How Do Private Family Firms Face the Crisis? Empirical Evidence from Belgium

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Abstract

Whereas listed family firms have already received great attention concerning the effect of the crisis on performance, few studies focus on private family firms acting in a hostile environment. This paper tries to fill this gap by investigating how the financial and economic crises affect the relationship between family involvement and performance. This research is led on the Belgian market and based on panel data collected on the period 2002-2011. Multiple regression analysis and Heckman two-steps method show that private family firms exhibit greater performance during the crisis. These results seem to confirm that family involvement enhances potential of resilience in private firms so that they outperform their non-family peers during periods of crisis.

Keywords: family firms, family involvement, organisational resilience, performance

1. Introduction

Family firms receive an ample consideration in the literature since twenty years. Indeed, family firms have long been known as a sub-optimal organisation but their considerable weight in economy has created a relevant field for researchers (Ifera, 2003; Duh et al., 2009). Numerous researches have focused on the relationship between family ownership and performance. Nevertheless, even if family firms' outperformance seems to predominate in the literature (Charreaux, 1991; Coleman & Carsky, 1999; Anderson & Reeb, 2003; Andres, 2008; Bughin & Colot, 2008; Ahmad & Amran, 2010), neutral (Chrisman et al., 2004; Jaskiewics et al., 2006; Rutherford et al., 2008) and negative (Yurtoglu, 2000; Barth et al., 2005; Klein et al., 2005; Giovannini, 2010; Kowalewski et al., 2010) effects of family ownership on performance are also noticed.

Besides, companies have to cope with the financial and economic crisis since 2008. This special context creates an opportunity to analyse firms' performance in a hostile setting (Chrisman et al., 2011). Whereas this problematic has already been studied in previous research focusing on large listed firms (Lemmon & Lins, 2003; Lins et al., 2011), this issue remains under-investigated in private family firms (Astrachan, 2010). This paper tries to fill this gap by analysing how the crisis affects the relationship between family involvement and performance.

In order to answer this interrogation, agency (Jensen & Meckling, 1976) and socioemotional (Gomez-Mejia et al., 2007) perspectives as well as the frame of organisational resilience (Bloch et al., 2012) are developed and applied to private family firms. Indeed, limited agency costs due to the overlap of ownership and management (Jensen & Meckling, 1976; Anderson & Reeb, 2003) and the strong identification of family members and external stakeholders with the organisation (Gomez-Mejia et al., 2007) are likely to provide private family firms with a competitive advantage in order to cope with unexpected situations such as the sudden financial crisis.

This research is led on panel data collected over the period 2002-2011 on the Belgian market of private firms. Multiple regression analysis is used in order to determine how the crisis influences the relationship between family involvement and performance. Moreover, as endogeneity problems can appear when analysing the influence of ownership on performance (Demsetz & Lehn, 1985; Demsetz & Villalonga, 2001; Maury, 2006), Heckman two-steps method is used in order to mitigate reversed causality and auo-selection issues.

The structure of this paper contains several sections. A literature review analysing the relationship between family involvement and performance in a context of crisis is proposed in a first section. Methodology and results

are illustrated in the subsequent sections. Finally, the conclusion, limitations and research perspectives are developed in a last section.

2. Family Involvement, Performance, and the Crisis

Family firm is the kind of organisation presenting the longest life expectancy throughout the world (Miller & Le Breton-Miller, 2005). Some of them pursue their activity since the sixties although they had to cope with turbulences such as economic recession or political turmoil (Kenyon-Rouvinez & Ward, 2004; James, 2006). Despite a statement of sustainability in family firms, the origins of their longevity are not well known. More specifically, their ability to deal with structural shocks stays under-investigated (Astrachan, 2010). An approach based on the concepts of High Reliability Organisation (Weick & Roberts, 1993; Weick & Sutcliffe, 2007) and organisational resilience (Bégin & Chabaud, 2010; Chrisman et al., 2011) is relevant to create a theoretical frame explaining the relationship between family ownership and performance during the financial crisis.

