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remains low (20%), compared to the 70% average in countries classified as middle-income. Given the role assigned to them and the position that the Ivorian government has decided to give to the private sector in general and SMEs in particular in its National Development Program (PND), it is necessary for the latter to increase their contribution to GDP, rather than limit themselves to creating jobs that do not have a real impact on the Ivorian economy.

Indeed, despite the clear intention of SME leaders to elevate their companies to the rank of productive enterprises, certain constraints tend to make this goal unattainable. These include the poor quality of information on SMEs, deficiencies in SME management and governance, inadequate legal and judicial environments, the high default rate among SMEs (solvency guarantees are weak), and insufficient or weak risk-sharing mechanisms, among others. This makes access to financing difficult, which is essential for the development of their activities and even for improving their performance.

All these factors thus provide strong incentives for business leaders to have a management system that allows them to follow the path of performance and remain aligned with Côte d'Ivoire's emergent dynamic. Anassé (2013) shows that SMEs play an important role in African economies, particularly that of Côte d'Ivoire. However, although they represent 98% of the business universe in Africa, these SMEs remain very fragile because tens of thousands go bankrupt each year. In terms of overall statistics, it is estimated that 80% of SMEs in Côte d'Ivoire close within the first three years of their existence, affecting a significant portion of the 60,000 formal SMEs in the country. This represents a significant loss for the Ivorian economic fabric.

In 2022 and 2024, SMEs in Côte d'Ivoire faced significant challenges. About 170 SMEs were on the verge of bankruptcy at the end of 2022 due to financial issues linked to the suspension of COVID-19 funds, which had been established to support these businesses during the pandemic. The issue of achieving financial performance remains a major concern for SMEs in Côte d'Ivoire, as evidenced by the research of the following authors (Gondo 2022; Toure and Kouadio, 2022; Tuo, 2022; Toure and Seoulo, 2023), which shows that budgeting practices, particularly preparation, execution, and evaluation, have a positive and significant effect on the business and financial performance of SMEs in Côte d'Ivoire. Our research is situated within this perspective.

According to Vangah (2018); Toure and Seoulo (2023), these difficulties and failures experienced by these SMEs are due to management problems, notably a lack of management tools used in these companies. Bouquin (1985) states that the statistical study of business creations and closures shows that more than 80% of newly created SMEs fail within five years, and more than 90% of failures are explained by management errors. However, for Toucherand Loulid (2020), the importance of the budget as a management tool for companies and organizations is indisputable. Indeed, it allows managers to relax their attention and let the controlled operate as long as no significant deviations from forecasts appear.

The pioneers in this field, Norton and Kaplan (2004), also stated that budget management can be applied and perfectly meet the needs of Small and Medium Enterprises. This is evident in the Ivorian context through Vangah (2018) and Gondo (2019), who show that SMEs in Côte d'Ivoire go bankrupt due to the absence of modern accounting and financial management tools, poor assessment of expenses leading to unrealistic budgets, and especially poor commitment of expenditures.

This leads to the following central question: **What is the influence of management control on the financial performance of Ivorian SMEs?** This study aims to analyze the influence of management control on performance management in SMEs. This research is divided into two main aspects: one theoretical and the other empirical. On the theoretical level, we analyze the concepts of Small and Medium-sized Enterprises (SMEs), performance, and management control. On the empirical level, we present the methodological approach mainly based on the questionnaire. We also discuss the results of our questionnaire in light of the theoretical framework to provide answers to our question.

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## 1. Literature Review Theoretical

### Analysis of the Concepts of this Research

#### Small and Medium-sized Enterprise (SME)

According to the General Confederation of SMEs: "An SME is a production or distribution unit, a management and administrative unit, under the authority of a leader who is fully responsible for the company, often its owner, and who is directly involved in the life of the business." This definition highlights the organizational specifics that an SME can take, its socio-economic nature, and the authority of a single leader. Indeed, as noted by the General Confederation of SMEs: "SMEs are companies for which the head personally and directly assumes financial, technical, social, and moral responsibilities of the business, regardless of its legal status." This quote from the General Confederation focuses on the hierarchical aspect, hence it emphasizes that there is a single person responsible for all areas related to the company's activity. Performance. According to Decree No. 2012-05 of January 11, 2012, defining Small and Medium Enterprises: "A Small and Medium Enterprise includes Micro-Enterprises, Small Enterprises, and Medium Enterprises."

A Micro-Enterprise is defined as a business that permanently employs fewer than ten people or has an annual turnover excluding taxes of thirty million CFA francs or less.

A Small Business is defined as a company that permanently employs fewer than fifty people or that achieves an annual turnover, excluding taxes, of more than thirty million CFA francs and less than or equal to one hundred and fifty million CFA francs. A Medium-Sized Business is defined as a company that permanently employs fewer than two hundred people or that achieves an annual turnover, excluding taxes, of more than one hundred and fifty million CFA francs and less than or equal to one billion CFA francs.

#### What is meant by performance?

##### - Attempt to define performance

The idea of performance is not simple, and many reflections have followed on this subject. In its general sense, performance can be defined as "the achievement of the goals one has set." Performance can be defined by referring to its three primary meanings (success, action, and the result of action), with action being considered as both the process and the result of the process leading to success. This idea of process means that performance is not only a result that appears at a given moment in time; indeed, the result (success or failure) is built throughout a management process that defines and communicates expectations, specifies the activities to be carried out, and monitors rewards and information related to outcomes. Consequently, by integrating the concept of performance into the field of management, it is possible to consider it as both the process and the result of the process of achieving organizational objectives. This definition allows linking the notions of effectiveness (achieving results within the defined objectives) and efficiency (the best possible management of resources and capabilities in relation to results) to performance.

