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MEASURING ACCOUNTING CONSERVATISM IN FINANCIAL REPORTS: A COMPARISON BETWEEN FRANCE AND THE UNITED KINGDOM

Bilal KIMOUCHE[a*]

[a)] *Département des Sciences Financières et Comptabilité, Université 20 Août 1955, Skikda, Algeria*

Abstract

Accounting conservatism is necessary for more reliability and verifiability in financial reports. Studies have reported mixed results concerning the comparative level of conservatism across countries, especially the celebrated comparison between the common law and code law countries. Therefore, this study is an attempt to reinvestigate accounting conservatism in French and UK companies, using 110 French companies and 105 UK companies during the period 2011-2019. Accounting conservatism was measured depending on the asymmetric accruals-to-cash flows because it does not rely on market information and its fluctuations. The results document a greater level of conservatism in UK companies compared to French companies, which confirms the findings of several previous studies concluding that companies in common law countries are more conservative than those from code law countries. The results of this study have many implications for different parties affecting the financial information environment, especially auditors who must continuously monitor conservatism practices in financial reports to maintain an adequate level.

Keywords: Accounting conservatism, Accounting accruals, Cash flows from operations, Common law countries, Code law countries
JEL Classification: D82, D86, M40, M41

[*] Corresponding author, **Bilal KIMOUCHE** – b.kimouche@univ-skikda.dz

1. Introduction

For many decades financial reporting quality has been considered the main objective of financial reporting (Kimouche, 2021a). However, standards-setting authorities did not provide any specific measure of financial reporting quality; they only proposed a set of qualitative characteristics for useful financial reporting (Kimouche, 2021b). Faithful representation is a fundamental component of that set, which means that financial reports are accurately and fully reflect the condition and reality of the company (IASB, 2018), requiring managers to adopt conservative accounting practices to maintain the reliability and verifiability of accounting information. The adoption of conservatism in accounting was the result of accounting scandals that accompanied the economic crises since the great depression of 1929 (Kimouche, 2020). The emergence of accounting conservatism was a reaction to the increase of manipulation in financial reports due to the available accounting flexibility and aggressiveness that is usually used opportunistically by managers (LaFond and Watts, 2008).

Accounting conservatism is useful for minority shareholders, creditors, regulators, and the whole company (Xia and Zhu, 2009). Studying accounting conservatism consequences and its determinants will be beneficial for users of financial reports and standards-setting authorities (El-Bannany, 2017). According to Fatchan and Widagdo (2021), accounting conservatism is adopted by managers to respond to several requests of different stakeholders (debtors, holders, capital investors, auditors, other contracting parties, regulators). Measuring accounting conservatism is important for financial reporting quality since both the excessive weak and high level can distort the quality of financial reporting (Kimouche, 2020).

Literature argued that accounting conservatism level differs according to many factors, the most eminent those related to the country's characteristics since accounting conservatism is often used as an attribute to classify and compare accounting practices of countries. In this context, literature has distinguished between the common law countries (Anglo-Saxon) and code law countries (continental European) that present very distinct accounting models (Nobes and Parker, 2020). Literature has documented several aspects as sources of accounting difference between the two models, such as social and cultural values, investor protection, control level, financing policy, governance systems, etc.

Even though the explanations provided by the literature, the results about the comparative level of accounting conservatism between the common and code law countries are mixed. A group of studies concluded that local GAAP in code law countries was more conservative by nature compared to accounting practice in common law countries, which is more aggressive, while the shift toward the IFRS has reduced the level of accounting conservatism in financial reports (García Lara and Mora, 2004; Brouwer, 2009; Clarkson et al., 2011; André and Filip, 2016). However, other studies concluded that accounting practice in common law countries is aggressive by nature compared to local GAAP in code law countries, while companies in

common law countries are more conservative in some aspects since the extension of stakeholders in code law countries reduces the need for conservatism (Ball et al., 2000; García Lara, 2003; García Lara, Osma, and Mora, 2005; Pereira, 2020).

This paper is a part of that trend of research; it attempts to reinvestigate accounting conservatism in code law and common law countries depending on companies from France and the UK as dominants countries of two accounting models, respectively. The study included 110 French listed companies and 105 UK listed companies, during the period 2011-2019, using the asymmetric accruals-to-cash flows model of Ball and Shivakumar (2005) to measure accounting conservatism. The results indicate that the model of study has more explanatory power in the UK than France, suggesting a higher level of accounting conservatism in the UK companies when compared to French companies. The results of this study are important because they provide additional empirical evidence about accounting conservatism practices in different environments, and they have many implications for the actors related to the financial information process.

