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Governance and Performance of MFIs: The Cameroon Case

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Abstract

The main challenge of microfinance institutions and social economy firms remains their survival, and to meet this challenge, MFIs need to be competitive. The poor performance of MFIs is usually attributed to their decision-making and operational processes. The governance of MFIs is therefore identified as one of their main risks. Despite this, governance is still little explored in these organizations and empirical studies find a weak relationship between classical governance mechanisms and MFI performance, especially for the MFIs situated in Africa (Thrikawala et al., 2013a). In this study, we examine whether the effect of governance mechanisms on the performance of MFIs differs according to their legal status in the Cameroonian context. On the one hand, our empirical results show that there is a significant relationship between some specific governance mechanisms and MFIs' performance. On the other hand, adjusting the governance mechanisms according to the MFIs' legal status improves their efficiency. The analysis of the impact of the governance mechanisms on the performance of MFIs requires not only an approach that is specific to this sector but also an approach that is adapted to their legal status. Moreover, from a managerial point of view, it would be desirable to adjust the governance mechanisms, depending on the legal status of the MFIs, to make them more efficient from the social as well as the financial standpoint.

Keywords: Microfinance institution (MFI), microcredit, corporate governance, financial performance, social performance, legal status.

Introduction

The early 1990s were marked by the liberalization of the financial sector in many countries of the Central African sub-region, Cameroon in particular. One of the main consequences of this liberalization was the emergence and proliferation of microfinance institutions (MFIs). The role of these institutions is to reduce the financial constraints of people who are excluded from the classical banking system to fight unemployment and poverty efficiently in these countries. Given this role, governments have taken a number of actions with a view to promoting their development and evolution. According to Pierret and Doligez (2005), only 10% of microfinance institutions present strong sustainability. The increase in information on crises and bankruptcies affecting these institutions arouses concerns and doubts in the minds not only of the investors and supervisory authorities in the sector but also of the other stakeholders. The main challenge of these socially oriented institutions and social economic firms in general globally is that of their sustainability. Faced with this challenge, they have to remain competitive by allying their financial and social objectives. In fact, these organizations can develop more if they improve their performance. However, as noted above, their poor performance is usually due to the poor reliability of their decision-making and operational processes. In this sense, a recent study identifies governance as one of the main risks in MFIs (Lascelles et al., 2014). In addition, previous studies (Hartarska, 2005; Mersland and Strøm, 2009) find a weak relationship between the classical governance mechanisms and the performance of MFIs, especially when these institutions have different legal statuses. According to Rosenberg et al. (2009), almost two-thirds of sustainable MFIs are NGOs, cooperatives, public banks or other nonprofit organizations. Moreover, the global financial crisis that started in 2007 has reduced the availability of funds and donations to MFIs. These funds are more difficult to collect without showing proof of performance and diligence (Erkens et al., 2012).

In this study, we try to determine whether the effect that the governance mechanisms exercise on the performance of MFIs differs according to the specificities of their legal status. Several studies exist on this topic in Europe and in Asia but they are generally descriptive and related to consultancy reports or general guidelines on governance (Thrikawala et al., 2013a). Very few empirical studies are carried out in Africa (Tchakoute Tchuigoua, 2010b), and to our knowledge, none focus on the Cameroonian context. Furthermore, the empirical results regarding governance in one country are not directly transposable to another country because of the effect of socio-cultural variables (Licht et al., 2005). Besides the field of study, the originality of this study lies in the fact that it takes into consideration the specificities of the legal status, which could explain the differences in the effect that governance mechanisms exercise on the performance of MFIs. Specifically, we seek to analyze the moderating effect of the legal status of MFIs on the relationship between governance mechanisms and MFIs' efficiency in Cameroon. To achieve this objective, this article is structured in two parts: the first part

addresses the theoretical aspects and hypotheses of the research and the second one provides the details of our empirical study on Cameroonian MFIs.

1. Theoretical framework and hypotheses

1.1. Corporate governance and MFIs

MFIs are intermediaries that meet the financial service needs of those who have no access to the formal banking sector. They developed as an approach to economic development that specifically concerns low-income earners who may need to finance their personal expenditure or their company. In addition to their role as a financial intermediary, MFIs play a social role through the development of economic activities and the creation of new businesses, the bringing together of persons, the strengthening of self-confidence, training in the financial domain and the management of skills within a group. The current challenge faced by MFIs is to achieve a double mission: their social role and sustainability. This raises the problem of their performance. Researchers in management find that the concept of performance in MFIs has a long history and is the subject of numerous studies and debates (Kanti Das and Bhowal, 2013). It is difficult to define or measure it. These authors agree to define the notion of performance firstly as a result or a goal, then as a "state" and finally as a "success" (Monea and Guta, 2011). Measuring the performance of MFIs amounts to having knowledge on the impact of their activities on the various dimensions covered by their objectives (Thrikawala et al., 2013b). Originally, MFIs' mission was to ally social and financial objectives. These two goals are not incompatible. The social objective does not prevent them from generating profits, because the evidence shows that many institutions around the world operate as non-governmental organizations (NGO) and as regulated institutions at the same time. For example, we can cite Bancosol (Bolivia), Los Andes (Bolivia), ACCION Comunitaria del Peru (Peru), K-Rep (Kenya), ABA (Egypt) and ASA (Bangladesh). Although the performance of MFIs is summarized in financial and social dimensions in the literature, the major difficulty lies in determining the indicators that represent them. However, nonfinancial indicators are usually measured in opposition to financial indicators, depending on the objectives or the context. Rock et al. (2001) use the notion of profitability to estimate the financial dimension and customer coverage to measure the social dimension. Kamajou (2005) measures the performance of an MFI through its customer coverage rate, the degree of access to the poorest population, the efficiency and adequacy of the services offered and the needs of the target population.

1.2. Corporate governance theories and the performance of MFIs

The problem of measuring MFIs' performance through their double objective (social and financial) requires us to use the two main theories of governance in microfinance (the theory of agency and that of organizational architecture). The mobilization of these theories to explain performance is justified by their complexity and the fact that many of these theories are only partial, each dealing with a particular aspect of the organizations' problem. By using all these theories, we will highlight the undeniable contribution of governance to the explanation of MFIs' performance. Within MFIs, a double agency problem (Jensen, 1993) exists between the clients and the members of the organization on the one hand and between the MFI managers and the financial stakeholders on the other hand. These investors, in a context of informational asymmetry, will never be fully assured that the money that they grant to the managers will be used in the best way possible to meet their interests, although the managers' interests are generally obvious. The governance mechanisms (internal or external) implemented aim to align the interests of the agents with those of the principal by minimizing the agency costs. For many authors, these mechanisms are minimized in non-profit organizations like NGOs because the non-distribution of profits that characterizes these organizations results in production inefficiency. Therefore, there is no incentive to control costs (Erkens et al., 2012). Nevertheless, the superiority of profit-seeking MFIs is often justified in the literature by the efficiency of their governance mechanisms because they are conditioned by the efficiency criteria. As regards cooperatives and mutual benefit companies, the success of their savings and loans rests on a governance mechanism giving clients the quality of an owner; as such, success depends on the level of implication of the members in control mechanisms.