##### - Economic and financial performance

This performance draws our attention in the context of four research. Regarding economic and financial performance, 'sustainable' in the long term, it is attributable to non-financial factors such as customer loyalty, employee satisfaction, internal processes, and the company's degree of innovation Cumby and Conrod, (2001). It relates to the monitoring of the company and is measured by the profitability of investments and sales, probability, productivity, return on assets, efficiency, etc. It incorporates value creation for the customer, the shareholder, and investor satisfaction Chakravarty, (1986). Related to costs. This performance is measured by quantitative indicators. This

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economic and financial aspect of performance has long remained the benchmark for company performance and assessment.

- **Measurement of financial performance**

Performance is measured using qualitative or quantitative criteria (or indicators) of results. To measure effectiveness, a criterion is used that expresses the ratio between the result obtained and the targeted objective. Efficiency, on the other hand, is measured based on a criterion that expresses the ratio between the result obtained and the resources used. Accordingly, it is necessary to carry out measurements at all levels: financial, economic, social, organizational, and societal. The indicators most often selected to capture economic performance are grouped into two sets. The first consists of the so-called development indicators, such as revenue growth, profit growth, market share growth, etc. Profitability measures overall the economic-financial surplus generated by the company's activity. Growth, on the other hand, reflects the adequacy of the scale of activities as a result of additional gains. In the context of our research, we focused only on four indicators, namely:

- **Le volume total des ventes (chiffre d'affaires)**

Par définition le chiffre d'affaires correspond à la somme des ventes effectuées par celle-ci il peut être HT (hors taxes) ou peut inclure la TVA (Taxe sur la Valeur Ajoutée), auquel cas on parle de chiffre d'affaires TTC (toutes charges comprises).

**Calculation of turnover**

$$\text{Revenue} = \text{Sale price} * \text{Quantity sold (1)}$$

Vous remarquerez que ce sont les mêmes informations qui figurent aussi sur la facture (quantité, prix de vente, taxes.

- **Fluctuation du chiffre d'affaires**

A company's income is rarely stable; indeed, a business goes through ups and downs in terms of activity. For example, toy sellers will systematically see an increase in their turnover during the holiday season, which is the case for activities with a strong seasonal component (mountain activities, seaside resorts, etc.). The evolution of collected revenue has a direct impact on cash flow management. A company's cash flow must always be positive, and tracking your company's receipts will allow you to anticipate a cash shortfall.

- **Profit**

Profit, or earnings, is a positive indicator in the business world. A company making a profit is subject to corporate tax. Profit is a positive accounting result achieved by a company over a 12-month period. One does not calculate profit directly but net income, which, if positive, is considered a profit. Here is the formula to calculate net income:

$$\text{Net result (profit or loss)} = \text{Income} - \text{expenses (2)}$$

The revenues correspond to operating revenues, financial income, and exceptional income. The expenses, for their part, include depreciation, provisions, financial charges, and exceptional expenses.

- **Market Share**

Market share is a key indicator for a company. It allows the company to position itself in the market and understand its standing, as well as that of its products and services, relative to competing companies. To calculate a company's

overall market share, that is, its position relative to the entire competition, one should compare the company's sales or business volume to the sales or business volume of the entire sector.

$$\text{Overall market share} = \frac{\text{Business figure or volume of the company's business}}{\text{Business figure or volume of the entire sector}} \quad (3)$$

Relative market share, that is to say the position of a company compared to just one of its competitors, is calculated as follows: Company revenue or business volume / revenue or business volume of the competing company.

- **The satisfaction of the leader**

The literature recognizes the role of the entrepreneur as crucial, both in creating the identity and culture of the company (Vignon and Zaddem, 1989; Reitter et al., 1991) and in making strategic decisions and implementing them (Mintzberg, 1990; Julien and Marchesnay, 1988), particularly those related to business development. It is up to them to guide the company toward achieving its objectives in the most efficient and effective way. They are responsible for the smooth operation of activities within the organization. The founding and ongoing management of the company are therefore attributable to them. In order to better understand the link between performance and management control, it is important to define the concept of management control.

**Key Concepts of Management Control**

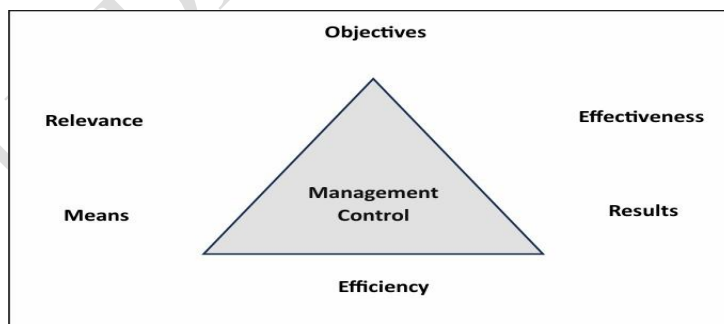
- **Definition and Tasks of Management Control.**

According to one of the pioneers of management control, Anthony (1965), he is credited with the creation of this function in the United States in the 1960s: "a process by which company executives ensure that resources are used effectively and efficiently to achieve set objectives."