The remainder of this paper is structured as follows: Section 2 summarizes the literature review; Section 3 presents the method and materials; Section 4 discusses the results; and finally, Section 5 contains the conclusions.

2. Literature Review and Hypotheses

2.1. Accounting conservatism concepts

Conservatism (prudence) is a controversial concept in accounting that is seen as an accounting convention, rule, or constraint. However, after the emergence of conceptual frameworks in financial accounting, conservatism has been considered an attribute of reliability (faithful representation). Accounting conservatism is among the fundamental concepts of the conceptual framework for financial reporting (IASB, 2018); it is used to justify the adoption of several accounting policies such as impairment and provisions.

Accounting conservatism is the anticipation of all losses without anticipating any profit (Bliss, 1924), especially under uncertainty and risk situations. Accounting conservatism occurs when managers impose a high verification in recognizing good news versus a low verification in recognition of bad news (Basu, 1997). Therefore, losses are more quickly included in accounting earnings than gains leading to an asynchronous recognition of losses and gains (André and Filip, 2016). Therefore accounting conservatism is also known in the literature as "timely loss recognition" or "asymmetric timeliness of earnings".

Givoly and Hayn (2000) described accounting conservatism as a selection between accounting policies to minimize earnings by slower recognition of revenues against faster recognition of expenses and lower valuation of assets against a higher valuation of liabilities. According to IASB (2018), conservatism as the practice of caution when making judgments

under situations of uncertainty can help managers to achieve neutrality in applying accounting policies and thus achieving faithful representation of financial reports.

Accounting conservatism is a tool to ensure that the uncertainty and risks related to business activities have been sufficiently taken into account in financial reports through the adoption of less optimistic measures or estimates. This can be achieved by recognizing any potential losses without any potential gains to improve the faithful representation of financial reports. Consequently, conservatism is the selection of accounting policies and adoption of estimates that underestimate assets or overestimate liabilities, leading to an underestimate of equity book value (Wolk et al., 2013). Consistent with that definition, García Lara (2003) concluded that the balance sheet conservatism bias arises due to the wide use of historical cost and the non-recognition of certain intangible assets.

2.2. Conditional and unconditional accounting conservatism

The literature identified two forms of accounting conservatism, unconditional and conditional, which differently affect financial reports. Unconditional (news-independent or ex-ante) conservatism is frequent and causes a permanent decline in the company's book value limiting the recognition of any internally generated goodwill, thus it requires using some specific accounting policies, such as direct expensing of internally generated intangible costs, accelerating the amortization of fixed assets (Fatchan and Widagdo, 2021). Conditional (news-dependent or ex-post) conservatism takes into account the economic new information and more relies on the economic environment in which the company is operated (Ball et al., 2013). Conditional conservatism is more temporarily adopted (Ruch and Taylor, 2015) and transitory in which favourable circumstances are not recognized; while unfavourable circumstances must be recognized even if they are not realizable (Neag and Maşca, 2015).

Unconditional conservatism is an independent approach of financial reporting that tends to underestimate revenues (gains) and assets and overestimate expenses (losses) and liabilities without relying on any justifiable economic event. However, under conditional conservatism, revenues and assets underestimate, and expenses and liabilities overestimation rely on a justifiable economic event (El-Bannany, 2017). Additionally, Unconditional conservatism is an accounting rule required for more reliability and faithful representation in financial reports; it is applied consistently and regularly without the occurrence of any specific events (Bryan et al., 2021). Thus unconditional conservatism is independent of bad or good news. However, conditional conservatism depends on economic events, which convey bad news that must be recorded in financial reports, without reporting any similar good news (Bryan et al., 2021).

2.3. Accounting conservatism explanations

Jain et al. (2020) stated that literature has investigated the level of accounting conservatism and proposed several explanations; the most prominent are the country-level institutional differences and company-specifics. In the same context, Fatchan and Widagdo (2021) distinguished between two research streams, accounting conservatism consequences at the company and country level. They stated that few studies have explored accounting conservatism at the country level, and most of them have focused on conservatism determinants. In this context, many aspects have been examined as potential determinants of accounting conservatism, like legislation, institutions, social values, national culture, and accounting system as country-specific explanations, as well as company-specific explanations such as control, governance, external audit, investments risks, etc (Salter et al., 2013; Ruch and Taylor, 2015; Neag and Maşca, 2015; El-Bannany, 2017). Regardless of the previous classification of conservatism explanations, some studies suggested that conservatism can be fully explained through accounting regulation, contracting, litigation, and taxation (Ahmed et al., 2002; Watts, 2003; Ball et al., 2008).