In fact, the positive theory of agency is a theory of the organizational architecture (Jensen and Meckling, 1992). It is articulated around the allocation of the decisional rights within an organization. This allocation can lead to a partition of the decisional rights between rights linked to the management of the decisions (decision management rights, which permit the initiation and implementation of the allocation of the resources) and those linked to the control of the decision (decision control rights). Thus, our framework is based on the two dimensions of the organizational architecture theory:

- The allocation of the decision-making rights within the organization in the broad sense;
- The conception of the control system, which includes among other things the evaluation of performance and incentives that allow the specification of the relationship between the measure of performance and its consequences in terms of penalties and rewards for the actors and managers of the MFI.

The coherence and complementarity between these two dimensions determines the level of organizational efficiency, which is generally achieved by an efficient governance mechanism. In addition, the efficiency of the governance mechanism is related to the type of the organization,

represented by its legal status. This theory cannot be separated from the systemic view of the organization given the agency problems and clarifies the representation of the MFI in terms of contract nodes. Even though this representation is generally felt to fit poorly with the context of economies undermined by poverty (Eyada Ayissi, 2007), this contribution shows that the sustainability objective of the MFI is conditioned by the implementation of the appropriate governance systems by taking into account the cultural specificity of the environment. The theoretical interactions between the governance mechanisms and the performance of the MFI as described above are tested within the framework of several empirical studies (Galema et al., 2012; Hartarska and Mersland, 2012; Strom et al., 2014; Mori et al., 2015).

1.3. Corporate governance mechanisms and the performance of MFIs

Several variables relating to governance in microfinance are evoked in the previous literature. These include the structure of ownership, the characteristics of the board of directors (BD) and external governance mechanisms.

The question of ownership is closely linked to that of governance (Rock et al., 2001). Many MFIs across the world operate as non-profit institutions (NGOs, associations, cooperatives or mutual benefit companies). In the case of NGOs, there is no owner of the capital. Their financial resources are granted by investors in the form of subsidies or concessional loans. In associations, cooperatives and mutual benefit companies, the owners are the members. On the contrary, in profit-seeking MFIs, precisely those that have the legal status of a limited company, investors provide the capital. For efficient governance, Jensen (1993) suggests, among others, the holding of a significant number of shares by the managers and the members of the board of directors so that a certain convergence of interests with the shareholders would exist. This would allow their ownership structure to be clarified to set up an efficient governance mechanism that is expected to stimulate performance. In the African context, Tchakoute-Tchuigoua (2010b) is mainly interested in parameters such as the legal status and the presence of institutional investors as the variables of ownership. He finds no significant link between the structure of ownership and performance. For Mersland and Strøm (2008, 2009), it turns out that the structure of ownership does not improve the MFI performance and both authors hint that the traditional mechanisms of governance that have proved to be valuable in classical companies have less importance in MFIs. The type of ownership is not a very reliable index of performance for banks in general (Altunbas et al., 2001) and for MFIs in particular (Mersland and Strøm, 2009).

Oster (1995) highlights the crucial role of the board of directors in the specific case of institutions of the social economy. Mori et al. (2015) follows the same line by insisting that at the heart of the governance mechanism of MFIs is a board that has the role of controlling the managers and, to be efficient, each of its members must show real motivation. For Campion and Frankiewicz (1999) and Mersland and Strøm (2009), variables such as the size of the board of directors, its composition, the

rotation of the main managers and the term of office of the members of the board of directors are highlighted, as well as the separation of powers between the Chief Executive Officer (CEO) and the Chairman of the Board (CofB). However, the results attained by Mersland and Strøm (2009) are not very coherent and they experience some difficulties in finding a significant effect of governance. They find that the presence of a woman and of an internal auditor on the board leads to better financial performance, whereas that of international directors increases the costs and reduces the operational independence. However, other variables of governance are considered to be insignificant or inconsistent. The study by Hartarska and Mersland (2010) shows that MFIs are less successful when the positions of CEO and CofB are cumulated and when MFIs have a greater proportion of internal employees within their board of directors. They also find that the efficiency of the board is not linear and that it is optimal between eight and nine members. In the African context, Tchakoute Tchuigoua (2010b) is mainly interested in the composition of the board of directors in terms of its size and independence. Unfortunately, he does not obtain any satisfactory results. Rock et al. (2001) suggest that the various domains associated with the nature of the board of directors are, among others, its composition, its size, its operational conditions, the process for removing a CEO and its evaluation. Unfortunately, many of these variables have not been tested empirically.

In the literature, we find certain external governance mechanisms that can have an effect on the performance of MFIs. These include regulation/supervision and external auditing. This literature particularly emphasizes the justification of the importance of regulation for microfinance (Chaves and Gonzalez-Vega, 1992; Arun, 2005) for the description of its national and regional mechanisms (Staschen, 1999) and for the international comparison of these mechanisms (Staschen, 2003). The regulation is considered here as an external mechanism of governance (Ciancanelli and Reyes Gonzales, 2001; Caprio and Levine, 2002; Macey and O'Hara, 2003). This mainly refers to the supervision by COBAC, which consists of respecting the regulatory measures that are relevant to the MFI and the infliction of a penalty for any observed failure (Art. 53 of the CEMAC regulation on microfinance). We hypothesize that this control improves the performance of MFIs (Tchakoute Tchuigoua, 2010a). Some recent works test the relationship between the regulation and the performance of MFIs (Hartarska and Nadolnyak, 2007; Mersland and Strøm, 2009). Generally, the results show that there is no significant effect of regulation on the viability and social efficiency of MFIs. In particular, Cull et al. (2011) show in their study that this absence of a significant effect depends on the estimation model adopted. In fact, by using the ordinary least squares method, they identify a negative and significant relationship between the level of regulation and the financial selfsufficiency and economic profitability of MFIs. The results of the study by Tchakoute Tchuigoua (2010b) in the African context also establish a very significant connection between regulation, viability and profitability. Hartarska and Nadolnyak (2007) conclude that the absence of a significant effect does not exclude the presence of an indirect effect. According to these two authors, the regulation allows MFIs to increase their capacity for transformation by gaining access to deposits and external lines of financing and, consequently, to improve their financial results. Concerning external auditing, Hartarska (2005) shows that in central and eastern Europe, there is no significant difference in social and financial performance between MFIs with regard to auditing. The auditing of the accounts has no significant effect on their financial and social performance and does not appear to be efficient as a governance mechanism. The results of the study by Tchakoute Tchuigoua (2010b) rather show that auditing has a negative effect on the profitability of African MFIs.