From this definition, we can infer that management control is the process by which executives ensure that resources are obtained and used efficiently to achieve objectives, so that it can be stated that management control is generally: a set of techniques aimed at controlling and verifying the consistency between operational activities and the strategies defined by executives, while ensuring better use of resources at lower cost.

And according to Burlaud and Simon (2006), management control is defined as "all actions, procedures, and documents aimed at helping operational managers control their management to achieve objectives." Management control is a strategic function within a company if it can provide its expertise in strategic decision-making; it plays a central role in deploying strategy from the strategic apex down to the most operational levels. To clarify these terms, we present the management control triangle.

**Figure 1. The management control triangle**



**Source:** the author based on the literature

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So, in general, management control is a process that motivates managers and encourages them to carry out activities that contribute to achieving the objectives set by the company, while ensuring the three dimensions of performance, which are:

- **Relevance:** management control has been defined as an information system. For an information system to be effective, the results of its processing must align with the objectives and needs of the user;
- **Effectiveness:** this is the company's ability to achieve its objectives;
- **Efficiency:** the concept of efficiency is reflected in the ability to optimize the ratio between results and resources used.

- **Management Control Tools**

Nowadays, management control plays a vital role for companies. To ensure its proper functioning, it requires support from a set of means called "management control tools." Numerous typologies of management control tools can be presented according to various criteria:

- **General Accounting**

Legislators have imposed strict rules on general accounting to effectively fulfill its role and function. It can be defined as: "General accounting considers all the situations and operations of the company. Its objective is to measure and monitor the company's activity and results. Its orientation is therefore external, as it is intended for both managers and external parties. Its main reference is time, and it is mandatory in all countries, regardless of the company's size."

General accounting obviously serves management control. It can be seen as a traditional tool that is very heavy and often difficult for operational staff to understand, but it is not an internal management tool because it does not break down costs or calculate profitability by activity. This is why we should move towards the use of managerial (analytical) accounting.

- **Managerial (Analytical) Accounting**

According to Leclere, managerial accounting is defined as follows: "Management accounting calculates and analyzes the value of internal flows within the company. It must be adapted to the activity, the company's functional structure, and the needs of decision-makers in response to changes in the economic and technological environment (international competition, flexibility of production means, etc.)."

Cost accounting can determine:

- \* **actual costs:** which are calculated based on actual expenses for a past period;
- \* **predetermined costs:** which are calculated based on estimated expenses for an upcoming period. Predetermined costs are reference costs whose comparison with actual costs

- **Dashboard**

The dashboard corresponds to an information system that allows one to know, continuously and as quickly as possible, the essential data needed to control the short-term operation of the company, and to facilitate the exercise of responsibilities within it.

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Each manager's dashboard includes the information that is essential for managing their responsibility center as well as the information that is crucial for their superiors. Therefore, it is a tool that best meets the needs of rapid, ongoing monitoring across a range of financial, quantitative, and qualitative variables. Dashboards can be built using different methods, more or less centralized or decentralized:

- \* **Top-down:** Starts with the executive dashboard; the other dashboards are derived by successively going down the hierarchical levels;
- \* **Bottom-up:** Starts with the lower levels.

Each manager independently defines the information they need to manage their responsibility center. They then fit their dashboard into that of their superior. Among the most used types of dashboards are: the management dashboard and the strategic or prospective dashboard, also known as the BALANCED SCORECARD, which combines qualitative and quantitative indicators.

### **Mobilization of theories and empirical review**

#### **Mobilization of explanatory theories of management control**

- \* Agency theory

Agency theory, developed by Jensen and Meckling (1976), is based on the idea that the relationship between the owners of a company (the principal) and its managers (the agent) can be marked by conflicts of interest. Indeed, in a situation of information asymmetry, managers generally have more information than owners about the company's activities. This asymmetry can lead to opportunistic behavior by the agents, who may seek to maximize their own interests at the expense of those of the principal. This phenomenon is called informational asymmetry, which manifests itself in two main phases:

- \* **Ex-ante asymmetry:** This occurs before the contract is signed between the principal and the agent. The principal has less information than the agent regarding their skills, intentions, or actual objectives. This may lead to the selection of an agent who does not meet the company's needs or who might act opportunistically once engaged;
- \* **Ex-post asymmetry:** After the agent is engaged, the principal continues to face a lack of information about the agent's actual actions. The manager may hide important information or make decisions that do not serve the owners' interests. This type of asymmetry is particularly problematic in SMEs, where the formalization of control processes is often limited.

To limit the impact of informational asymmetry, it is essential to implement effective management control systems. These systems not only help reduce the information gap but also allow for monitoring and evaluating managers' performance through financial indicators and tools such as dashboards. In Côte d'Ivoire, where many SMEs are run by agents who are not always the owners, management control is crucial to ensure that managers act in line with the set performance objectives. It helps monitor and measure managers' performance while aligning their interests with those of the owners through incentive-based compensation systems or performance evaluation mechanisms (e.g., dashboards, financial indicators). Management control therefore plays a crucial role in reducing agency costs, that is, the costs related to monitoring agents, incentives, and potential malfunctions due to information asymmetry. :

#### **- Contingency theory**

Contingency theories recognize that all organizations are different and that there are no formal structures that are ideal. However, they posit that there are contextual elements that significantly influence the internal structures and

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processes of the organization. A company's performance thus depends on its ability to ensure alignment between these elements.