2.4. Accounting conservatism company level explanations

At the company level, accounting conservatism is a tool for corporate governance that can minimize information asymmetry between stakeholders. Conservatism is a constraint on opportunistic behaviours of managers to manipulate financial information and their aggressive accounting practices to report excessive optimistic financial performance because it can restrict any discretion for managers and their subjective judgments (LaFond and Watts, 2008). According to Ball et al. (2000), the overestimation of assets or earnings is more dangerous than their underestimation in terms of potential litigation and penalties. Bushman and Piotroski (2006) documented that more conservative accounting is accompanied by a higher quality of judicial systems, a high level of public bonds and a spread ownership structure. However, El-habashy (2019) adopted the inverse explanation, suggesting that corporate governance is a means to maintain the adoption of accounting conservatism.

In addition, accounting conservatism is a means to produce accounting information used later as a basis for contracts; conservative accounting numbers can mitigate agency costs and facilitate the monitoring of contracts (Watts 2003; Ball and Shivakumar, 2005). Conservatism can be explained by the information asymmetry among shareholders and creditors since a higher level of debt compared to equity requires a greater level of conservatism in financial reports (Ahmed et al., 2002; Watts, 2003). In this context, Mousa (2014) documented an important role of accounting conservatism in decreasing cash dividends for holders and monitoring the problems arising from agency contracts.

According to Watts (2003), accounting conservatism is a means to ensure the efficiency of agency contracts by limiting any wealth transfer from the debtors towards the shareholders (dividends) or managers (compensation) and reducing litigation and political costs. Conservative accounting practice can also reduce tax payments via constraining any actions causing the overstatement of earnings and net assets. In addition, conservatism is consistent with the going concern assumption in accounting, as it is a tool to preserve the company's value in the long term.

Recently, some studies proposed other explanations for accounting conservatism, such as Hsieh et al. (2019) and Hassan (2021) who explained conservatism through the business strategy, suggesting that financial reports in prospector companies are more conservative. Bornemann (2018) suggested that with higher book-tax conformity conditional accounting conservatism is used as a tool for tax evasion; he found a positive association of accounting conservatism with future tax rates. According to Xia and Zhu (2009), standard-setting authorities tend to prefer accounting conservatism to reduce political costs arising from political pressure and public control; it is also a tool to protect investors' interests.

On the other hand, accounting conservatism can distort the relevance and faithful representation of financial reporting and reduce its quality, leading to a higher informational asymmetry of contracts, more financial constraint against additional external funds, thus the increase of capital cost (Wronski and Klann, 2020). Bryan et al. (2021) indicated that accounting conservatism can be used to manipulate earnings since they documented that companies rely on excessive conservatism when accounting for doubtful accounts to attain the target earnings. For these limitations, the 2010 Conceptual Framework for Financial Reporting has excluded conservatism as an attribute of reliability because IASB concluded that it could be redundant and inconsistent with neutrality and substance over form. However, conservatism has been reinstated in the 2018 framework with further explanations taking into account the visions of different stakeholders (IASB, 2018).

2.5. Accounting conservatism country level explanations

As previously mentioned, the literature has distinguished between two groups of countries in terms of conservatism, the common law and code law countries. There is a long tradition of conservative accounting practices in code law countries, where the debt market is a major source of financing, hence conservatism is a way for protecting the primacy of creditors' claims over shareholders' claims (García Lara and Mora, 2004; Hellman, 2008). Financial institutions as main providers of funds in code law countries also require reducing the equity value (García Lara, 2003). Contrarily, many other studies argued that companies in common law countries exhibit high conditional conservatism as they operate in more developed stock markets under higher levels of investor protection and litigation risk. While, companies in code law countries

operating under larger debt markets exhibit higher unconditional conservatism (Ball et al., 2008; Mora and Walker, 2015).

García Lara (2003) attributed the differences between common and code law countries in terms of accounting conservatism to the distinct characteristics of accounting systems and different economic roles of financial statements regarding the litigation risk faced by auditors and managers. Additionally, governance in code law countries focuses on stakeholders leading to more politicization and a request for less volatility in financial information and thus more discretion than in common law countries where governance focuses on shareholders (Ball et al., 2000; Leuz et al. 2003).

