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Thesis title:

Essays on the role of human capital and socio-emotional attachment in family firms.

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Essays on the role of human capital and socio-emotional attachment in family firms.

SUMMARY

This dissertation studies how human capital and socio-emotional preferences affect governance decisions in family firms. The first two chapters address the topic including empirical analysis; we collected a unique dataset using surveys and a scenarios-based approach, and integrating our data with archival data.

The first chapter investigates the antecedents of family firms' governance structures. We identify two factors, socio-emotional attachment and education, used as a proxy of human capital, and empirically test their role in affecting governance decisions using experimental scenarios. We aim at understanding the drivers of family firms' decision-making regarding the involvement of non-family parties in governance structures. We find that socio-emotional attachment reduces the propensity to involve non-family parties, whereas education increases the likelihood of involving non-family parties in governance structures. The study emphasizes that governance decisions are driven not only by family preferences, but also by human capital limitations of family firms.

Once acknowledged the main drivers of governance decisions in family firms, we aim at assessing the effect a family governance exercises on the performance of private family firms. We extract instrumental variables from the experimental scenarios to ascertain the causal effect of a family governance on performance. Once controlled for socio-emotional attachment and education, we find that family ownership is positively associated to financial performance; on the contrary, a board of directors totally under family control is negatively associated to operational performance. The findings support that family firms manage with parsimony and efficiency their firms; however, the involvement of non-family directors is central to promote growth objectives.

The third study presents a conceptual framework that considers the presence of socio-emotional preferences and lack of human capital as key drivers of the alignment between organizational goals and governance structures. Depending on the weight socio-emotional preferences exercise on organizations, family firms may opt for ex-ante or ex-post mechanisms to balance economic and non-economic goals as a result of the implemented governance structures

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CHAPTER I

Antecedents of a family corporate governance:

the role of education and socio-emotional attachment.

Abstract

This paper studies the antecedents of family firms' corporate governance structures resorting to a scenario-based approach. Using a sample of Italian family firms we investigate the role of education and socio-emotional in affecting governance decisions. We find that education influences positively the involvement of non-family parties, especially of non-family directors. On the contrary, socio-emotional attachment significantly reduces the propensity to involve non-family parties; the effect is particularly strong for non-family shareholders and CEOs. The results suggest that not only socio-emotional attachment, but also human capital play a key role in the decision-making process of family firms, and also in the definition of governance structures in this typology of organizations.

Keywords: corporate governance, education, socio-emotional attachment, family firms, decision-making

1. INTRODUCTION.

Family firms represent the vast majority of organizations around the world. Yet, scholars' interest towards this category of firms is relatively recent: the first significant empirical contribution is dated 2004 (Anderson & Reeb, 2004). However, since its inception, major attention has been devoted to the influence the proprietary family exerts on the family business, identifying in the family both the source of advantages and disadvantages of this organizational structure. A necessary condition for the achievement of these outcomes is that the family exercises sufficient control and influence over governance structures (Kotler et al., 2018; Kellermans et al., 2012). When this condition is satisfied, family's discretion is greater, and it permits to shape organizational priorities as a result of family involvement in the family business.

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Gomez-Mejia et al. (2011) define a construct that holds great explanatory power with regards to family decision-making process within family businesses: their construct is based on the socio-emotional utilities the family derives from the family business, affirming that proprietary families aim at satisfying not exclusively economic outcomes, but also particularistic, family-related goals, as shaped by family values and demands. The socio-emotional construct predicts that family firms are significantly resistant to the involvement of non-family parties in their governance structures. In fact, the involvement of non-family parties in governance structures may reduce the discretion the family exercises over the definition of firm's goals and processes, threatening the survival of family values and the achievement of family priorities. Then, the socio-emotional attitude of proprietary families towards the family business explains the great presence of the family in governance structures. A representative case is exemplified by the Italian population of family firms, where over thirty percent of family businesses are controlled and managed by a family, in terms of ownership, board of directors and leadership (Observatory of Italian Family Firms, 2016).

Yet, another mechanism could be at work and complement the socio-emotional construct to explain family firms' control over governance structures.

Bloom et al. (2011) propose that decision-making is affected by the level of organizational human capital. The authors state that the reason why firms do not implement superior managerial practices is lack of knowledge about the existence and benefits of these practices. They also demonstrate that this lack of knowledge is related to the educational level of key decision-makers, finding that higher levels of education are associated to greater implementation of superior practices. We propose to apply the same reasoning to decision-making in family firms about governance structures. In fact, since Fama and Jensen (1983), the literature on corporate governance together with up to date governance codes identify principles

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that are associated to superior governance practices. Among these principles, great importance is allocated to the involvement of independent parties into governance structures (i.e. in board of directors), and to the limit of key-decision makers' discretion over the business (i.e. CEO duality).