Woodward (1965) succeeded in demonstrating that similar production systems tended to have similar structural orientations. By distinguishing three types of technology: unit production, large-scale production, and continuous production, she concluded that there is a relationship between technology, structure, and company efficiency. Burns and Stalker (1961) demonstrated that there is a link between the technology used and the company's environment. Lawrence and Lorsch (1967) further developed the ideas of Woodward, as well as those of Burns and Stalker (1960). According to these authors, the most efficient companies are those that adapt to the degree of uncertainty of each type of environment. Furthermore, Lawrence and Lorsch (1967) found that organizations adapt to their environment through a dual mechanism of differentiation and integration of their structures. In this sense, contingency theories assert that the effectiveness of management control systems depends on the organizational and environmental context in which a company operates.

### **Review of empirical literature**

#### **➤ Link between dashboards and financial performance**

In an increasingly competitive economic environment, SMEs must rely on effective management tools to optimize their financial performance. Among these tools, dashboards appear as a strategic solution to evaluate, manage, and improve performance. However, while many authors highlight their positive impact, others question their effectiveness in certain contexts. Therefore, it is important to examine the extent to which dashboards influence the financial performance of SMEs by weighing both supportive and critical arguments. First, dashboards are often presented as essential tools for improving the financial performance of SMEs. Indeed, according to Kaplan and Norton (1996), the Balanced Scorecard provides a comprehensive view of performance by integrating financial and non-financial indicators. This balanced approach allows managers to better align their strategies with financial objectives. Furthermore, a recent empirical study conducted by Quesado et al. (2020) showed that the regular use of dashboards in SMEs improves profit margins through better cost management and continuous monitoring of key indicators. Consequently, these tools promote informed and proactive decision-making. Next, it should be noted that dashboards also help strengthen internal coordination and communication within SMEs. Nielsen et al. (2019) emphasize that the clear visualization of key indicators helps different teams work towards common goals, thereby reducing operational inefficiencies and increasing overall returns.

In the Ivorian context, (Gondo, 2017; Tuo, 2020) demonstrate that dashboards allow effective monitoring of cash flow indicators, supplier credits, and operational margins in Ivorian SMEs. These tools are considered a strategic lever to improve cost management and profitability. According to Aka (2016), the importance of dashboards in monitoring financial objectives and performance is indisputable. He notes that SMEs adopting these tools can better anticipate gaps between forecasts and actual results.

However, despite these advantages, dashboards are not universally accepted. Firstly, their implementation is often criticized for its complexity, particularly in SMEs where resources are limited. According to Choe et al. (2019), SME managers often lack the technical skills to correctly interpret dashboard data, which can lead to inappropriate decisions.

Finally, some authors note that dashboards, although effective in stable environments, can lack flexibility in constantly changing markets. Smith et al. (2019) explain that these tools are sometimes too rigid to quickly adapt to market fluctuations, thus limiting their usefulness for SMEs operating in uncertain environments.

**HS1:** The dashboards significantly influence the financial performance of Ivorian SMEs.

\* Link between target costs and financial performance

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Target costing is distinguished by its proactive approach aimed at designing products while adhering to predefined costs to ensure a profit margin. This method, popularized by the Japanese automotive industry, has expanded to other sectors and to SMEs in various contexts. However, while some authors praise the advantages of target costing in terms of financial performance, others express reservations about its complexity and actual effectiveness, particularly for SMEs.

Therefore, it is relevant to examine the links between target costing and SME financial performance by comparing the supporting and opposing arguments. First of all, target costing is often presented as an essential method for managing SMEs' profitability. Indeed, according to Ansari et al. (1997), this approach is based on a simple principle: start from the market-accepted selling price, deduct the desired profit margin, and then set a target cost not to be exceeded. This process ensures that only profitable products are introduced to the market.

Furthermore, Dekker and Smidt (2003) explain that target costing helps reduce costs from the early design phases, thereby avoiding costly adjustments in later stages. They emphasize that this method promotes cross-functional integration of teams (design, marketing, production), thus improving operational efficiency and strategic responsiveness. Moreover, recent studies, such as those by Wu et al. (2020), confirm that this method provides SMEs with a significant competitive advantage.

Finally, target costing is also associated with waste reduction through practices such as Kaizen costing. Choe (2002) emphasizes that this approach enhances financial sustainability by eliminating unnecessary costs throughout the product life cycle. In the Ivorian context, Touré and Seoulo (2023), in their study conducted on 201 SMEs in Abidjan, demonstrate that the use of modern budget management tools, including target costing, significantly improves business and financial performance. They highlight that structured practices such as budget preparation, execution, and evaluation allow for optimizing resources and improving profitability.

However, despite their advantages, target costing is not without criticism. First, its implementation can be particularly complex for SMEs, which often lack adequate human and technological resources. Choe et al. (2019) note that this method requires rigorous coordination between multiple departments, which can be a challenge for smaller organizations.

Furthermore, some authors highlight the risks of negative impact on product quality. Ellram and Smidt (2021) warn against excessive cost reduction, which could compromise customer satisfaction and harm the company's reputation. Tariq et al. (2021) observe that the initial costs to integrate this approach, particularly in terms of training and analytical tools, can represent a significant barrier for SMEs. These investments, although essential, do not always guarantee an immediate return on investment. Target costing and modern management tools help streamline costs and improve strategic decision-making; however, their adoption is hindered by structural challenges (lack of skills, limited resources) and external constraints (regulations, implementation costs).