Literature has analyzed a more focused set of countries in Europe comparing the level of conservatism in European common law countries against European code law countries and provided mixed results. Ball et al. (2000) explored the relative conservatism in common law countries compared to the code law countries over 1985 to 1995. They showed that companies in common law countries adopt a higher level of accounting conservatism than those in code law countries since the extension of stakeholders group in code law countries decreases the information asymmetry leading to less demand for conservatism.

García Lara (2003) examined accounting conservatism level in European companies across eight countries (Germany, France, Belgium, Spain, Italy, the UK, the Netherlands and Switzerland). He documented the existence of balance sheet conservatism as a persistent understatement of the equity book value compared to the market equity value. He also recorded earnings conservatism bias expressed by an asymmetric recognition of good and bad news in earnings. Moreover, he observed high levels of balance sheet conservatism and low levels of earnings conservatism bias in the continental European countries compared to the Anglo-Saxon European countries.

García Lara and Mora (2004) compared the common law countries with code law countries in Europe regarding accounting conservatism. Except for Germany, they did not find any significant differences. García Lara, Osma, and Mora (2005) found that after controlling for discretionary accruals, accounting conservatism declined in code law countries. They concluded that earnings conservatism is more explicit in common law countries, and balance sheet conservatism is more explicit in code law countries. While Ferreira et al. (2007) suggested that British companies are more conservative than Portuguese and German companies.

Brouwer (2009) explored accounting conservatism in European companies from 1991 to 2005. He showed a decreased level of conservatism over time with significant differences between European companies, especially after the IFRS adoption. Clarkson et al. (2011) showed that the IFRS adoption has impacted the financial reports whether in code or common law countries, suggesting that local GAAP in code law countries was conservative by nature. Salter et al. (2013) investigated several societal values as an explanatory factor for cross-

country differences in accounting conservatism using 89,481 firm-year observations over the period 1989-2006 from 22 countries. After controlling for legal and financial institutional variables, they showed a higher level of accounting conservatism in countries with higher conservative societal and accounting norms.

Hu et al. (2014) examined whether accounting conservatism can enhance the corporate information environment. Using the Basu (1997) model, they found a positive association between accounting conservatism and the company information improvement in 43 countries. They suggested that the conservatism role is more explicit in countries with lower protection of private property rights. André and Filip (2016) documented a decrease in accounting conservatism after the IFRS adoption using 2,477 companies from 16 countries, more specifically in France and Germany as code law origin countries. Moreover, they found that accounting conservatism has declined in countries with remarkable debt markets and less developed share markets and countries with high book-tax conformity. They also showed that the institutional and legal settings disappear after the IFRS mandatory adoption.

An (2017) investigated earnings quality in the Korean listed companies over 1995 to 2006, using four proxies for earnings quality, including accounting conservatism. The results indicated a lower earnings quality in the Korean listed companies compared to developed countries except for accounting conservatism. Li et al. (2018) explored earnings conservatism in light of the accounting reforms of 2001 and 2007 in China using 24,186 firm-year observations during 1998-2013. Their results indicated that conservatism has improved after the reform of 2001, while it decreased after 2007's reform. Barhamzaid (2019) explored the effect of IFRS adoption on unconditional accounting conservatism in China. Using 2,705 companies over the period 1996-2017, he found a significant diminution in unconditional conservatism after the IFRS adoption in China since 2006.

Wronski and Klann (2020) tested the effect of the cultural dimensions of Hofstede (2017) on accounting conservatism. Using 54,484 firm-year observations from 32 countries during the period 2010-2016, they showed an effect of national culture on accounting conservatism. Cerqueira and Pereira (2020) studied the impacts of economic conditions, institutional factors and IFRS adoption on accounting conservatism. Using 4,839 companies from seventeen European countries during the period 1998-2018, they indicated that accounting practice is conservative in Europe as a whole with a more conservative accounting practice in common law countries and a decrease in accounting conservatism after the adoption of IFRS.

The previous studies have treated the various aspects of comparative accounting conservatism, including determinants, consequences, and sources of difference between countries. Previous studies have also used several measures of accounting conservatism, including the asymmetric timeliness of earnings, negative accounting accruals, and market-to-book ratio. This study differs from previous studies in two aspects; it investigates the comparative accounting conservatism in France as a pole of the code law accounting model

and the UK as a pole of the common law accounting model. The study uses the model of asymmetric accruals-to-cash flows (Ball and Shivakumar, 2005) to measure conservatism, which has been ignored by the previous studies even though its reliability since it excludes the market information and its fluctuations. To attain the objective of this study, we start from the following hypothesis:

Hypothesis: Accounting practice in UK companies is more conservative than accounting practice in French companies.