1.4. Efficiency of the governance mechanisms and the legal status of MFIs

Many empirical studies (Marsal and Bouaiss, 2007; Switzer and Wang, 2013) in the banking sector highlight governance mechanisms as exerting a positive effect on performance. However, those concerning the link between these mechanisms and performance in MFIs produce rather reserved results, which in the majority of cases are non-significant (Hartarska and Nadolnyak, 2007; Mersland and Strøm, 2009). Although Cull et al. (2011) show in their study that this absence of a significant effect depends on the estimation model adopted, we insinuate that the efficiency of the governance mechanisms in MFIs depends on their adaptability to the MFIs' legal status. According to agency theory, the efficiency of governance mechanisms is minimized in non-profit MFIs (NGOs, cooperatives and mutual institutions); nevertheless, in private companies, these mechanisms are fully efficient. The legal status refers to the chosen legal form duly registered with competent authorities to exercise the microfinance activities and allows the institution to exist as a legal entity (Tchakoute Tchuigoua, 2014). In the CEMAC zone, law no. 01/02/CEMAC/IMAC/COBAC (concerning the conditions of exercise and the control of microfinance activities) classifies MFIs into three categories:

- The first class of MFIs has as its main characteristic the fact that the MFIs collect the savings of their members, which they use for credit transactions exclusively for the benefit of these members and work in the form of associations, cooperative societies or mutual benefit companies;
- The second category of MFIs is established in the form of a limited company. These MFIs collect savings and can grant loans to third parties;
- The third class of MFIs provides loans to third parties using stockholders' equity, without collecting savings. These MFIs include microcredit establishments, projects, companies granting credit to a given economic sector or mutual benefit companies.

Each of these three categories is subjected to specific rules and obligations (see appendix no. 1). Consequently, the contribution of the mechanisms of governance to performance varies according to MFIs' type. The contribution of the present study is its comparison of the effect that the governance mechanisms have on the performance of MFIs according to their legal status. Figure 1 below summarizes the conceptual framework used, which is based on the agency theory. On this basis, we formulate the following four hypotheses:

Hypothesis 1: The effect that the ownership structure exerts on performance differs significantly according to the legal status of the MFI;

Hypothesis 2: The effect of the characteristics of the board of directors on performance differs significantly according to the legal status of the MFI;

Hypothesis 3: The effect of regulation/supervision on performance differs significantly according to the legal status of the MFI;

Hypothesis 4: The effect of external auditing on performance differs significantly according to the legal status of the MFI.

The hypotheses presented above aim to verify whether an effective governance mechanism improves the performance of the MFI. In the second part of this study, dedicated to the methodology, we are inspired by this conceptual framework to develop an empirical model.

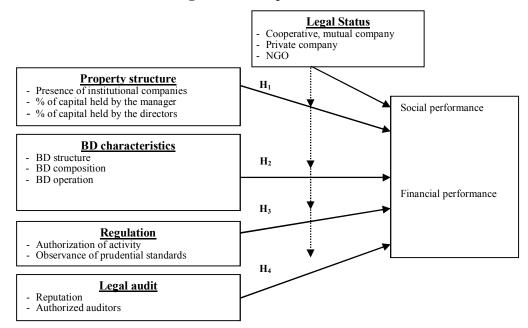


Figure 1: Conceptual framework

2. Empirical model of Cameroonian MFIs

2.1. Empirical models, operationalization of the variables and data collection

All the hypotheses that are proposed in this study are centered on the comparison of the effect of the governance mechanisms (structure of property, board of directors, regulation and auditing) on the performance of MFIs classified according to their legal status. In other words, we try to determine whether the effect of governance mechanisms on organizations' performance varies significantly according to the MFIs' legal status. This exercise consists of testing the following regression models on the global sample:

PERF= $\beta_0 + \beta_i X_i + \varepsilon$ (1): for cooperative and mutual benefit companies (1)

PERF= $\beta_0 + \beta_i X_i + \varepsilon$ (2): for non-profit NGOs

PERF= $\beta_0 + \beta_i X_i + \varepsilon$ (3): for private companies and profit-seeking NGOs

PERF= $\beta_0 + \beta_i X_i + \varepsilon$ (4): a combined model of the three types of MFI

where Xi is the set of explanatory variables (mechanisms of governance); β_0 the constant term; β_i the regression coefficients; and ε the error term.

The operationalization of the variables is performed from the literature (see Table 1). Firstly, we study the various models through linear regression because it is frequently used in similar studies (Tchakoute Tchuigoua, 2014). Secondly, we use Chow's (1960) comparison test. This econometric test consists of determining whether the coefficients are equal for regressions derived from the same model but applied to different data. In our case, the test is used to verify whether the specification of the MFIs, according to their legal status, entails a differentiation of the effects of the governance mechanisms on their performance.

Table 1: Definition and measurement of the variables of the model

Variables	Indicators adopted with reference to previous studies	Name of variables	Modalities	Reference authors
	- Presence of institutional investors		1 if yes and 0 otherwise	Jensen (1993), Mersland and Strøm
Ownership structure	- Share of capital held by the manager	POUR_DIR	% of capital held by the manager	(2008, 2009), Tchakoute Tchuigoua
	- Share of capital held by all the management	POUR_ADM	Cumulative % of capital held by all the directors	(2014)
	- Size of the board of directors (BD)	TAILCA	Total numbers in these MFIs	Mersland and Strøm (2007, 2009), Galema
BD structure	- Separation of the roles of the Chairman of the Board and of the CEO		1 if yes and 2 otherwise	et al. (2012), Strom et al. (2014), Tchakoute Tchuigoua (2014)
	- Duration of the term of office	D_MANDAT	Ordinal variable	
	- Presence of women on the BD	PRES_FEM	1 if yes and 2 otherwise	
	- Presence of a microfinance expert	PRES_EXP	1 if yes and 2 otherwise	
	- Presence of certain executives on the BD	PRES_CAD	1 if yes and 2 otherwise	Rock et al. (2001),
BD composition	- Choice of members following demographic criteria	CRI_DEMO	1 if yes and 2 otherwise	Galema et al. (2012), Hartarska and Mersland (2012),
	- Participation of clients/employees	PAR_CLT	1 if yes and 2 otherwise	Strøm et al. (2014)
	- Presence of independent experts	PR_EXPIN	1 if yes and 2 otherwise	
	- Presence of a committee(s) on the BD	PR_COMIT	1 if yes and 2 otherwise	
BD operation	Frequency of meetingsEfficiency of the	REG_REUN EFFI_REU	1 if yes and 2 otherwise 1 if yes and 2 otherwise	Rock et al. (2001) Strøm et al. (2014)

	meetings				
	- Freedom of speech for all standpoints	LIB_EXPR	1 if yes and 2 otherwise		
	- Direct communication between the management and the BD	COM_DGPC	1 if yes and 2 otherwise		
	- Authorization of activity (agreement)	AUT_EXER	1 if the MFI is approved and 2 otherwise	Hartarska and Nadolnyak (2007),	
Regulation	- Observance of the law	RESPLEGI	1 if 100% of the prudential rules are respected 2 if partially respected	Mersland and Strøm (2009), Cull et al. (2011)	
External audit	Independence of the auditor	IND_AUDI	1 if the audit is undertaken by an independent statutory auditor and 2 if the auditor belongs to the network	Hartarska (2005)	
Financial performance ^(a)	Variation of the economic profitability rate	PERFFIN	1=upward 2=stable 3=downward	Rock et al. (2001),	
Social performance	Coverage rate of the customers (logarithm of the average number of active borrowers (ANB))	PERFSOC	1=low cover if ANB<10000 2=average cover if 10000≤ANB≤30000 3=high cover if ANB>30000	Tchakoute Tchuigoua (2014)	

^(a) Since the sample is characterized by a diversity of institutional forms and consequently by a diversity of strategic targets and intervention approaches, we deemed it appropriate to find a common indicator to measure profitability that can have the same interpretation in all the categories of MFIs. This led us to adopt the variation of the economic profitability rate.