Family firms are overall characterized by lower educational levels compared to non-family firms (Perez et al., 2006); following Bloom et al. (2011), family decision-makers would face some limitations in terms of how aware they are of best practices, including governance best practices. This gap could result in family firms lacking knowledge about the benefits a professional and more independent governance structure would bring to the family business, and is supported by family CEOs interviews, who state, independently of the context, the superiority of a family governance over a non-family one (Gilding, 2005; Seleker, Goksea & Oktem, 2009). However, to our best knowledge, no studies in the family business literature ever investigated the role human capital plays in the definition of governance structures.

As such, we question what the antecedents of a family governance structure are, and aim at contributing to the topic providing a better understanding of the socio-emotional construct and of his limitations in explaining family firms' behaviors. We state that family governance structures are affected not exclusively by socio-emotional priorities, but also by a human capital limitation of family decision-makers, which limit the awareness of the benefits non-family parties would bring to the family business, and, as a consequence, their involvement into governance structures. We believe this is a relevant contribution also from a practitioner perspective. In fact, assuming the goal is to increase family firms conformity to governance best practices, which implies greater non-family parties' involvement in family businesses, it would be extremely difficult to act on family socio-emotional values and demands, which are driven by family preferences. On the contrary, actions on human capital are more reasonable

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and interfere less with family priorities. If education represents a viable way to moderate preferences, then policy makers could invest on promoting initiatives that enhance the diffusion of knowledge and managerial skills among family firms, rather than spending their funds in changing the innate family firms' preference to protect their socio-emotional endowment.

Our results support that both socio-emotional priorities and education play a key role in the definition of governance structures, opening a debate on the actions to put in place to increase family firms' propensity towards non-family parties.

2. THEORETICAL BACKGROUND.

Since Jensen and Murphy (1990), top management team and board of directors are widely recognized as the primary foundations of corporate governance, influencing decision-making in corporations. Scholars have focused on decision-makers' key characteristics that are considered to influence corporate decisions (Feldman, Amit & Villalonga, 2014; Hambrick & Mason, 1984), like the educational background of executives and directors, which is central to the implementation of complex corporate strategies (Kim and Lim, 2010). Yet, the literature on family firms emphases a slightly different line of reasoning, which focuses on the idea that decision-makers "*imprint their firms with their own values*" (Agle, Mitchell & Sonnenfeld, 1999, p.507). In fact, Gomez-Mejia et al. (i.e. 2007, 2009, 2011) state that corporate decision-making in family firms is influenced by the socio-emotional ties and values the family itself feels towards the business, from which the family derive socio-emotional utility. They ascertain that when the proprietary family is socio-emotionally attached to the family firm, managerial and governance structures are designed to guarantee the satisfaction of family goals and needs. Subsequently, corporate decisions are significantly affected. To exemplify, scholars have underlined differences in behavior between family and non-family firms as a reflection of

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family preferences in, among the others, diversification strategies (Gomez-Mejia et al., 2010), internationalization decisions (Zahra, 2003), mergers and acquisitions (Miller et al., 2010), R&D investments (Van Essen & Zellweger, 2016).

Recent studies (Bloom et al., 2013) have undertaken a new line of research, which confirms the importance of top management team characteristics in influencing corporate decisions. In fact, they explain why some corporate decisions are implemented, and others are not, through top management team characteristics in terms of human capital. They find that the reason why executives do not implement certain managerial practices is either because they are not aware of their existence, or because they ignore the benefits which could be derived from their implementation. In addition, Bloom & Van Reenen (2010) identify a correlation between decision-makers' education and implementation of superior managerial practices, where educated decision-makers are more aware of the existence, and related benefits, of superior managerial practices, and, as a results, are more likely to implement them. Specifically, education is positively related to greater awareness of the existence and benefits of these practices.

We focus our analysis on these two elements, socio-emotional attachment to the family firm and education, and study their influence on the definition of family managerial and governance structures.

The following paragraphs present a brief theoretical background for the key concepts used in this study.

2.1 Socio-emotional attachment and decision-making.

Corporate decisions are strongly affected by the managerial and governance structures in place in organizations. Family firms are typically characterized by the presence of a family not only

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as controlling shareholders, but also in governance and managerial structures, namely the board of directors and leadership positions, resulting in the family exerting control over managerial and governance structures. An explanation for the resistance of family firms to the involvement of non-family parties in corporate governance structures lies in family members' preference for socio-emotional utilities, as a result of the emotional ties the family feels towards the business (i.e. Gomez-Mejia et al., 2011). With socio-emotional ties we refer to the bond and identification a family creates with the family firm, such as decision-making is influenced not only but the achievement of economic goals, but also by the realization of non-economic utilities, as identified by the principles and values of the family itself. Berrone et al. (2012) review the dimensions most commonly associated in the literature to socio-emotional attachment, and identify five main categories widely accepted as exerting an influence over decision-making in family firms, namely: the control and influence of the family over the family business; the identification family members have with the firm; the social bond to key stakeholders; the emotional attachment to the family firm; and the intention to transfer the business to the next generation.