3. Method and Materials

3.1. Data collection

This study used data from French and UK companies for nine years (2011-2019). Data concerns 110 French listed companies, and 105 UK listed companies, thus a total of 990 firm-years from France and 945 firm-year observations from the UK. For that, we selected companies from the major stock market indexes, including CAC All-Tradable for France and FTSE All-Share for the UK. However, the required financial data have been collected directly from the financial reports available at the E-sites of companies. For that, we excluded any company with unavailable at least a one-year financial report. Additionally, financial companies were excluded due to the particularities of accounting for financial transactions, where cash flows and accounting accruals are differently reported.

3.2. Accounting conservatism measurement

Literature proposed several measures for accounting conservatism, including asymmetric timeliness of earnings (Basu, 1997), negative accounting accruals (Givoly and Hayn, 2000), hidden reserves (Penman and Zhang, 2002) and market-to-book ratio. However, we used the asymmetric accruals-to-cash flows (Ball and Shivakumar, 2005) because it does not rely on market information and its fluctuations and takes into account both accruals and cash flows. The model of Ball and Shivakumar (2005) is a multiple linear regression that relates cash flows from operations with accounting accruals as shown in Equation (1)

$$ACC_{it} = \alpha_0 + \alpha_1 CFO_{it} + \alpha_2 DCFO_{it} + \alpha_3 CFO * DCFO_{it} + \varepsilon_{it}. \quad (1)$$

Where ACC_{it} is the total accounting accruals for the period; CFO_{it} is the net cash flows from operations for the period; $DCFO_{it}$ is a dummy variable, which takes 1 if CFO_{it} is negative, otherwise 0; $CFO*DCFO_{it}$ is the net cash flows from operations multiplied by the dummy variable; α_0 is the constant; α_1, α_2, α_3 are parameters; ε_{it} is the error term.

The level of accounting conservatism is the value of the incremental coefficient α_3, the larger the value of the incremental coefficient, the high the level of accounting conservatism.

4. Results and Discussion

4.1. Descriptive statistics

Table 1 presents the results of descriptive statistics for 990 observations from France and 945 observations from UK companies. The results indicate that accounting accruals reached 23.4% and 19.2% of total assets on average in French and UK companies, respectively. It appears that French companies generate 19.9% of total assets as cash flows from operations more than UK companies that generate only 16.8%. The minimum values indicate that accounting accruals and cash flows contain negative values that are more extreme for French companies compared to UK companies.

According to the dummy variable of cash flows (DCFO), 593 observations of French companies have positive cash flows against 397 observations with negative cash flows. In UK companies, cash flows of 551 observations are positive versus negative cash flows for 394 observations. The standard deviation shows that data of UK companies are more dispersal than French companies. Comparing the variables in terms of dispersion, it appears that accounting accruals are the most dispersal, then cash flows and dummy variable, respectively. Finally, the Jarque-Bera statistic is not significant, so the data distribution for all variables is not normal both in France and the UK.

Table no. 1: Descriptive statistics for variables

	French companies					UK companies				
	ACC	CFO	DCFO		CFO*DCFO	ACC	CFO	DCFO		CFO*DCFO
			0	1				0	1	
Mean	0.234	0.199	593	397	-0.089	0.192	0.168	551	394	-0.138
Median	0.137	0.118	-		0.024	0.122	0.103	-		-0.076
Minimum	-0.502	-0.207	0		-0.136	-0.327	-0.258	0		-0.167
Maximum	0.371	0.317	1		0	0.444	0.384	1		0
Std. Dev.	0.405	0.292	0.257		0.209	0.682	0.581	0.493		0.286
Jarque-Bera	(97496)••	(40712)••	(170.94)••		(20396)••	(4887)••	(9132)••	(150.55)••		(14674)••
Observations	990	990	990		990	945	945	945		945

•• Significant at a level of 1%

Source: Author calculation.

4.2. Correlation analysis

Table 2 presents the correlation results between different variables, indicating significant relationships at a level of 1% between all variables both in French and UK companies. The relationship between accounting accruals and cash flows is strong and negative versus a weak and positive relationship between accounting accruals and dummy variable (DCFO) in the two cases. However, the relationship between accounting accruals and the multiplied dummy-cash flows variable (CFO*DCFO) is positive and medium in France, and positive and strong in the

UK. In the two cases, the relationship between cash flows and dummy variable is negative and weak, while the relationship between cash flows and the multiplied dummy-cash flows is positive and medium. Finally, the relationship between the dummy variable and the multiplied dummy-cash flows is weak, but it is negative for French companies and positive for UK companies.