Arrègle et al. (2007) underline that the family brings in the company several specifics inputs in terms of capital, labour, intellectual capacity, culture and trust. The combination of these factors would improve the decision—making processes and the functioning of the governance mechanisms implemented in the firm. Zahra et al. (2008) also indicate that the presence of the family stimulates the promotion of a strong culture valuing active participation. This family involvement is considered as an important driver of family firm's longevity and sustainability (Pieper, 2007). Moreover, as mentioned by Bloch et al., (2012), family firms manage the combination of entrepreneurship and sustainability orientations to meet the five criteria of high reliability organisation, namely failure obsession, simplification mistrust, operational sensitivity, will of survival and deference to expertise. The importance given to reliability in family firms confers them a capacity of adaptability and shock absorptions when they have to cope with exogenous shocks. In that respect, Bloch et al., (2012) find a positive and significant relationship between family ownership and firm's economic and financial performance during the financial crisis from 2008 as well as during the period of the Internet bubble explosion, indicating that family firms are more able to deal with a sudden event.

Moreover, by positioning under the agency perspective, the alignment of interests between owners and managers in family firms is an undeniable competitive advantage during a crisis period (Anderson & Reeb, 2003). Indeed, the conflict of interest is more pronounced in non-family firms where the long term orientations from the owners and the short term motivations from the manager are more costly when a shock occurs. An example can illustrate this assumption. Managers have an undeniable incentive to invest in a risky project when the company is close to bankruptcy since they can take advantage of the excess of risk in such an operation without being penalised in the case of failure (Zhou, 2012). However, such a situation is more likely to occur during an economic crisis. Family firms where an overlap between majority owners and managers interests is usual do not meet that kind of problem. Villalonga and Amit (2006) show that family firms where the founder is still the CEO outperform other family firms. Besides, the financial crisis context contributes to a reinforcement of credit terms and conditions granted to companies as well as a decrease in the consumers' demand. These factors have an impact on the firm performance. Lins et al., (2011) note that the relationship between the presence of a blockholder and the firm valuation is exacerbated during a crisis period. Indeed, that kind of shareholder offers an easier access to internal and external funding (Wruck, 1989; Hertzel & Smith, 1993; Stein, 1997), an asset on the product market (Kahnna & Palepu, 2000) and a better control (Shleifer & Vishny, 1997). Private family firms, characterised by the presence of a dominant family blockholder, benefit from these advantages when they face turbulences in the economic environment.

Outperformance of family firms during the crisis can also be explained by the fact that family owners usually want to preserve their socioemotional wealth (Gomez-Mejia et al., 2007). Indeed, due to their strong identification with the firm and willingness to pass a clean and sustainable company onto subsequent generations, family principals display greater concerns for family reputation and image (Berrone et al., 2012). In that sense, Chen et al. (2010) and Steijvers and Niskanen (2011) find that family firms are less tax aggressive than non-family firms, family owners preferring to preserve the image of the firm rather than to benefit from tax advantages which can induce administrative enquiries or penalties and therefore deterioration in firm reputation. This importance devoted to the confection of an unblemished reputation enables family firms to develop robust trade relationships with suppliers and customers. In a crisis period, this vector of organisational resilience leads family firms to manage gross sales margin in a more efficient way (Bloch et al., 2012).

Long-term orientations in family firms (Miller & Le Breton-Miller, 2005), the importance given to the family firms reputation (Chen et al., 2010) in order to maintain good relationships with external stakeholders (Miller & Le Breton-Miller, 2005), and the lower agency costs in this type of company (Anderson & Reeb, 2003) enable to

postulate:

H1: Family ownership is positively linked with firm performance in a context of economic turmoil.

3. Methodology

3.1 Target Population and Sample

Firstly, firms presenting an average number of permanent staff higher than 100 workers are collected in order to obtain all the financial information needed since these companies have to publish full-format accounts. After elimination of firms from financial and assurance sectors, the sample comprises 1.999 companies. Companies for which data are omitted or abnormal are eliminated from the sample. Each firm is then considered as a family business if it fulfils at least two of the following criteria:

- a family owned at least 50% of the firm's shares;

- a family has a decisive influence on corporate and transmission strategies. This criterion is fulfilled if management is mainly exercised by a family;

- the majority of the board is composed of family members.

This multi-criteria definition of the family business is regularly used in the literature (Anderson & Reeb, 2003; Arrègle et al., 2008; Colot, 2010). Each criterion has the particularity of being easily measured. Indeed, the financial database Belfirst (Note 1) is full of information concerning firms' ownership structure. Moreover, by using each firm's website, ownership information is compared with Belfirst and other information relative to board and management composition are collected. Besides, our definition of the family firm also takes into account the pyramidal structures which are regularly used in family businesses to maintain their control over a firm without owning the majority of its shares (Laporta et al., 1999). Therefore, the use of this selective method determines the real involvement of the family in the firm. 112 family firms have been found by using these criteria. The weak number of family firms identified is mainly due to the opacity regarding the disclosure of ownership structure information since companies frequently use cross-shareholding or holding structure (Gombers et al., 2010).