**HS2:** Target costs have a positive and significant effect on the financial performance of SMEs in Ivory Coast.

\* Link between Budget and Financial Performance

The budget is a central tool of management control, particularly in SMEs where it often serves as the main means of planning and control. In the context of SMEs, where resources are limited and market uncertainty is high, the budget plays a crucial role in ensuring financial stability and improving performance. However, despite its advantages, criticisms persist regarding its implementation and actual effectiveness. This review draws on recent studies, particularly in Côte d'Ivoire, to examine the extent to which the budget impacts the financial performance of SMEs. Budget preparation allows managers to set clear objectives and monitor the allocation of resources, Selmer (2015). It is widely recognized for its contributions to performance. According to Anthony and Govindarajan (2007), it constitutes an essential financial and strategic planning tool to align an organization's objectives with its available resources.

Local studies, such as that of Touré and Seoulo (2023), show that budgeting practices, particularly preparation, execution, and evaluation, have a positive and significant effect on the commercial and financial performance of SMEs in Côte d'Ivoire. By analyzing a sample of 201 SMEs in Abidjan, they demonstrated that the use of modern budgets, combined with tools such as dashboards, improves financial discipline and strategic decision-making. Zié (2003) emphasizes that SMEs that adopt structured financial practices, such as target costing and modern management control tools, are better positioned to overcome challenges related to taxation and cost management. He stresses their role in optimizing financial resources to improve productivity and profit margins.

However, other authors highlight the limitations of budgeting, particularly in SMEs. First, (Smith et al., 2019; Lebas and Alazard, 2020) note that the rigidity of budgets can hinder adaptability, especially in unstable environments such as those of SMEs in Côte d'Ivoire.;

Indeed, fixed budget forecasts may not reflect the rapid fluctuations of local markets.

In conclusion, the budget remains a key tool for improving the financial performance of SMEs, allowing them to better plan, control, and monitor their resources. However, its effectiveness largely depends on the companies' ability to adapt it to their specific context.

**HS3:** The budget has a positive influence on the financial performance of SMEs in Ivory Coast

### 3. Methodological approach adopted

This study adopts a strictly quantitative approach, based on a hypothetico-deductive method with a positive attitude. Indeed, we sent a questionnaire to 52 SME managers in the Abidjan sector using the convenience method, specifically through a purposive selection. The survey was conducted over a period of 27 days. The deployed questionnaire covers the key aspects of this research.

\* Hypothesis Test: Chi-Square Method

As part of our study, we opted for the chi-square method, used when one wants to test the association between two variables. It is calculated as follows:

$$x^2 = \sum \frac{(O - E)^2}{E} \quad (3)$$

Where (1) = Equation 1; O = Observed Frequency, E = Expected Frequency. - Steps for Interpreting the Results of the Chi-Square Test; Chi-square calculation:

$$x^2 = \sum \frac{(O - E)^2}{E}$$

Where O = represents the observed frequencies, E = represents the expected frequencies. Degrees of Freedom (df): The degrees of freedom for a chi-square test are calculated as follows:

$$df = (\text{number of rows} - 1) * (\text{number of columns} - 1) \quad (4)$$

Chi-Square Critical Value: The chi-square critical value is determined from Chi-square distribution tables for a certain significance level (alpha), usually  $\alpha = 0.05$  (which corresponds to a 95% confidence level). However, it does not provide information about the strength of this relationship. Hence the need to confirm it with Cramer's test (1946).

\* Hypothesis test: Cramer's V method

Cramer's test reinforces the results obtained using the Chi-squared test. It allows for determining the strength of the relationship. Cramer's test (also called Cramer's V) is composed as follows (where min. dll) corresponds to the degrees of freedom of the table:

$$V \text{ de Cramer} = \sqrt{\frac{x^2}{N * \min.(k-1; r-1)}} \quad (5)$$

With  $x^2 = K \chi^2$ ;  $N = \text{Echantillon}$ ;  $k = \text{nombre de colonnes}$ ;  $r = \text{nombre de ligne}$

To summarize the results obtained, the table above summarizes the strength of the relationship between the variables, based on the value of Cramer's V.

**Table 1. Result of Cramer's V**

VALUE OF CRAMER'S V	STRENGTH OF THE RELATIONSHIP BETWEEN VARIABLES
<0,10	No or very weak relationship
>=0,10 et <0,20	Weak relationship
>=0,20 et <0,30	Average relationship
>=0,30	Strong relationship

Source: the author based on Cramer (1946)

#### 4. Results

##### Descriptive Statistics Results

It can be noted that managerial respondents represent half of the respondents at 50%. They are followed by employees (31.25%) and finally by senior executives (18.75%). The following Figure 2 provides a more striking view of the distribution of respondents according to their role. Seniority in the position is an indicator of experience with company events and relationships. In any case, the most senior respondent should have relatively fewer difficulties in answering our questionnaire than a newcomer in their position. The seniority of respondents in our sample at their current position ranges from 1 year and above. The majority of respondents have more than 10 years of seniority in their current position, at 50%. Then 31.25% have between 6 and 10 years. The remaining 18.75% have seniority ranging from 1 to 5 years. As clearly shown in the table, there were few female respondents. In total, of the 140 people who answered this questionnaire, only 48 are women, representing 31.25% of the sample. However, 92 people are men, representing 68.75% of the sample. Since the questionnaire is designed to be self-administered, it is necessary that the respondent's level of education allows them to fully understand the subject discussed. In this regard, it is clear that the majority of leaders have higher education at BAC+4 level, representing more than 50% of the sample, as shown in the table below. Furthermore, 25% of respondents have a BAC+4 level of education. Finally, 25% have BAC+3.