Table no. 2: Correlation results

		French companies			UK companies		
		CFO	**DCFO**	**CFO*DCFO**	**CFO**	**DCFO**	**CFO*DCFO**
ACC	**Correlation**	-0.713	0.222	0.442	-0.883	0.197	0.785
	t-statistic	(-32.35)••	(7.25)••	(15.66)••	(-56.36)••	(6.02)••	(57.08)••
CFO	**Correlation**		-0.364	0.463		-0.234	0.492
	t-statistic		(-12.42)••	(37.56)••		(-7.21)••	(93.20)••
DCFO	**Correlation**			-0.267			0.141
	t-statistic			(-8.81)••			(4.28)••

• Significant at a level of 5%
•• Significant at a level of 1%

Source: Author calculation.

4.3. Univariate analysis

Table 3 shows the results of the differences test between French and UK companies regarding total accounting accruals and negative accounting accruals using the Mann-Whitney as a nonparametric test, since accounting accruals is not a normal distribution, as shown in Table 1. The results indicate that the test is not significant, suggesting the absence of any difference between French and UK companies in terms of total accounting accruals. However, the results indicate a difference between French and UK companies regarding negative accounting accruals as the Mann-Whitney test is significant at a level of 1%. Conceding the absolute value of the mean, it appears that UK companies have a higher level of negative accruals, thus a higher level of accounting conservatism than French companies.

Table no. 3: Differences test between French and UK companies regarding accruals

		ACC	NEGACC
Mean	**French companies**	0.234	-0.174
	UK companies	0.192	-0.302
Mann-Whitney U		447948.00	17053.00
Wilcoxon W		853398.00	36556.00
Z		-0.655	-3.134
Asymp. Prob.(2-tailed)		0.512	0.002

Grouping Variable: Country (France/UK).
NEGACC: the negative accruals.

Source: Author calculation.

4.4. Model estimation

Table 4 summarizes the results of model (1) when estimated using 990 observations of French companies' data. The results suggest that the model is significant at a level of 1% under the three methods, showing a medium explanatory power, which is higher under the Fixed Effects Model, then Random Effects Model and Pooled Regression Model, respectively. The parameters and intercept take closer values, which are significant at a level of 1% under the three methods, except for the dummy variable (DCFO), which is significant at a level of 5%. The parameter of multiplied dummy-cash flows variable (CFO*DCFO) as a measure of conservatism is also significant at a level of 1% under the three methods, suggesting a medium level of accounting conservatism in French companies. The Random Effects Model presents the higher level of conservatism followed by Pooled Regression Model and Fixed Effects Model, respectively.

Table no. 4: Model (1) estimation results for French companies' data

Independent variables		**Dependent variable: ACC**		
		Estimation method		
		Pooled Regression	**Fixed Effects**	**Random Effects**
CFO	**Coefficient**	-1.274	-1.264	-1.349
	t-statistic	(-26.71)••	(-26.36)••	(-28.98)••
DCFO	**Coefficient**	-0.038	-0.042	-0.039
	t-statistic	(-1.990)•	(-2.194)•	(-2.188)•
CFO*DCFO	**Coefficient**	0.477	0.465	0.575
	t-statistic	(7.423)••	(7.169)••	(9.101)••
Intercept	**Coefficient**	0.103	0.104	0.109
	t-statistic	(8.490)••	(8.542)••	(8.635)••
R^2		0.534	0.609	0.555
F-statistic		(387.75)••	(106.53)••	(422.43)••
Periods included		9	9	9
Cross-sections included		110	110	110
Observations		990	990	990

• Significant at a level of 5%
•• Significant at a level of 1%

Source: Author calculation.

The results of model (1) estimated using UK companies' data have been summarized in Table 5. As in the case of French companies, the model is significant at a level of 1% under the three methods. However, data of UK companies present strong explanatory power more than French companies, where it is higher under the Random Effects Model, then Fixed Effects Model and Pooled Regression Model, respectively. Except for the parameter of dummy variable (DCFO), which is significant at a level of 5% only under the Pooled Regression Model, the intercept and other parameters are significant at a level of 1% under the three methods. The

parameter of the multiplied dummy-cash flows variable (CFO*DCFO) indicates a high level of accounting conservatism in UK companies under the Fixed Effects Model, then Pooled Regression Model, versus a weak level of accounting conservatism under the Random Effects Model.