In order to limit demographic biases related to size and sector, non-family firms have been chosen to ensure a comparability balance in our sample. Indeed, as mentioned by Oogheand Van Wymeersch (2006), financial indicators can be sensitive to economic activities and size. Each non-family firm was thus selected according to the following criteria:

- activity sector: NACEBEL code (Belgian economic activities nomenclature, with 4 figures) identical to family firms;

- size: total assets cannot vary more than 20% compared to family firms.

By using these other criteria, a sample of 219 family and non-family is collected, separated into 112 family firms and 107 non-family firms.

3.2 Models

Our analysis is based on panel data collected on the period 2002-2010 for 219 private firms. The models are built by using Generalised Least Squares (GLS) and Ordinary Least Squares (OLS) regressions. By referring to the literature in this area (Anderson & Reeb, 2003; Maury, 2006; Chu, 2009), our first equation measures the effect of family ownership on performance and is formulated as follows:

$$Roa_{i,t} = \beta_0 + \beta_1 crisis_t + \beta_2 Family_i + \beta_3 Family_i X\ Crisis_t + \beta_4\ Size_{i,t} + \beta_5 Age_{i,t} + \beta_6 Debts_{i,t}$$
$$+ \beta_7\ Sales\ Growth_{i,t} + \beta_8 Investment_{i,t} + \sum_{s=9}^{S} \beta_s\ Sector_s + \varepsilon_{i,t}$$

Dependent variable. $Roa_{i,t}$ is defined as EBIT of each company i at time t divided by total assets of each company i at time t.

Independent and control variables. $Family_{i,t}$ is a dummy variable taking the value 1 if the company answers our family firm definition, 0 otherwise. $Crisis_t$ is a dummy variable taking the value 1 for the years 2008, 2009 and 2010, 0 otherwise. $Size_{i,t}$ is a control variable for size and approached by the natural logarithm of total asset for each company at time t. $Age_{i,t}$ is a control variable for the age of the company, since this factor can have an influence on the growth and the survival of the firms. By referring on the methods used by Pieper et al., (2008) and Villalonga and Amit (2006), the age for each company is defined as the natural logarithm of the number of years since its creation. $Debts_{i,t}$ is a variable to control for the effect of capital structure on performance. It is defined as long term debts divided by total asset for each company at time i. $Sales\ Growth_{i,t}$ is a control variable

for the growth opportunity. This variable is estimated by the sales growth rate for each firm i at time. $Investment_{i,t}$ is a control variable to catch investment intensity. It is estimated as capital expenditure divided by sales for each company i at time t. $Liquidity_{i,t}$ is defined as restricted current assets divided by short terms debts for each company i at time t. $Sector_s$ is a dummy variable taking into account the sector affiliation.

4. Results

4.1 Descriptive Statistics

Means and medians describing the main characteristics of our sample are mentioned in table 1. It can be stated that family firms significantly outperform non-family firms in terms of sales and ROA (p < .10 and p < .01 respectively). Family firms are significantly smaller than non-family firms if we refer to total assets and the number of employees (p < .05). Family firms are also significantly older than non-family firms with a difference in mean of more than 3 years and a difference in median of 5 years. Furthermore, family firms surprisingly display higher levels of long-term debts than non-family firms (p < .01). Concerning investment intensity and liquidity, we can conclude in a significant difference between family and non-family firms.

Table 1. Descriptive statistics

	Family firms (N=112)		Non-family firms (N=107)		p-value for differences	
	Mean	Median	Mean	Median	Mean	Median
ROA	0.055	0.0422	0.038	0.038	0.001	0.101
Sales	84208	32206.5	74731	34764	0.074	0.012
Total asset	52792	21719.5	92181	22697	0.042	0.103
Employees	332	112	351	173	0.041	0.017
Age	33	29	30	24	0.000	0.000
Liquidity	1.494	1.22	1.465	1.21	0.519	0.570
Debts	0.121	0.0762617	0.0932633	0.025	0.000	0.000
Invest/Total asset	0.042	0.009	0.038	0.006	0.311	0.432

Notes: the two last columns report the two-sided p-values for the difference between family and non-family firms in means and median, respectively. T-tests (Wilcoxon rank tests) are used to test the difference in means (medians).

