization in most income tax systems. Although the stability component is a strong argument in favor of the maintenance of the income tax systems as they are nowadays, in our opinion the realization cannot be considered as an attribute of the legal concept of taxable income.

Arguments were developed throughout the work to demonstrate that the main effects caused by the realization are not in line with an ideal concept of income (Schanz-Haig-Simons) and that its use may lead to economic inefficiencies and also inequality between taxpayers, due to the fact that under the realization rule they are usually distinguished by reason of the nature of the income earned.

To begin with, the most prejudicial effect that the realization causes is the deferment of the tax payment on the accrued gains. The mismatch between the point in time at which the increase in wealth occurs and its actual taxation (after a realization event) leads to a deferral of the tax and, consequently, to a reduction in the effective tax rate of certain types of income (mostly income originated from capital).

As a reaction to the reduction of the effective tax rate on capital income, taxpayers are treated differently, due to the fact that wages are taxed on a periodic basis, without the deferral option, while capital owners have a sole discretion as to when they should realize the gain and pay the income tax. Furthermore, the realization causes investment distortions, since investors can hold on to their appreciated assets and use the deferral option given by the realization rule to engage in strategic behavior such as tax planning.

Notwithstanding, there are several practical issues pointed out by the doctrine over the last century that emphasize the stability of the administrative rule of income realization and also the difficulty of its abandonment.

The most common explanations for the maintenance of the realization as a rule of administrative convenience are: i) liquidity concerns, since there is a general understanding that without a realization event the taxpayer would have no resource and ability to pay the income tax; ii) valuation problems, due to the fact that many assets could not be subject to a periodic valuation and if they could the valuation would be burdensome for both the taxpayer and the tax administration; iii) political issues regarding the stability that the realization had acquired overtime and the common knowledge that there is no certainty with regards to the actual value of the asset/gain before the realization event takes place, that is, the accrued gains would characterize only a paper gain before the actual disposition of the asset.

However, these practical obstacles for the withdrawal of the realization are being gradually overcome with the constant evolution of the capital and financial markets. In other words, nowadays, it is difficult to argue that in the moment of actual income accrual the taxpayer does not have real benefit of the gain and that the accrued gain cannot be measured safely on a mark-to-market basis. Moreover, as demonstrated throughout the thesis, the market value is indeed an appropriate means of measuring the increase in wealth, since it serves as a basis for

many other transactions (such as dividend distributions, etc.) in a highly organized capital market.

Having that said, the legislator should rely on the foundation concept of income (Schanz-Haig-Simons), in order to aim at taxing the income at the actual moment of accrual and avoid the distortions caused by the deferment that the realization implies. The time in which the real increase in a person's economic power should be, therefore, taken into account for income tax purposes.

Nowadays, the mere appreciation of certain types of assets, besides providing its owner an effective sense of wealth, is also capable of being translated into acts of consumption, which clearly demonstrates the taxpayer's ability to pay the income tax on the accrued gains. As a result, legislators and tax policymakers should adopt a partial accrual system. In other words, they should seek to include unrealized gains and losses as they accrue in the tax base.

With regards to the inclusion of unrealized losses, in spite of the fact that governments fear budgetary losses, to the extent that an economic crisis, *inter alia*, might affect the market value of the assets and also that taxpayers may use the offsetting of losses as an incentive to engage in investment of risky assets that are more likely to produce losses and maximize their tax reduction, governments may still limit the annual allowable unrealized loss deduction to categories of loss/income to prevent this issue.

This system should, however, be partial because it should affect only assets that are publicly traded in stock exchanges or financial instruments that are held by large investors, since these are assets with high liquidity and simple valuation through market value.

Another attempt of combining the realization with the mark-to-market concept is the retrospective taxation. In this case the gains and losses would also be valued and taken into account for tax purposes and the last day of each year, however the effective payment of the tax would only take place when a disposal (market transaction) occurs. This mix system seeks to treat all assets equally and also tends to reconcile the idea that income should be considered as earned according to the foundation concept, while it also recognizes the practical impossibility of taxation prior to the so-called realization event.

The deferment caused by the timing difference between the actual accrual and tax payment should be then mitigated by the imposition of an interest rate remuneration, that is, taxpayers would have to remunerate the States on the tax that should have been paid at the moment when the income was effectively earned (the moment of which the increase in value of the asset occurred).

As a consequence, taxpayers would have fewer incentives to hold on to their appreciated assets. Moreover, the taxation on an accrual basis, even if partial, would bring more fiscal justice, since all types of income (labor/wage and capital, for instance) would be taxed on an annual basis, without being deferred in time.

Especially in Europe, the adoption of a partial accrual tax system could lead to the advantage of the abandonment of the exit taxation measures. Since the taxation would occur already when the gains accrue, the emigrating State would not lose its tax power due to the migration of a company or transfer of assets. Furthermore, taxpayers and also the tax administration would not have to deal with burdensome measures regarding the assessment, payment and inspection of the exit tax.

As demonstrated throughout the present thesis, the adoption of a partial accrual tax system may offer many advantages because taxing the gains as they accrue provides a more comprehensive reflection of the real wealth accumulation and reduces in a significant way all the problems inherent to the timing issues that the realization rule entails, specially the tax deferral that capital owners constantly engage in.

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