Table no. 5: Model (1) estimation results for UK companies' data

Independent variables		Dependent variable: ACC		
		Estimation method		
		Pooled Regression	Fixed Effects	Random Effects
CFO	**Coefficient**	-0.441	-0.434	-0.648
	t-statistic	(-7.624)••	(-7.519)••	(-13.21)••
DCFO	**Coefficient**	0.068	0.059	0.041
	t-statistic	(2.117)•	1.842	1.552
CFO*DCFO	**Coefficient**	0.609	0.614	0.384
	t-statistic	(10.06)••	(10.15)••	(7.372)••
Intercept	**Coefficient**	0.238	0.241	0.273
	t-statistic	(10.84)••	(11.01)••	(9.296)••
R^2		0.751	0.803	0.851
F-statistic		(1210.07)••	(334.41)••	(1718.20)••
Periods included		9	9	9
Cross-sections included		105	105	105
Observations		945	945	945

• Significant at a level of 5%
•• Significant at a level of 1%

Source: Author calculation.

4.5. Model selection

The hypothesis testing requires selecting the valid model from the three shown in Table 5. In the first step, we utilized the restricted F-test to determine whether the Pooled Regression Model or the Fixed Effects Model is valid. For both French and UK companies, the results summarized in Table 6 suggest that the calculated F is more than the F-critical value from the table at a level of significance of 5% and degrees of freedom (N – 1) and (N×T – N – K), which almost reached 1.30. Therefore, Model (1) must be estimated using the Fixed Effects of the Random Effects Method.

Table no. 6: The restricted F-test results

	N	T	K	R^2_{FEM}	R^2_{PM}	F'	F-critical value
French companies	110	9	4	0.609	0.534	1.55	1.30
UK companies	105	9	4	0.803	0.751	2.12	

$$F' = \frac{(R^2_{FEM} - R^2_{PM})/(N-1)}{(1-R^2_{FEM})/(N \times T - N - K)}$$

Where: N is the number of cross-sections; T is the number of periods; K is the number of estimated parameters including the intercept; R^2_{FEM} is the determination coefficient from the Fixed Effects Model; R^2_{PM} is the determination coefficient from the Pooled Regression Model; F' is the F-calculated value; *F-critical value*: is the F from F-distribution table at degrees of freedom $(N-1)$ and $(N \times T - N - K)$.

Null: Pooled Regression Model is valid.

Source: Author calculation.

Secondly, we employed the Hausman test to determine whether the Fixed Effects Model or Random Effects Model is valid. As shown in Table 7, the results indicate that the Hausman test is significant at a level of 1% for French and UK companies, which means that the Fixed Effects Method is valid to estimate Model (1) in the two cases.

Table no. 7: the Hausman test results

	French companies			UK companies		
Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Period random	90.122	3	0.000	38.734	3	0.000

Null: Random Effects Model is valid.

Source: Author calculation.

4.6. Discussion

According to the results, the Fixed Effects Method is valid to estimate the model of Ball and Shivakumar (2005) for both French and UK companies' data. The results show that the model is significant and the parameter of the multiplied dummy-cash flows significantly differs from zero, whether in French or UK companies. This provides evidence that accounting practices in French and UK companies are conservative in general, which is harmonious with García Lara (2003) and García Lara and Mora (2004) who revealed the existence of conservatism in European companies, whether from common or code law countries. The evidence corresponds with the results of Clarkson et al. (2011) who found that local GAAPs in Europe are conservative by nature.

The results indicate that the explanatory power of the Fixed Effects Model estimated using UK data is higher than that estimated using French data, and the parameter of the multiplied dummy-cash flows for UK companies is higher than that for French companies. Therefore, UK

companies present a greater level of accounting conservatism when compared with French companies, which confirms our hypothesis. This result is similar to the findings of many previous studies that showed a higher level of accounting conservatism in companies from common law countries than those from code law countries (Ball et al., 2000; García Lara, Osma, and Mora, 2005; Ferreira et al., 2007; Filip, 2016; Pereira, 2020).