The desire to preserve and act on family values and priorities is as strong as resulting in a set of behaviors, and actions, that differentiate family firms from non-family firms. Research on socio-emotional utilities has demonstrated that family businesses have two main reference points, namely socio-emotional goals and economic goals (Kotlar et al., 2018), and that economic and socio-emotional goals are rarely fungible (Greenhaus & Bautell, 1985): the pursuing of non-economic goals usually takes place at the expense of economic ones. Yet, family firms prioritize the achievement of non-economic objectives, unless under financial distress (Gomez-Mejia et al., 2015). The pursuit of non-financial goals requires the family to exercise organizational power over the family business (Deephouse & J, 2013). This implies

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the family to be involved in the family business, such as to shape desired behaviors, strategies and objectives within the firm (Miller et al., 2013; Villalonga & Amit, 2006; Deephouse & J., 2013), where family involvement is persistently associated to a greater importance of the family priorities over the business agenda (Miller, Le Breton-Miler and Lester, 2013). The need to protect socio-emotional utility is as strong as to limit the involvement of non-family parties within the family business. Non-family parties may not share the same values and principles of the family, reducing their legitimacy and prominence within the family business, resulting in a prioritization of economic goals over non-economic objectives (Kolter et al., 2018). For this reason, the involvement of non-family parties is perceived as a threat to the preservation and pursuit of family's socio-emotional utilities, affecting the definition of governance structures, like the presence of non-family parties in the board of directors, in the ownership, and in top management team. In fact, family firms have a tendency to exercise total control over the board of directors: good governance practices require firms to involve independent directors, yet family businesses prefer not to align to best practices to maintain family power and to guarantee the pursuit of particularistic objectives related to family priorities and values (Kellerman et al., 2012). Family firms are persistently reluctant to use external forms of debt, because they do not want to be controlled by financial institutions (Martin et al., 2016; Schulze et al., 2013), even if this limit their capacity to grow. The same reasoning is applied to IPOs, to which follows a greater need to adapt to industry norms, making it difficult for family firms to pursue non-economic goals (Kotlar et al., 2018). Also hiring decisions reflect this attitude. In fact, when non-family firms hire a new resource, they look for the best match available in the market between firm's needs and candidate's competences and past experiences. This is not the case in family firms, which prefer to appoint family members, regardless of their competences, to perpetuate family values.

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Many empirical studies, clarify the influence of socio-emotional utility on strategic decision-making, empirically supporting that family firms do less acquisitions, R&D investments and diversification compared to their non-family counterparts (Calabro et al., 2018; Boellis et al., 2016; Chrisman & Patel, 2012; Gomet-Mejia et al., 2015; Gomez-Mejia et al., 2010), as a result of the prioritization of non-economic goals over economic objectives. In fact, research and development investments are often more limited in family firms compared to non-family firms, because family executives may not possess the required skills and competences, and prefer not to invest in R&D rather than diluting their power over the family business relinquishing control to non-family parties.

As such, the pursuit of socio-emotional utilities is not always associated to a positive valence (Berrone et al., 2012), but can produce negative behaviors and reduce the strategic landscapes of family firms, influencing the execution of management practices and the path toward professionalization.

These elements together point at the importance of socio-emotional attachment in influencing the composition and effectiveness of managerial and governance structures.

2.2 Education and decision-making.

There is general agreement on how human capital impacts on decision-making in organizations (King et al., 2016; Frank and Goyal, 2007; Barker and Mueller, 2002; Jensen, 1998), where human capital refers to the skills and knowledge held by people (i.e. Coff, 2002). In fact, organizational outcomes reflect not only the values and preferences of decision-makers in firms, but also their cognitive bases (Hambrick and Mason, 1984). Education is broadly considered a proxy for cognitive skills, and it is strongly correlated with managerial capabilities (Lin et al.,

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2011; Useem & Karabel, 1986; Perez-Gonzalez, 2006). Among the others, Bloom et al. (2006, 2011) proxy managerial skills with education, and stress how human capital affects firms' decision-making. Specifically, they focus on how ignoring the existence, and relative benefits, of best-practices reduces the likelihood of their implementation in firms. They find a significant relationship between education of decision-makers and implementation of best-practices, hinting at the importance of education for top-management team for the enactment of superior managerial practices.

Dyer (1989) applies the same reasoning to family firms, stating that family firms lack knowledge-based resources, which are key to the enactment of efficient management practices and processes; whereas Filbeck & Lee (2000) posit that family firms often lack specific competencies in strategic and financial planning, necessary for the implementation of successful planning and systems.