The empirical study concerns Cameroonian MFIs. To our knowledge, very few studies exist on Central Africa and none in the Cameroonian context. From the Cameroonian commercial register, we registered all the microfinance establishments (with an operating commercial office at their disposal) present in the cities of Yaoundé, Douala and Bafoussam, for the simple reason that these cities are not only the largest but also harbor most of the MFIs in Cameroon. As regards the collection of data, a questionnaire meeting the objectives of our study was sent to all the MFIs that have a commercial office in these towns in October 2012. We personally delivered this document to one of the executives in every MFI. A total of 148 administered questionnaires were returned and 137 were retained for the study. The rejection of the other 11 questionnaires was due to the fact that some of the answers were missing.

2.2. Results and discussion

This section presents the results of the study. The descriptive statistics are provided in the first subsection. Then the results of the regression analysis of the basic model are presented, followed by the regression analysis of the models specific to each legal status of the MFIs.

2.2.1 Results of the descriptive analysis

The MFIs of the sample are distributed as follows: 43.3% of them have the status of a non-profit NGO, 29.9% the status of a cooperative/mutual benefit company and 27% the status of a private company or profit-seeking NGO.

The ownership structure of the MFIs of the sample shows that in more than 82% of cases, institutional investors do not participate in the capital. The percentage of the capital held by managers in 73.5% of the cases is less than 5%, whereas that held by the directors is also less than 5% in 51.5% of the cases. The size of the board of directors varies between 8 and 12 members in 47.1% of MFIs. The separation of the roles of the Chairman of the Board (CofB) and CEO is effective in about 60% of the cases. The average term of office of the directors in these MFIs is 3 years.

As regards the composition of the board of directors, we find on the one hand a low level of representativeness of women (27.9%), experts in microfinance (31.2%), MFI executives (14.4%) and independent experts and on the other hand strong representativeness of clients/employees (71.3%). In 18.4% of the cases, the choice of the members is made according to a demographic criterion. Various committees are available for 62.1% of the MFIs within their board of directors. The recourse to committees to carry out certain tasks is based on the principle that smaller, specialized groups can be more efficient than big groups. They can also address certain points more thoroughly. These committees include for example the executive committee, the finance and audit committee, the committee for the appointment of directors, the human resource committee and, in the case of non-profit-seeking institutions, the committee for the collection of funds.

Concerning the functioning of the board, the study reveals that for about 70% of the MFIs, the meetings of the board are rather regularly held and are efficient in nearly 80% of the cases. In 69% of the cases, the members have freedom of speech for the point of view that they want to expose and there is perfect collaboration between the CofB and the CEO in 70.5% of the cases. About 80% of the MFIs receive the authorization of activity and observe the legislation. A total of 68.7% of the MFI accounts are audited by independent statutory auditors. The performance indicators show, as regards the financial criteria, that about 65% of the MFIs are underperforming, whereas, for the social criteria, only 60% are underperforming.

Table 2: Descriptive statistics

Items	Total	Yes		No	
	Total	N	%	N	%
Presence of institutional investors	137	25	18	112	82
Share of capital held by the manager≤5%	137	101	73.5	36	26.5
Share of capital held by all the management≤5%	137	71	51.5	66	48.5
Separation of the roles of the CofB and of the CEO	137	82	60	55	40
Presence of women on the BD	137	38	27.9	99	72.1

¹ In private companies, the General Manager (GM) is the Chief Executive Officer (CEO). In this study, we use the term CEO in both cases.

Presence of a microfinance expert	137	56	41.2	81	58.8
Presence of certain executives on the BD	137	20	14.4	117	85.6
Choice of members following demographic criteria	137	25	18.4	112	81.6
Participation of clients/employees	137	98	71.3	39	28.7
Presence of independent experts	137	34	25	103	75
Presence of committee(s) in the BD	137	85	62.1	52	37.9
Frequency of the meetings	137	96	70	41	30
Efficiency of the meetings	137	107	80	30	20
Freedom of speech for all standpoints	137	95	69	42	31
Direct communication between the management and the BD	137	97	70.5	40	29.5
Authorization of activity (agreement)	137	107	80	30	20
Observance of the law	137	110	80	27	20
Independence of the auditor	137	94	68.7	43	31.3
Financial performance	137	48	35	89	65
Social performance	137	55	40	82	60

2.2.2. Results of the regression analysis of the basic model

To examine the effect of governance mechanisms on MFIs' performance, we performed regressions on the basic models (the 4 equations presented in paragraph 2.1). Model 1 concerns the social performance while model 2 considers the financial performance as the dependent variable. The estimation of these models was performed using the stepwise method. The first step was the estimation of the equation with all its variables. This estimation ended in a non-significant model 1 (the F statistics are very low with an R² of 0.066 and a single significant variable at the level of 5%) and in a significant model 2 (at the level of 1% with an R2 of 50.9% and three significant variables at the level of 5%). We also observe several non-significant correlations between variables. The next step consisted of eliminating, one by one, the non-significant variables, beginning with the least significant, until the final models were obtained. The quality of the regressions is considered to be satisfactory for this type of study on governance (Boubaker et al., 2012), with an R² of 0.208 for model 1 and 0.584 for model 2 as well as two significant variables for model 1 and seven significant variables for model 2 in the absence of multicollinearity. We also performed a multicollinearity test for all the regressions. It is generally considered that a VIF coefficient greater than 10 indicates significant multicollinearity (Neter et al., 1983). All our VIF coefficients are less than 3.4, implying that there is no multicollinearity problem among the factors. Table 3 presents the results of the final estimation of both models.

According to model 1, communication between the manager and the president of the board of directors and respect of the regulation significantly affect the social performance of MFIs at the respective levels of 10% and 5%. This effect is positive as regards communication between the CEO and the president of the board and negative concerning the regulation. The other variables of the model have no significant coefficients and confirm the hypothesis according to which the mechanisms of governance exercise only a small effect on the performance of MFIs. Model 2 seems to be stronger than Model 1 since, according to the results, the percentage of capital held by the manager, the regularity of meetings and the authorization to exercise positively and significantly affect the financial

performance of MFIs. On the contrary, the participation of the clients/employees in the board, the presence of committees within the board, freedom of speech within the board and the respect of regulation have a negative and significant effect on the financial performance of MFIs.