The results of this study are consistent with Cerqueira and Pereira (2020) who indicated that accounting practice is conservative in Europe as a whole with more accounting conservatism levels in common law countries. This study employed the model of Ball and Shivakumar (2005), which is a conditional conservatism-based measure, so these results could a confirmation to many studies arguing that companies in common law countries exhibit a high conditional conservatism versus a high unconditional conservatism that exhibited by companies in code law countries (Ball et al., 2008; García Lara, Osma, and Mora, 2005; Mora and Walker, 2015).

The results of this study refute the conclusions of some studies arguing that a long tradition of conservative accounting practices in code law countries, where accounting conservatism is a way to protect the primacy of creditors' claims over shareholders' claims (García Lara and Mora, 2004; Hellman, 2008). This study disproves the findings of Brouwer (2009) who showed a decreased level of conservatism over time in European companies, especially after the IFRS adoption, and the findings of André and Filip (2016) who documented a decrease in accounting conservatism after the IFRS adoption by EU companies. However, these results can support the view that local GAAP in code law countries was more conservative by nature compared to accounting practice in common law countries, which is more aggressive, while the shift toward the IFRS has reduced the level of accounting conservatism in code law countries (García Lara and Mora, 2004; Brouwer, 2009; Clarkson et al., 2011; André and Filip, 2016).

Certainly, these results should be assigned to the distinct accounting and economic characteristics between the UK as a common law country and France as a code law country as stated by Nobes and Parker (2020). However, the results could be explained by the use of Ball and Shivakumar (2005) as a measure of conservatism, which is more earnings-based (conditional conservatism), and literature argued that companies in code law countries, including France, tend to practice balance sheet (unconditional) conservatism more than earnings conservatism (Ball et al., 2008; García Lara, Osma, and Mora, 2005; Mora and Walker, 2015). On the other hand, this can be seen as a methodological limitation of the study, which requires future studies using more than one measure to capture different aspects of conservatism and examine the assumption of conditional and unconditional conservatism in code and common law countries.

Moreover, accounting practice in French companies has recently shifted toward the International Financial Reporting Standards, which may have negatively affected accounting conservatism due to the flexibility characterizing the international reference. This is another

limitation of the study since the process of accounting standardization and its level in each country against the International Financial Reporting Standards has been not taken into account, as well as the study has been not controlled by any characteristic of two countries, especially the nature of accounting regulations. For that, future studies should introduce these aspects in the analyses to avoid these limitations.

5. Conclusion

Accounting conservatism is required in accounting practice due to its informative and contractual role since it is useful for minority shareholders, creditors, other debtors, regulators, and the whole stakeholders. In Addition, conservatism is a measure of financial reporting quality because it can limit the flexibility and aggressiveness in accounting practice and thus restraint accounting manipulation. Literature has attempted to study different consequences of conservatism and its determinants, distinguishing between the company-specifics and country institutional characteristics.

This study is included within that attempt by comparing the level of accounting conservatism between French and UK companies. The study has carried out using 990 firm-years from France and 945 firm-year observations from the UK that concern 110 French companies and 105 UK companies during the period 2011-2019. Accounting conservatism was measured using the asymmetric accruals-to-cash flows model of Ball and Shivakumar (2005), which expresses accounting accruals as a function of cash flows from operations.

The results show that French and UK companies present similar levels of accounting accruals, while the level of negative accounting accruals in French companies is higher than in UK companies. The results indicate that the model of asymmetric accruals-to-cash flows has higher explanatory power in UK companies than French companies. Regarding the level of accounting conservatism, the results document a higher level in UK companies compared to French companies. These results are consistent with our hypothesis and confirm the findings of previous studies that recorded a higher level of conservatism in companies from common law countries than those from code law countries.

The results have been explained by the used measure of accounting conservatism, which is more earnings-based, and the literature argued that companies in code law countries, including France, tend to practice balance sheet conservatism more than earnings conservatism. Moreover, accounting practice in French companies has recently shifted toward the International Financial Reporting Standards, which may have negatively affected accounting conservatism due to the flexibility characterizing the international reference.

The results of this study have many implications for different parties affecting the financial information environment, including managers, auditors and standards-setting authorities. The results require managers to take into account the effects of accounting conservatism on

different stakeholders to equalize their interests and achieve neutrality as an attribute of faithful representation.

Auditors must continuously monitor the conservatism level in accounting information to maintain an adequate level because both the excessive and insufficient accounting conservatism have negative impacts on financial reporting quality and different stakeholders' interests. Standards-setting authorities must encourage companies to prefer conditional conservatism over unconditional conservatism to limit the opportunistic use of conservatism by the managers because conditional conservatism depends on events and information in contrast to unconditional conservatism.

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