Table 2. Pearson correlation matrix

	ROA	Family	Size	Age	Debts	Sales Growth	Invest/Sales	Inv/Tot assets	Liquidity	Crisis
ROA	1									
Family	0.023**	1								
	(0.078)									
Size	0.004	-0.038	1							
	(0.842)	(0.112)								
Age	0.004	0.109***	0.117***	1						
	(0.863)	(0.000)	(0.000)							
Debts	-0.204***	0.098***	0.156***	-0.131***	1					
	(0.000)	(0.000)	(0.000)	(0.000)						
Sales Growth	-0.007	0.024	-0.001	-0.006	0.0349	1				
	(0.765)	(0.311)	(0.988)	(0.784)	(0.1447)					
Invest/Sales	-0.038	0.032	0.046	-0.030	0.1146***	-0.004	1			
	(0.111)	(0.171)	(0.050)	(0.209)	(0.0000)	(0.877)				
Inv/Totassets	0.100	0.032	0.007	-0.012	0.1208***	-0.009	0.663***	1		
	(0.675)	(0.171)	(0.746)	(0.597)	(0.0000)	(0.713)	(0.000)			
Liquidity	0.240***	0.010	-0.011	0.122***	0.1698***	-0.016	-0.022	-0.014	1	
	(0.000)	(0.651)	(0.632)	(0.000)	(0.0000)	(0.495)	(0.346)	(0.535)		
Crisis	-0.043***	0.000	0.126***	0.135***	0.0033	-0.020	-0.043**	-0.068***	0.052**	1
	(0.0700)	(1)	(0.000)	(0.000)	(0.8902)	(0.392)	(0.009)	(0.004)	(0.029)	

Notes: Family is a dummy variable indicating if the company is considered as a family firm in comparison with our definition given previously. ROA is the Return on Assets. Size is the natural logarithm of total asset. Age is the natural logarithm for the difference between the current date and the date of establishment. Debts corresponds to the long term debts divided by total asset. Sales Growth is the turnover growth rate. Invest/Sales corresponds to investments in PPE, intangible and R&D divided by sales. Inv/Tot assets corresponds to investments in PPE, intangible and R&D divided by total asset. Liquidity is defined as the current ratio. Crisis is a crisis indicator. P-values are mentioned within brackets. *,**,and ***indicate statistical significance at respectively 10%, 5%, and 1%.

The analysis of the Pearson correlation matrix confirm the results previously noticed in table 1 regarding economic profitability assessed by ROA. Indeed, ROA is positively correlated with family involvement in the firm ($p < .05$). A negative correlation is also showed between crisis and performance ($p < .10$). Investment intensity is also negatively correlated with the outbreak of the financial crisis ($p < .01$ and $p < .05$ for *Inv/Tot Asset* and *Inv/Sales* respectively). Besides, long term debts present an expected relationship with investment since a positive correlation is observed between debts and investment intensity ($p < .01$). Table 2 also confirms the positive relationship between long-term debts and family involvement.

4.2 Multiple Regression Analysis

Results in table 3 show that private family firms outperform non-family firms. Moreover, it also indicates that the period of crisis exacerbates the positive relationship between family involvement and performance. Therefore, it can be argued that private family firms have faced the crisis in a more efficient way than their non-family peers. Although these results contradict those of Lins et al., (2011) who focused on listed firms, they are in line with those observed in worldwide conglomerates by Bloch et al., (2012). Accordingly, it seems that private family firms present greater resilience when they face a crisis. Indeed, if we refer to the superior level of sales in private family firms observed in table 1, it seems that private family firms generate their results through their turnover, which seems to confirm the positive influence of maintaining good relationships with customers in order to cope with a period of crisis in a more efficient way even the demand decreases (Bloch et al., 2012).

Table 3. Summary of performance regressions

Dependent Variable: ROA				
Intercept	0.158***	0.123*	0.1242975***	0.121***
	(0.037)	(0.039)	(0.040)	(0.040)
Crisis	No	-0.007**	-0.007**	-0.004
Family	0.012**	No	0.011**	0.013*
	(0.002)		(0.002)	(0.003)
Crisis*Family	No	No	No	0.009**
Size	-0.004	-0.002	-0.002	-0.0014
	(0.003)	(0.003)	(0.003)	(0.003)
Age	-0.008	-0.002	-0.002	-0.002
	(0.006)	(0.007)	(0.007)	(0.007)
Debts	-0.144***	-0.146*	-0.146*	-0.147*
	(0.0181)	(0.018)	(0.0181)	(0.0181)
Sales growth	0.000	0.000	0.000	0.000
	(0.005)	(0.005)	(0.000)	(0.000)
Invest/Sales	-0.005	-0.007	-0.007	-0.007
	(0.010)	(0.010)	(0.010)	(0.010
IndustryDummies	Yes	Yes	Yes	Yes
Adj. R^2	0.0627	0.0662	0.0662	0.0665
N	1752	1752	1752	1752
F-test	86.55***	92.58***	92.5***	93.46***