##### Test Results of the Hypotheses

##### Controller Profiles and Financial Performance

In this section, we present the results of the Chi-square and Cramer's V tests. These tests allow us to assess the influence of management controllers' profiles on financial performance, both in terms of the existence of a significant relationship and the strength of this relationship between the variables studied.

**Table2. Cross-tabulation between executive profile and financial performance**

CHI-SQUARE TESTS			
	Value	Ddl	Signification
Pearson's chi-squared	508,94	80	0,000
Linear association	-436,53	-	Non applicable
Association linéaire	0,82	-	0,000
Number of valid observations	140	-	-
SYMMETRICAL MEASURES			
Nominal by Nominal (Phi)	4,05	-	0,000
Cramer's V	0,91	-	0,000

Source: the author, based on the questionnaire data (2024)

### Analysis and Interpretation

The results of the Chi-square test show that there is a significant association between the executive's profile and financial performance, with a Pearson Chi-square value of 508.94 and a two-sided asymptotic significance of 0.000,  $p < 0.05$ . Symmetric measures, such as the Phi coefficient (4.05) and Cramer's V (0.91), also demonstrate the very strong association between the controller's profile and financial performance.

### Dashboard and Financial Performance

We examine the effect of the dashboard on financial performance through the analysis of Chi-square and Cramer's V tests.

**Table3. Cross-tab between dashboard and financial performance**

CHI-SQUARE TESTS			
	Valeur	Ddl	Signification
Pearson's chi-squared	291,26	48	0,000
Linear association	-283,70	-	Non applicable
Association linéaire	0,69	-	0,000
Number of valid observations	140	-	-
SYMMETRICAL MEASURES			
Nominal by Nominal (Phi)	3,07	-	0,000
Cramer's V	0,88	-	0,000

Source: the author, based on the questionnaire data (2024)

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## Analysis and Interpretation

The results of the Chi-square test indicate a strong association between the dashboard and financial performance. This is reflected in the Pearson Chi-square value of 291.26 with 48 degrees of freedom and a two-tailed asymptotic significance value of 0.000, indicating statistical significance ( $p < 0.05$ ). The value could be -283.70, but this is not relevant in this particular case. The value of the linear-by-linear association test is 0.69, with a two-tailed asymptotic significance of 0.000, which is a significant result. A strong association between the two variables is also confirmed by the Phi coefficient and Cramer's V. 3.07 and 0.88 are the Phi coefficient and Cramer's V, respectively, with an approximate significance of 0.000 for both tests. These values indicate a relatively strong association between the dashboard and financial performance.

### Target costing method and financial performance

The first table presents the results of the Chi-square test for the different proposals related to the target costing method, the second table shows the strength of the associations measured by Cramer's V, and finally, the last table highlights the overall relationship between the method and financial performance.

**Table 4. Cross between Full Costing Method and Financial Performance**

CHI-SQUARE TESTS			
	Value	Ddl	Signification
Pearson's chi-squared	782,63	120	0,000
Likelihood report	-613,53	-	Non applicable
Linear association	0,87	-	0,000
Number of valid observations	31	-	-
MESURE SYMMETRIQUES			
Nominal by Nominal (Phi)	5,02	-	0,000
V de Cramer	1,03	-	0,000

Source: the author, based on the questionnaire data (2024)

## Analysis and Interpretation

The Chi-square test reveals that the target costing method is significantly associated with financial performance: the Pearson chi-square value is 782.63 with 120 degrees of freedom and a two-sided asymptotic significance of 0.000, indicating statistical significance ( $p < 0.05$ ). The likelihood ratio value is -613.53, which in this specific case is not applicable. The value is 0.87 for the linear-by-linear association test, with a two-sided asymptotic significance of 0.000. This suggests that the target costing method and financial performance have a moderate linear relationship. The Phi coefficient and Cramer's V, which are symmetrical measures, also indicate a strong association between the two variables. The values of 5.02 for the Phi coefficient and 1.03 for Cramer's V, with an approximate significance of 0.000 for both tests, confirm a very strong association between target costing and financial performance.

### Budget and financial performance

In this section, we explore the influence of the budget on financial performance through Chi-square and Cramer's V tests. The results are presented in the following tables. These analyses help assess how the budget impacts the financial performance of companies.

**Table5. Crossbetweenbudgetandfinancialperformance**

CHI-SQUARE TESTS			
	Valeur	Ddl	Signification
Pearson's chi-squared	283,70	48	0,000
Likelihood report	-318,92	-	Non applicable
Linear association	0,93	-	0,000
Nominal by Nominal (Phi)	31	-	-
MESURE SYMETRIQUES			
Nominal par Nominal (Phi)	3,03	-	0,000
V de Cramer	0,87	-	0,000

**Source:** the author, based on the questionnaire data (2024)

Analysis and Interpretation The results of the Chi-square test show a significant association between budget and financial performance. Indeed, the Pearson Chi-square value is 283.70 with 48 degrees of freedom, and the two-tailed asymptotic significance is 0.000, indicating statistical significance ( $p < 0.05$ ). The likelihood ratio, with a value of -318.92, is not applicable in this specific case. The linear-by-linear association test shows a significant result with a value of 0.93 and a two-tailed asymptotic significance of 0.000. This suggests a strong linear relationship between budget and financial performance. Symmetric measures, such as the Phi coefficient and Cramer's V, also confirm a strong association between the two variables. The Phi coefficient is 3.03 and Cramer's V is 0.87, with approximate significances of 0.000 for both tests. These values indicate a relatively strong association between budget and the financial performance of companies.