Table 3: Result of the regression on the basic models

Basic model 1 Dependent variable: PERFSOCIAL			Depen	Basic mo		. FIN	
	В	t	Sig.		В	t	Sig.
(Constant)	0.3839	0.9043	0.3678	(Constant)	0.1423	0.4775	0.6339
COM DGPC	0.1898	1.7731	$0,0790^*$	POUR DIR	0.0712	1.8746	0.0635^*
RESPLEGI	-0.2667	-2.0240	0.0454**	$PAR \ \overline{C}LT$	-0.3712	-3.5487	0.001^{***}
N=137	$R^2=0.208$	F=1.416	P=(0.110)	$PR \ \overline{C}OMIT$	-0.0656	-2.0229	0.045^{**}
			ì	$RE\overline{G}$ $REUN$	0.1988	2.3493	0.020^{**}
				$LIB \overline{E}XPR$	-0.2923	-2.9642	0.001^{***}
				$AU\overline{T}$ EXER	0.2148	2.0302	0.044^{**}
				<i>RESPLEGI</i>	-0.1924	-2.0803	0.039^{**}
				N=137	$R^2 = 0.584$	F=7.796	P=(0.000)

**; **; *: significant at the respective levels of 1%, 5% and 10%.

2.2.3. Results of the regression analysis of the models specific to each legal status of MFIs

The ineffectiveness of the mechanisms of governance characterized by the non-significant relationship between the majority of governance mechanisms considered and the performance justify the breaking down of the total sample according to the legal status of the MFIs to appreciate the contribution of the governance mechanisms to the performance of the MFIs in each of the sub-samples.

In this sub-section, we integrate the interaction variable relating to the legal status of the MFI into the previous regression model. As a consequence, the total sample is divided into three sub-samples according to the legal status. Concerning the estimation of the models for the various sub-samples, the same principle as previously mentioned is followed, the stepwise method. We notice in Tables 4 and 4b that by specifying the regression models according to the legal status of the MFI, the results obtained in the previous analysis evolve appreciably. The regression models specific to each legal status are different and the deviation is significant at the 5% level if the performance is measured by the social criteria and at the 1% level if it is measured by the financial criteria. Although the R² is still below average in regression model 2 for groups 2 and 3, the FISHER coefficient is nevertheless significant at the 10% level except for group 3 (the sub-sample of the private companies and the profit-seeking NGOs). Besides, for the models integrating financial performance as the dependent variable, the FISHER coefficients remain significant for every sub-sample and improve as compared with the basic model.

Table 4: Regression model 1 integrating the mediator variable

Group 1: Cooperative/mutual companies Dependent variable: PERFFIN			Group 2 : Non-profit-seeking NGOs Dependent variable: PERFFIN				
	B t		Sig.		В	t	Sig.
(Constant)	-0.451	-0.457	0.653	(Constant)	1.434	2.817	
PR_INSTU	-0.439	-2.069	0.053^{*}	TAILCA	0.230	2.095	0.043**

POUR ADM	0.433	1.859	$0.079^{ ilde{ ide{ ilde{ id}}}}}}}}}}}}}}}}}}} } } } } } } } } } $	PAR CLT	-1.083	-4.656	0.000^{***}
$TAILC\overline{A}$	0.324	2.089	0.051^{*}	LIB EXPR	-0.577	-3.531	0.001***
PRES_FEM	-0.530	-2.372	0.029^{**}	$AU\overline{T}_{EXER}$	0.397	2.296	0.027^{**}
PAR CLT	-1.364	-4.233	0.001^{***}	N=59	$R^2 = 0.65$	F=1.84	P=(0.06)
LIB_EXPR	-0.706	-3.928	0.001***				ì
N=41	$R^2=0.76$	F=3.58	P=(0.04)				

Group 3: Private companies and profit-seeking NGOs Dependent variable: PERFFIN						
	В	t	Sig.			
(Constant)	-0.283	-0,683	0.504			
PR INSTU	0.382	1.913	0.074^{*}			
$PO\overline{U}R$ DIR	0.129	4.281	0.001***			
$DUAL^{-}$	0.278	2.012	0.061^{*}			
D $MANDAT$	0.351	3.696	0.001			
$P\overline{R}ES$ FEM	-0.278	-2.375	0.030^{**}			
CRI $\bar{D}EMO$	-0.604	-2.488	0.024^{**}			
REG_REUN	0.665	6.533	0.000			
N=37	$R^2=0.925$	F=9.856	P=(0.000)			

Chow test: significant difference between the regressions of the 3 sub-groups at the level of 1% ****, ***; *: significant at the respective levels of 1%, 5% and 10%

Table 4b: Regression model 2 integrating the mediator variable

Group 1: Cooperative/mutual companies Dependent variable: PERFSOC				Group 2: profit-seekin ent variable:	ng NGOs	C	
	В	t	Sig.		В	t	Sig.
(Constant)	-0.574	-0.294	0.772	(Constant)	1.622	1.973	$0.056^{^{*}}$
PR INSTU	-1.136	-3.643		COM DĞPCA	0.315	2.001	0.053°
PRES FEM	-0.695	-2.141	0.046^{**}	$RESP\overline{L}EGI$	-0.404	-1.842	0.073^{*}
REG_REUN	0.979	1.901	0.073^{*}	N=59	$R^2 = 0.45$	F=1.84	P=(0.05)
N=41	$R^2 = 0.66$	F=1.78	P=(0.07)				

Group 3: Private companies and profit-seeking NGOs Dependent variable: PERFSOC							
(Constant)	B -1.304	-1.218	Sig. 0.241				
(Considin)			V. 2				
N=37	$R^2=0.470$	F=0.710	P=(0.76)				

Chow test: significant difference between the regressions of the 3 sub-groups at the level of 5%

• The influence of the ownership structure and the performance of MFIs

We consider the ownership structure through three different indicators: the presence of institutional investors, the percentage of the capital held by the manager and the percentage of the capital held by the directors. The result of the basic regression shows that the ownership structure has no incidence on the performance of the MFIs regardless of the indicator. This result confirms most of the empirical studies (Hartarska and Nadolnyak, 2007; Mersland and Strøm, 2009). An analysis of the results of the regressions specific to each category of MFI rather shows that the presence of institutional investors has a negative and significant effect on the social and financial performance of cooperatives and mutual insurance companies (at the 10% level) and a positive and significant effect on the financial performance of private companies and profit-seeking NGOs (at the 10% level). We also note that the percentage of the capital held by the manager exercises a positive and significant effect on the financial performance of private companies and profit-seeking NGOs (at the 1% level). The percentage of the capital held by the directors positively and significantly influences the financial performance of cooperative/mutual benefit companies (at the level of 10%). In the case of non-profit NGOs, variables relative to the structure of ownership were excluded from the model because there is no owner of the capital. The financial resources of non-profit MFIs are granted by investors in the form of subsidies or concessional loans. They can be private foundations, national agencies for economic development, multilateral institutions or private persons. Summarily, the mechanisms of governance relative to the structure of ownership act differently on the performance of MFIs according to their legal status. They have a negative effect on cooperatives and mutual benefit companies, no effect on non-profit NGOs and a positive effect on private and profit-seeking NGOs. This result leads us to confirm hypothesis 1.