Notes: Family is a dummy variable indicating if the company is considered as a family firm in comparison with our definition given previously. ROA is the Return on Assets. Size is the natural logarithm of total asset. Age is the natural logarithm for the difference between the current date and the date of establishment. Debts correspond to the long term debts divided by total asset. Sales Growth is the turnover growth rate. Invest/Sales corresponds to investments in PPE, intangible and R&D divided by sales. Crisis is a dummy variable taking the value 1 in 2008, 2009 and 2010, 0 otherwise. Standard-errors appear within brackets.*, **, and *** indicate statistical significance at respectively 10%, 5%, and 1%.

4.3 Robustness Checks

4.3.1 Family Ownership Endogeneity?

Family ownership can be influenced by performance since family shareholders do not want to mobilise resources in firms that present low profitability perspectives. In the case of public firms, Demsetz and Lehn (1985) as well as King and Santor (2008) indicate that the success of the market is only possible by adopting ownership

structures allowing firms to maximise their value in order to meet the efficiency constraints imposed by the market. Thereby, ownership structures depend on several factors induced by hazards such as economy of scale, regulation and the stability of the environment in which they evolve (Demsetz & Villalonga, 2001; Maury, 2006). Moreover, Demsetz and Villalonga (2001) also mention that take-overs, compensation plans and insider trading suggest an influence of performance on ownership. Although these last factors are less pregnant in private firms, economy of scale, legal system or environment are several elements which can have an impact on performance and hence on ownership structure. The question is therefore to know if the difference in performance between family and non-family firms is influenced by the potential endogeneity of family ownership (Maury, 2006). In order to take into account this problem of auto-selection or inversed causality, Heckman two-steps method is used. In this model, family control is used as an endogenous variable. The first selection of the probit model includes a variability factor for profitability and performance defined as the sales growth rate and the ROA to meet the restrictions requirements needed for identification. The probit model also contains all control variables used in our performance regressions related in table 3.

Table 4. Control for endogeneity

First-stage regression			
	Dependent variable	*Familyfirms*	
	Intercept	0.4770274	(0.267)
	Roa	0.1375374*	(0.740)
	Crisis	-5.999137	(0.970)
	Family*Crisis	11.84449	(0.958)
	Size	-0.1557338*	(0.000)
	Age	0.2882499*	(0.000)
	Debts	1.550429*	(0.000)
	Std sales growth	0.901234	(0.827)
	Invest/Sales	0.1896823	(0.417)
Treatmentregression			
	Dependent variable :	*ROA*	
	Intercept	0.0507057	(0.197)
	Family	0.0879446***	(0.007)
	Crisis	-0.0382791	(0.129)
	Family*Crisis	0.0907544***	(0.003)
	Size	0.0032009	(0.301)
	Age	-0.0091107***	(0.087)
	Debts	-0.1687191*	(0.000)
	Sales growth	0.0000274	(0.702)
	Invest/Sales	-0.0198054	(0.417)
	IndustryDummies	Yes	
	N	1752	
	Wald χ^2	161.29*	
	Heckman's λ	-0.0546357***	

Notes: Family is a dummy variable indicating if the company is considered as a family firm in comparison with our definition given previously. ROA is the Return on Assets. Size is the natural logarithm of total asset. Age is the natural logarithm for the difference between the current date and the date of establishment. Debts corresponds to the long term debts divided by total asset. Sales Growth is the turnover growth rate. Std sales growth corresponds to the standard-error of the sales growth rate for 8 years. Invest/Sales corresponds to investments in PPE, intangible and R&D divided by sales. Crisis is a dummy variable taking the value 1in 2008, 2009 and 2010, 0 otherwise. P-values appear within brackets.*, **, and *** indicate statistical significance at respectively 10%, 5%, and 1%.