## 5. Discussion and managerial involvement

### Discussion

These results are discussed in detail in relation to literature and are summarized in the following table.

**Table6. Summary Table of Assumptions**

	Hypotheses	Results	Convergent Works	Divergent Works	Verification
<b>HS1</b>	The dashboard positively influences financial performance.	The chi-square of our model is 291.26 with a p-value of 0.000, confirming the importance of fraud risk management.	Tuo (2020) Gondo (2017)	Tuo (2020) Smith et al. (2019)	Confirmed
<b>HS2</b>	The target costing method has a positive effect on financial performance	Pearson's chi-squared is 782.63 with a p-value of 0.000, showing a strong correlation.	Touré et Seoulou (2023) Houole (2023)	Aka (2016) Soro et al. (2018)	Confirmed

<b>HS3</b>	The budget influences financial performance	Pearson's chi-squared value of 283.70 with a p-value of 0.000 indicates a significant relationship.	Touré et Seoulu (2023)  Ballo (2003)	Touré et Seoulu (2023)  Smith et al. (2019)	Confirmed
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Source: the author based on the questionnaire data

### Managerial implications

The recommendations for improving management control tools for SMEs in Côte d'Ivoire in order to increase their financial performance are as follows:

- Training and support: Ivorian SME managers should be trained in the use of modern management tools to maximize their impact;
- Simplification of tools: Dashboards and budgets should be adapted to the specific needs and capacities of local SMEs;
- Institutional environment: The lack of institutional support and the unstable economic environment hinder the widespread adoption of these tools;
- Implement training programs on the use of management control tools, particularly dashboards and budgeting; - Create practical workshops to popularize the benefits of the target costing method;
- Develop partnerships with financial institutions to facilitate access to the resources needed for the implementation of these tools;
- Encourage the preparation of realistic budgets and the regular analysis of variances for better financial management.

### 6. Conclusion

Any company that aspires to sustainable performance must master its costs, assess its performance, and optimize its management processes. The general objective of this work was to analyze the influence of management control tools, notably target costing, dashboards, and budgets, on the financial performance of SMEs in Côte d'Ivoire. These companies, essential to the national economy, face numerous challenges related to the management of their resources and profitability.

Through the theoretical review, we drew two main approaches:

- agency theory, which highlights the importance of management tools to reduce information asymmetries between managers and owners by enhancing transparency and accountability;
- contingency theory, which argues that the effectiveness of management practices depends on the contextual specifics of each SME (size, economic environment, internal organization). These theoretical frameworks helped structure the analysis and justify the selected tools as levers for improving financial performance.

From a methodological standpoint, we adopted a mixed approach:

- a quantitative approach, based on data collected from 140 SMEs in Abidjan using structured questionnaires;
- a qualitative approach, incorporating semi-structured interviews to gather in-depth perceptions from managers on the use of management control tools.

The results largely confirm our hypotheses:

- target costs and dashboards have a significant positive impact on profitability and cost management;
- SMEs using structured budgets better manage their financial flows and strategic priorities.

However, these tools remain underutilized due to financial constraints, a lack of training, and an often-informal organizational culture. In light of these observations, we make several recommendations:

- strengthen the capacities of leaders: Offer specific training programs on management control tools tailored to SMEs;
- promote affordable and suitable solutions: Develop simplified dashboards and flexible budgets to meet the needs of Ivorian SMEs;
- encourage technical and financial support: Promote partnerships between SMEs and specialized institutions to facilitate the adoption of modern practices.

In conclusion, this study highlights the strategic importance of management control tools for the development of SMEs in Côte d'Ivoire. However, to maximize their impact, combined efforts from public, private, and academic actors are necessary to support their adoption and integration by these businesses.

More extensive exploration, covering a national sample and incorporating other explanatory variables, such as the skill level of managers, could enrich knowledge on this subject. Therefore, this dissertation encourages further reflection on the strategic role of management control in the development of SMEs in Côte d'Ivoire and beyond.