The effect of the nature of the board of directors and its structure on the performance of MFIs

The various domains associated with the nature of the board of directors are the structure, the composition and the conditions of functioning of the board.

To understand the effect of the BD structure on the performance of MFIs, three indicators were selected. These are the size, the separation of the roles of CofB and CEO and the term of office. The results of the basic regression also confirm the results of many empirical studies (Mersland and Strøm, 2009; Tchakoute Tchuigoua, 2014), according to which the structure of the board has no effect on the social and financial performance of MFIs. On the other hand, the specification of the regression models according to the legal status of the MFIs leads us to the result that the size of the board has a positive and significant effect on the financial performance of non-profit NGOs (at the level of 5%) and on the performance of cooperative/mutual benefit companies (at the level of 10%). It remains non-significant for private companies and profit-seeking NGOs regardless of the performance indicator. A too restricted or too large board contributes to a lower performance level than an average-size board

(between 8 and 12 members). Thus, our results are not in line with the conclusions obtained by Mersland and Strøm (2009) and Tchakoute Tchuigoua (2014). On the other hand, they confirm those of Hartarska (2005). Regarding the separation of the roles of CofB and CEO, it has only a positive and significant effect on the global performance of private companies and profit-seeking NGOs (at the threshold of 10%). This result is not in line with those of Mersland and Strøm (2009) for MFIs and Fogelberd and Griffith (2000), who find no significant relation between the accumulation of the functions of CEO and CofB and the organization performance. It turns out that in the case of cooperatives and mutual insurance companies, this indicator was excluded from the model because, in such categories of MFIs, there is no separation between property and decision-making power. Nevertheless, the results of the present study show that there are good reasons for separating the roles of CEO and CofB. Firstly, this avoids the concentration of power in the hands of a single person, who, by assuming both offices, is responsible for the operational and strategic activities of the institution. Secondly, this separation of roles facilitates the periodic evaluation of the CEO's performance and prevents any risk that the latter will moderate the Board of Directors' debates to the benefit of his own future career.

The term of office also has a significant positive effect on the financial performance of private companies and profit-seeking NGOs (at the level of 1%) and is not significant for the other types of MFI. The term of office of the directors is often limited to a certain number of years. Several MFIs in the category of private companies and profit-seeking NGOs have adopted mandates spread over three years. This duration seems to be convenient for obtaining the desired balance between continuity and the renewal of the term of office.

To understand better the effect of the composition of the BD, we identified seven relevant indicators to measure it. These include the presence of women, microfinance experts, MFI executives, at least one client/employee and at least one independent expert on the BD and on committees within the board, as well the demographic criterion in the choice of directors.

The basic regression model shows that the participation of clients/employees in the board of directors and the presence of at least one committee have a negative and significant effect on the financial performance of the sample MFIs (at the level of 5%). However, the analysis of the regression models by sub-sample gives better results.

The presence of women has a negative effect (significant at the level of 5%) on the social and financial performance of cooperative and mutual benefit companies as well as on the financial performance of private companies and profit-seeking NGOs. This result is partially opposite to the finding of Strom et al. (2014), which suggests that outreach performance is improved when MFI boards have a higher share of female members. We carried out 5 semi-directive interviews with women who are members of a BD to explain this statistical result. It appears that female members of a BD have a greater aversion to risk than male members. This aversion to risk leads them to grant fewer risky loans and, on average, this leads to lower social (cover rate) and financial performance, particularly in cooperatives

and mutual benefit companies, in which women are better represented. The credit risk and the financial performance seem to evolve in opposite directions. In this study, during a period of crisis, the relationship is rather the reverse. This observation concerning the risk aversion of female members of the BD is also identified by Parrotta and Smith (2013). This is a hypothesis that we shall try to test within the framework of future research on MFIs.

The demographic criterion for the choice of the directors negatively and significantly influences the financial performance of the category of private companies and profit-seeking NGOs. It is not significant for the other categories of MFIs. This demographic criterion in the composition of the board impairs the MFIs' financial performance. Our results are in line with those of Ahern and Dittmar (2012), which show that companies tend to choose the composition of their board in an optimal way, according to the characteristics of their market and their business model. They are thus destabilized by any rule that imposes a forced composition of the board. The participation of clients/employees in the BD negatively and significantly influences the financial performance of MFIs in the category of cooperatives/mutual benefit companies and non-profit NGOs at the 5% level. This result confirms that of Hartarska and Mersland (2010), according to which MFIs are less successful when they have a greater proportion of internal employees within the BD. Regarding the presence of an independent expert, it exerts a significant effect only on the social performance of non-profitmaking NGOs. This effect is negative and significant at the 1% level. The other indicators chosen to measure the impact of the BD composition on performance are not significant regardless of the type of performance and the legal status of the MFI considered. These results are partially in opposition to those of Mori et al. (2015), which support the hypothesis that board composition is important in helping MFIs to achieve their social objectives.

To gain a better understanding of the effect of the BD's functioning in the performance of MFIs, we selected four indicators. These are the regularity of the meetings, their efficiency, freedom of speech and, finally, communication between the CofB and the CEO. The general model shows that the functioning of the board exercises a significant effect on the financial performance of all the MFIs of the sample if the latter is measured by freedom of expression and the regularity of the meetings. The specification of the regression model by the type of MFI allows us to reveal a positive and significant effect of the regularity of the meetings on the social performance of cooperative/mutual benefit companies and on the financial performance of private companies and profit-seeking NGOs (at the level of 5%). As for freedom of expression, it exercises a negative and significant effect only on the financial performance of cooperative/mutual benefit companies (at the level of 1%). As a whole, this result is rather logical, considering that in this category of MFI, every person has only one voting right (the voting rights are not proportional to the collected funds or to the shares held). The other indicators used to capture the effect of the functioning of the board do not produce statistically significant results. This analyses show that governance mechanisms related to the nature of the board of directors have

rather differentiated effects on performance depending on the legal status. This confirms hypothesis 2 of this study.