Table 4 shows that family involvement is positively linked with ROA (p< .10). The second regression presents a positive relationship between family involvement and performance (p< .01). At the same time, a positive relationship is found between the interaction terms *Family*Crisis* (p< .01), which confirm that the crisis reinforce the positive relationship between family involvement and performance in private firms. Besides, Heckman's statistic is significant, indicating that our results are unbiased. These results confirm those obtained in table 3, and thus the outperformance of private family firms with an exacerbation of this positive relationship during the period of crisis.

4.3.2 Multicolinearity Problem?

To ensure that multicolinearity is not a problem in our regression, variance inflation factors (VIF) are calculated. Our results mentioned in table 6 indicate that the multicolinearity problem is mitigated in our models since the VIF are lower than the critical value of 5 (Hair et al., 2010).

Table 5. Summary of Variance Inflation Factors (VIF)

Performance regression		VIF
Variables	Size	2.68
	Age	2.59
	Crisis	3.32
	Family	3.31
	Family*Crisis	3.25
	Debts	1.7
	Invest/sales	1.07
	Sales growth	1

Notes: Variance inflation factors are named VIF in the table.

5. Conclusion

The presence of family firms in the economic fabric all around the world is a field of great interest in the literature. A recurrent theme is to understand if that kind of company outperforms other types of firms. Nevertheless, most of the research focuses on public firms (Astrachan, 2010) since the data regarding ownership, governance and management structures are less accessible for private firms. This paper contributes to the literature on this point by investigating the field of private family firms. Moreover, although numerous research analyse the relationship between family involvement and performance, most of them have been carried out without taking into account environment modifications such as the financial and economic crisis context (Bloch et al., 2012). The perturbations which still hit financial an economic crisis provides an opportunity for researchers specialised in family business. This paper also contributes to the literature on that point. Furthermore, this article also considers endogeneity problems by using Heckman two-steps method in order to make the results more robust. This methodological aspect is important to be underlined since numerous studies do not integrate the endogenous character of ownership (Maury, 2006).

A first-step analysis of our results shows a positive relationship between family involvement and performance independently from the crisis. These results corroborate previous findings related to publicly-traded firms (Anderson & Reeb, 2003; Maury, 2006). Moreover, this research also indicates that the crisis positively moderates the relationship between family involvement and performance in private firms. Whereas previous research has underlined a negative effect of family influence in public firms during periods of crisis (Lemmon & Lins, 2003; Lins et al., 2011), our results confirm the greater potential of resilience that can be induced by family involvement in the organisation (Bloch et al., 2012). Indeed, family involvement seems to enhance flexibility through less formalism and procedures (Carney, 2005), thus improving their ability to innovatively face unexpected events. Moreover, the importance given to socioemotional wealth during stable periods (Gomez-Mejia et al., 2007) seems to provide private family firms with a competitive advantage when they have to cope with sudden shocks. Indeed, our results suggest that the vector of performance in private family firms is sales which can be stimulated by the loyalty of their customers in a context of crisis. Therefore, it seems that family involvement positively contributes to value creation through a perpetual concern for preserving socioemotional endowment of family principals (Gomez-Mejia et al., 2007; Berrone et al., 2012) and a less formalistic view of the organisation (Carney, 2005), so that resilience can be fostered during periods of crisis.

Several limits and reflexions must be underlined in this paper. The completeness of our sample is not ensured since it only contains 219 firms. Although this situation is due to the opacity surrounding ownership and organisational structures in private firms, this research would deserve to be considered on a larger sample. The realisation of a survey with questionnaires could allow us to obtain more information and to improve the robustness of our results. In that way, the effect of corporate governance mechanisms on performance in private firms during the crisis could also be analysed in a comparative logic between family and non-family firms, but also between family firms themselves so that we could take into account the heterogeneity of these organisations for which this field is under-investigated (Astrachan, 2010). Another point of reflexion is about the methodology employed because it can have an effect on the results obtained (Block et al., 2011). In that respect, Block et al.

(2011) and Mazzi (2011) indicate a very useful and relevant statistical method in order to catch the relationship between family ownership and performance, namely a Bayesian approach. The use of that method improves the accuracy regarding the acceptation degree of the null hypothesis. Moreover, it also reduces a bias in the literature which systematically rejects the results for which the significance threshold is higher than 5% (Block et al., 2011). Finally, in order to be generalised, our results have to be confirmed on other markets with specific cultural (Hofstede, 2001) or legal (Laporta et al., 1999) characteristics.

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Note

Note 1. Belfirst contains all annual financial statements of Belgian firms which are subject to the legal obligation to publish them at the National Bank of Belgium.