## 7. References

- [1] Aboubakar, T. O. Influence des caractéristiques du Système d'Information Comptable (SIC) sur l'optimisation de la charge fiscale des PME en Côte d'Ivoire.
- [2] Ajzen, M., Rondeaux, G., Pichault, F., & Taskin, L. (2016). Performance et innovation en PME: une relation à questionner 1. *Revue internationale PME*, 29(2), 65-94.
- [3] Alazard, C., & Sépari, S. (2004). *Contrôle de gestion: DECF7: corrigés du manuel*. Dunod.
- [4] Anasse, A. (2013). Arbitrage homogénéité/taille des segments: proposition d'une approche pour les PME africaines 1. *Management international*, 17(2), 123-134.
- [5] Arcand, M., Arcand, G., Bayad, M., & Fabi, B. (2004). Systèmes de gestion des ressources humaines et performance organisationnelle. *Annals of public and cooperative economics*, 75(3), 497-524.
- [6] Ayed, N. B. (2015). *Les pratiques de calcul des coûts dans les PME en Tunisie: de l'approche opérationnelle à l'approche stratégique* (Doctoral dissertation, Université du Droit et de la Santé-Lille II; Université de Sfax (Tunisie)).
- [7] Bouadila, S., Baddadi, S., Ali, R. B., Ayed, R., & Skouri, S. (2023). Deploying low-carbon energy technologies in soilless vertical agricultural greenhouses in Tunisia. *Thermal Science and Engineering Progress*, 42, 101896.
- [8] Bourguignon, A. (2000). Performance et contrôle de gestion. *Encyclopédie de comptabilité, Contrôle de gestion et Audit*, Ed. Economica, 931-941.

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Brulhart, F., Gherra, S., & Rousselot, P. (2009). Un outil de mesure et de signalisation de la performance au service de l'analyse stratégique dans la PME: Présentation d'un «modèle dupont enrichi» 1. *Revue internationale PME*, 22(2), 67-93.

Chapellier, P. (1997). Profils de dirigeants et données comptables de gestion en PME. *Revue internationale PME*, 10(1), 9-41.

Duong, H. P., Piepsz, A., Collier, F., Khelif, K., Christophe, C., Cassart, M., ... & Ismaili, K. (2013). Predicting the clinical outcome of antenatally detected unilateral pelviureteric junction stenosis. *Urology*, 82(3), 691-696.

Elhamma, A., & Lassaad, B. M. (2017). Liens entre participation budgétaire, taille et performance : cas des entreprises au Maroc. *Revue Congolaise de Gestion*, 24(2), 43-62.

Epstein, M., & Manzoni, J. F. (1998). Implementing corporate strategy:: From Tableaux de Bord to balanced scorecards. *European management journal*, 16(2), 190-203.

Fabi, B., Raymond, L., & Lacoursière, R. (2009). Strategic alignment of HRM practices in manufacturing smes: a Gestalts perspective. *Journal of Small Business and Enterprise Development*, 16(1), 7-25.

Gavard-Perret, M. L., Gotteland, D., Haon, C., & Jolibert, A. (2012). Méthodologie de la recherche en sciences de gestion. *Réussir son mémoire ou sa thèse*, 2.

Gronum, S., Verreynne, M. L., & Kastle, T. (2012). The role of networks in small and medium-sized enterprise innovation and firm performance. *Journal of Small Business Management*, 50(2), 257-282.

Guéret-Talon, L., & Lebraty, J. (2006). Pérennité de la PME et stratégies de rupture. *Revue Sciences de Gestion*, 52, 17-35.

Hadini, M., Ali, M. B., Rifai, S., Bouksour, O., & Adri, A. (2020). Le Concept de la Performance Industrielle : Etat de l'Art. *International Journal of Innovation and Applied Studies*, 28(3), 726-739.

Jagongo, A., & Kinyua, C. (2013). The social media and entrepreneurship growth. *International journal of humanities and social science*, 3(10), 213-227.

Kaplan, R. S. (2009). Conceptual foundations of the balanced scorecard. *Handbooks of management accounting research*, 3, 1253-1269.

Korib, D. N., & Kerzabi, A. (2015). Contrôle de gestion: analyse comparative entre une entreprise publique et une entreprise privée. *Revue Maghrébine d'Economie & Management N*.

Kuhn, H. (1962). Le concept de l'ordre. *Gregorianum*, 43(2), 254-267

Lawrence, P., & Lorsch, J. W. (1978). (1967). *Organization and Environment. Managing Differentiation and Integration*.

Meckling, W. H., & Jensen, M. C. (1976). Theory of the Firm. *Managerial Behavior, Agency Costs and Ownership Structure*.

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Muchiri, N. W., & Jagongo, A. (2017). Internal auditing and financial performance of public institutions in Kenya: A case study of Kenya Meat Commission. *African Journal of Business Management*, 11(8), 168-174.

Ngokevina, J. F., & Kombou, L. (2006). L'influence du pouvoir du dirigeant sur la structure de l'entreprise: une étude à partir de entreprises camerounaises. *La revue des sciences de gestion*, (3), 89-98.

Nunnally, J. C. (1978). An overview of psychological measurement. *Clinical diagnosis of mental disorders: A handbook*, 97-146.

Saeed, S., Yousafzai, S. Y., & Engelen, A. (2014). On cultural and macroeconomic contingencies of the entrepreneurial orientation–performance relationship. *Entrepreneurship Theory and Practice*, 38(2), 255-290.

Savoie, A., & Morin, E. (2001). L'erreur managériale : confondre les causes, les problèmes et les solutions en matière d'efficacité organisationnelle. *Gestion*, 26(1), 10-11.

Toure, O. A., & Kouadio, K. R. (2022). L'influence des Caractéristiques du Système d'information Comptable Sur La Performance Financière des Pme Manufacturière En Côte d'Ivoire. *International Journal of Strategic Management and Economic Studies (IJSMES)*, 1(1), 19-36.

TUO, K. S. (2024). L'effet des caractéristiques intrinsèques des entreprises sur l'usage des outils de pilotage : cas des PME en Côte d'Ivoire. *Revue du contrôle, de la comptabilité et de l'audit*, 8(2).