• The effect of regulation on the performance of MFIs

In this study, we retain the authorization to exercise and the respect for the regulations as the main indicators of the regulation/supervision of the MFIs in the sample. The general model shows that the authorization to exercise and the respect for the regulations have a significant effect on the social performance of MFIs. A more thorough analysis of the regression results specific to every type of MFI shows, on one hand, that the authorization to exercise positively and significantly influences the financial performance of the sub-sample of cooperative/mutual benefit companies and, on the other hand, that respect for the regulations negatively and significantly influences the social performance of non-profit NGOs only. This result, which confirms hypothesis 3, shows that the observance of prudential regulations prevents excessive risk-taking on behalf of the BD or of the management under the work contract and thus protects the members of the cooperative credit union and their savings. The regulations are therefore beneficial to the MFIs of the sample. This shows that the costs involved in regulation are more than compensated for by the benefits that result from it. This result confirms that of Tchakoute Tchuigoua (2014) and contradicts those of Hartarska and Nadolnyak (2007) and Mersland and Strøm (2008), who find no significant influence of supervision on the performance of MFIs. It does not enable us to confirm the results of Hartarska (2005) and Cull et al. (2011), which show that the costs involved in regulation negatively affect performance.

• The effect of auditing on the performance of MFIs

The independence of the auditor is chosen as a measure of the variable "auditing" on the performance of MFIs. According to the general model, there is no relationship between auditing and the performance of MFIs. This result is in line with that of Hartarska (2005) and is contrary to that of Tchakoute Tchuigoua (2014). An analysis of the regressions specific to every type of MFI rather reveals that auditing exercises a positive and significant effect (at the 5% level) on the financial performance of non-profit NGOs, but this effect is not significant for the two other categories of MFIs. This result confirms hypothesis 4 and shows that the efficiency of the external auditing differs according to the legal status of the MFI.

Table 5: Summary of the study results

Tested hypothesis	Validation of the hypothesis
H1: The effect that the ownership structure exerts on performance differs significantly depending on the legal status of the MFI.	yes
H2 : The effect of the characteristics of the BD on performance differs significantly depending on the legal status of the MFI.	yes
H3 : The effect of regulation/supervision on performance differs significantly depending on the legal status of the MFI.	yes
H4: The effect of external auditing on performance differs significantly depending on the legal status of the MFI.	yes

In this summary table, we notice that the four hypotheses put forward in this study are accepted and confirm the predictions of the literature. Globally, these results show that there is a significant relationship between certain governance mechanisms and the performance of MFIs and that the adjustment of the governance mechanisms according to the legal status of the MFIs improves their efficiency.

Conclusion

The problem of the relationship between governance mechanisms and performance is the subject of several studies within companies but remains little explored in organizations such as MFIs. Although numerous works find a relationship between the mechanisms of governance and the performance of companies (Brown et al., 2004), there are rather few in the context of MFIs (Thrikawala et al., 2013b). The aim of the present study is to verify empirically whether the effect that the mechanisms of governance exert on the performance of MFIs depends on their legal status.

We base our study on the current micro-finance governance literature and on data collected by a questionnaire administered to a sample of 137 Cameroonian MFIs in 2012. After the analysis, two main results are obtained. Firstly, at the global level, very few mechanisms of governance have a significant effect on the performance of the MFIs. In fact, out of 20 variables characterizing the governance mechanisms, it turns out that only 8 have a significant effect on social and financial performance.

Secondly, a comparative analysis shows that the implementation of differentiated governance mechanisms according to the legal status of the MFI (cooperative and mutual benefit companies, non-profit NGOs, and private companies and profit-seeking NGOs) improves their performance. This

indicates that the mechanisms that affect performance are relatively different according to the category of MFI. These results consolidate the idea that the analysis of the impact of the mechanisms of governance on the performance of MFIs requires not only an approach that is specific to the sector, but also an approach that is adapted to the type of ownership (legal status). Moreover, from a managerial point of view, it would be desirable to adjust the mechanisms of governance according to the legal status of the MFIs to make them perform better from the social point of view as well as the financial one. In particular, the separation of the roles of CofB and CEO seems necessary for the performance of private companies and profit-seeking NGOs. These results bring interesting perspectives for consideration of the legal status of social utility companies as well as their governance to improve their efficiency.

However, these results must be interpreted with caution because in this study we only retained the MFIs that answered our questionnaire. Different results could be obtained with a more important sample or if we were to integrate other variables connected to MFI governance mechanisms. The extension of this study to other countries is therefore an avenue for future research that we shall soon examine.

Finally, the evaluation of social performance cannot be reduced to the targeting of the poor. It would also be interesting to carry out an analysis of the impact to gain a better understanding of the global social performance, even though there are always difficulties regarding the method used to isolate the specific effects of the microfinance services on the clients (Kanti Das and Bhowal, 2013).

References

- Ahern K., Dittmar A. (2012). The Changing of the Boards: The Impact on Firm Valuation of Mandated Female Board Representation. *Quarterly Journal of Economics*, 127(1), 137–197.
- Altunbas Y., Evans L., Molyneux P. (2001). Bank Ownership and Efficiency. *Journal of Money, Credit, and Banking*, 33, 926–954.
- Arun T. (2005). Regulating for Development: The Case of Microfinance. *Quarterly Review of Economics and Finance*, 45(2–3), 346–357.
- Boubaker S., Nguyen B.D., Nguyen D.K. (2012). *Corporate Governance, Recent Developments and New Trends*. Springer-Verlag, Berlin Heidelberg, 432 p.
- Brown L.D., Caylor M.L., Marcus L. (2004). Corporate Governance and Firm Performance. SSRN: http://ssrn.com/abstract=586423
- Campion A., Frankiewicz C. (1999). Guidelines for the Effective Governance of Microfinance Institutions, Microfinance Network. Occasional Paper 3, CGAP, Washington DC.
- Caprio G., Levine R. (2002). Corporate Governance of Banks: Concepts and International Observations. Global Corporate Governance Forum. Research network meeting, April 5.
- Chaves R., Gonzalez-Vega C. (1992). Principles of Regulation and Prudential Supervision: Should They Be Different for Microenterprise Finance Organizations? Economics and Sociology Occasional Paper no. 1979, Ohio State University, 42 p.
- Chow G.C. (1960). Tests of Equality between Sets of Coefficients in Two Linear Regressions. *Econometrica*, 28(3), 591–605.
- Ciancanelli P., Reyes Gonzalez J.A. (2001). Corporate Governance in Banking: A Conceptual Framework. SSRN: http://ssrn.com/abstract=253714.
- Cull R., Demirgüç-Kunt A., Morduch J. (2011), Does Regulatory Supervision Curtail Microfinance Profitability and Outreach? *World Development*, 39(6), 949–965.
- Erkens D.H., Hung M., Matos, P. (2012). Corporate Governance in the 2007–2008 Financial Crisis: Evidence from Financial Institutions Worldwide. *Journal of Corporate Finance*, 18(2), 389–411.
- Eyada Ayissi T. (2007). Mode de gouvernance et pérennité des Etablissements de microfinance en Afrique Centrale. In Kala Kamdjoug J.K., editor. *La microfinance, outil de financement pour l'économie sociale et informelle en Afrique Centrale*. Presses de l'UCAC, Douala, 22–39.
- Fama E.F., Jensen M.C. (1983). Separation of Ownership and Control. *Journal of Law and Economics*, 26, 301–325.
- Galema R., Lensink R., Mersland R. (2012). Do Powerful CEOs Determine Microfinance Performance? *Journal of Management Studies*, 49(4), 718–742.
- Hartarska V. (2005). Governance and Performance of Microfinance Institutions in Central Eastern Europe and the Newly Independent States. *World Development*, 33(10), 1627–1643.
- Hartarska V., Mersland R. (2010). What Governance Mechanisms Promote Efficiency in Reaching Poor Clients? Evidence from Rated Microfinance Institutions. *European Financial Management*, 18(2), 218–239.
- Hartarska V., Nadolnyak D. (2007). Do Regulated Microfinance Institutions Achieve Better Sustainability and Outreach? Cross-Country Evidence. *Applied Economics*, 39, 1–16.
- Jensen M.C. (1993). The Modern Industrial Revolution, Exit, and the Failure of Internal Control Systems. *Journal of Finance*, 48(3), 831–880.
- Jensen M.C., Meckling W.H. (1992). Specific and General Knowledge and Organizational Structure, in Werin L., Wijkander H., editors. *Contract Economics*. Basil Blackwell Press, Oxford, 251– 274.
- Kamajou F. (2005). Les institutions de microfinance: Instrument de lutte contre la pauvreté. In Kala Kamdjoug J.K., editor. *La microfinance, outil de financement pour l'économie sociale et informelle en Afrique Centrale*, Presses de l'UCAC, Douala, 59–74.
- Kanti Das S., Bhowal A. (2013). Impact of Micro Finance: Perceptions of Direct Stakeholders of Self Help Groups. *International Journal of Business and Economics Research*, 2(6), 142–157.
- Lascelles D., Mendelson S., Rozas D. (2014). *Microfinance Banana Skins 2014: The CSFI Survey of Microfinance Risk*. Centre for the Study of Financial Innovation (CFSI), July, 84p.

- Licht A.N., Goldschmidt C., Schwartz S.H. (2005). Culture, Law, and Corporate Governance. *International Review of Law and Economics*, 25(2), 229–255.
- Macey J.R., O'Hara M. (2003). The Corporate Governance of Banks. *Federal Reserve Bank of New York, Economic Policy Review*, 9(1), 91–107.
- Marsal C., Bouaiss K. (2007). Les mécanismes internes de gouvernance dans les banques: un état de l'art. *Notes de Recherche du FARGO*, Université de Dijon.
- Mersland R., Strøm R.Ø. (2008). Performance and Trade-Offs In Microfinance Institutions Does Ownership Matter? *Journal of International Development*, 20(5), 598–612.
- Mersland R., Strøm R.Ø. (2009). Performance and Governance in Microfinance Institutions. *Journal of Banking and Finance*, 33(4), 662–669.
- Monea M., Guță A. J. (2011). The Relevance of the Performance Indicators in Economic and Financial Diagnosis. Annals of the University of Petrosani, 11(4), 207-214.
- Mori N., Golesorkhi S., Randøy T., Hermes N. (2015). Board Composition and Outreach Performance of Microfinance Institutions: Evidence from East Africa. *Strategic Change*, 24(1), 99–113.
- Neter J., Wasserman W., Kutner M.H. (1983). *Applied Linear Regression Models*. Irwin, Homewood, IL.
- Oster S.M. (1995). Strategic Management for Non-Profit Organizations, Theory and Cases. Oxford University Press, New York and Oxford.
- Parrotta P., Smith N. (2013). Female-Led Firms: Performance and Risk Attitudes. *IZA Discussion Paper*, No. 7613.
- Pierret D., Doligez F. (2005). La gouvernance, nœud gordien de la microfinance? IRAM, Note thématique n°1.
- Rock R., Otero M., Saltzman S. (2001). *Principes et pratiques de la gouvernance en microfinance*. Microenterprise Best Practices, ACCION International, Bethesda, USA, 46 p.
- Rosenberg R., Gonzales A., Narain S. (2009). *The New Moneylenders: Are the Poor Being Exploited by High Microcredit Interest Rates?* Occasional Paper 15, CGAP, Washington DC.
- Staschen S. (1999). Regulation and Supervision of Microfinance Institutions: State of Knowledge. GTZ, Eschborn.
- Staschen S. (2003). Regulatory Requirements for Microfinance. A Comparison of Legal Frameworks in 11 Countries Worldwide. GTZ, Eschborn.
- Strøm R.Ø., D'Espallier B., Mersland R. (2014). Female Leadership, Performance, and Governance in Microfinance Institutions. *Journal of Banking and Finance*, 42, 60–75.
- Switzer L.N., Wang J. (2013). Default Risk Estimation, Bank Credit Risk, and Corporate Governance. *Financial Markets, Institutions & Instruments*, 22(2), 91–112.
- Thrikawala S., Locke S., Reddy K. (2013a). Corporate Governance-Performance Relationship in Microfinance Institutions. *Asian Journal of Finance & Accounting*, 5(1), 160–182.
- Thrikawala S., Locke S., Reddy K. (2013b). Social Performance of Microfinance Institutions (MFI): Does Existing Practice Imply a Social Objective? *American Journal of Business and Management*, 2(2), 173–180.
- Tchakoute Tchuigoua H. (2010a). Is There a Difference in Performance by the Legal Status of Microfinance Institutions? *Quarterly Review of Economics and Finance*, 50(4), 436–442.
- Tchakoute Tchuigoua H. (2010b). L'influence des mécanismes de gouvernance sur la performance des institutions de microfinance d'Afrique Sub-saharienne. CEB Working Paper no. 10/026.
- Tchakoute Tchuigoua H. (2014). Performance of Microfinance Institutions: Do Board Activity and Governance Ratings Matter? *Finance*, 35(3), 7–52.

Appendix no. 1: Legislation on Microfinance Institutions in Cameroon

The microfinance sector in Cameroon is governed by regulation no. 01/02/CEMAC/IMAC/COBAC relating to the conditions of exercise and control of microfinance activity in the CEMAC. This regulation is sub-divided into two parts: (1) the regulation itself decreed by the ministerial committee and (2) the various regulations prescribed by the banking commission; these regulations give the precise details about the various provisions of what could be called the General Regulation. It deals with organization, agreement and prior authorization, and control through its 21 prudential rules. In particular, rule 2002/01 defines the level of patrimonial funds below which the relieving measure concerning the prudential and reporting standards for the MFI of the first category, the said "small-size" MFIs, are applicable: the last line of the balance sheet lower than or equal to 50 million FCFA.

Every year, the first-category MFIs should reserve 20% of their profit (regulation 2002/06). Regulation 2002/07, relating to risk coverage, defines a solvency ratio to limit the risk taking of MFIs. The ratio between the net patrimonial funds and the net equity capital (at the numerator) and the credits lessened by the provisions made (at the denominator) must be permanently higher than or equal to 10%.

Regulation 2002/08, concerning the distribution of risk, stipulates that the first-category MFIs should not record for the same borrower a credit liability higher than 15% of their net patrimonial funds.