In family firms, human capital is potentially more critical than in non-family firms. In fact, this category of firms is characterized by an overall lower level of education compared to non-family firms (Perez-Gonzalez, 2006). This phenomenon is partially explained by family firms' preference to hire family members for top managerial positions and in the board of directors. In fact, when selecting from such a limited pool of candidates, the likelihood of picking candidates characterized by lower level of human capital compared to non-family candidates is greater (Gomez-Mejia et al., 2001; Levie and Lerner, 2009). Yet, family firms are more strictly inclined to prefer family parties over non-family parties to maintain control over the family business and to guarantee the prosperity of family values and the achievement of non-economic goals.

Scholars have emphasized also another important side of top management teams in family firms. When family CEO's are asked why they do not involve non-family parties in their

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managerial and governance structures, family CEOs are persuaded to outperform and outsmart non-family counterparties. We acknowledge that under some circumstances it is true, and that family parties are extensively recognized to have an in-depth knowledge of their firms and of the market in which they operate (Miller, Minichilli and Corbetta, 2013). Yet, non-family parties may be critical to plan and execute complex strategies, like mergers and acquisitions, diversification, and internationalization of the business, or, more generally, to support growth strategies and to guarantee a greater focus on economic goals. In fact, as firms grow and complexity increases, the need for managerial skills and experience rises. Under these circumstances, the competences of family members selected from the limited pool of family candidates, may not equate the competences of non-family parties available in the professional market. To quote Miller, Minichilli and Corbetta (2013), "*in complex administrative situations, the need for more formalized managerial skills and the mastery of management practices surpass the benefits of the tacit knowledge that family members may possess*" (34:553-557).

Yet, even if unquestionable evidences support the positive contribution of non-family parties to family businesses, family members are still resistant to the involvement of non-family parties. The socio-emotional attachment construct predicts that the reason why family firms are less likely to execute complex strategies is because family parties do not want to involve non-family parties in the family business, as they may reduce the discretion to concede privileged returns to family members, and to prioritize particularistic, family-related goals. However, another explanation resides in the educational gap between family and non-family firms. As already anticipated, family firms are overall characterized by lower level of education compared to non-family firms, and Bloom and Van Reenen (2006) posit that education and awareness about managerial practices' benefits are strongly related. As such, family firms may be blinded not exclusively by the pursuit of family values and demands, but also by a limited awareness

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of how positively non-family parties advantage the family business, underestimating the benefits and overestimating the costs of the involvement of non-family parties in their governance structures. This view underlines a new perspective on the decision-making processes within family firms, and emphasizes the key role of human capital in influencing governance decisions.

3. DEVELOPMENT OF HYPOTHESIS.

Socio-emotional attachment and education play a key role in shaping decision-making. We expect socio-emotional attachment to reduce the propensity toward the involvement of non-family parties, as family parties aim at perpetuating family values and at satisfying family demands. On the contrary, we expect education to increase the propensity toward the involvement of non-family parties. In fact, more educated respondents are expected to be more aware of the benefits non-family parties would bring to the family business, and consequently to be more disposed to involve them in their managerial and governance structures.

The study focuses on family firms, and aims at understanding the determinants of a family managerial and governance structure. Specifically, we aim at contributing to the stream of literature that studies socio-emotional preferences as antecedents of decision-making in family firms (Calabro et al., 2018; Minichilli et al., 2014; Miller & Le Breton-Miller, 2014), and at introducing, in addition to socio-emotional preferences, an antecedent up to date understudied in the family business literature: the level of human capital of the family members involved in governance-related decision-making.

To assess the antecedents of family governance structures, we want to observe how decisions are made in contexts where managerial and governance related choices are more likely to take place. We identified in the literature, and then empirically validated using a pretest, two

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situations where family firms' propensity to act on managerial and governance structures is likely: the first, when family parties are conflicting among themselves; the second, when family parties lack the necessary managerial competences to run the family business. In these circumstances, we expect family firms to increasingly involve non-family parties in managerial and governance structures, under the effect of heterogeneous level of education and socio-emotional attachment.

3.1 The effect of conflicts and competence on corporate governance decisions: the role of socio-emotional attachment.

Conflict within top management team is very likely, and is some situations is also considered a booster for performance (Eisenhardt et al., 1997). In fact, when conflicts are managed and channeled into constructive discussions, which acknowledge diversities and leverage past experience, decision-making is improved. Yet, sometimes emotional sentiments prevail, (Eisenhardt et al., 1997) causing a less efficient outcome in conflictual situations. Previous scholars have highlighted an important distinction between cognitive conflict – strictly related to task and perspectives' discussions, and affective conflict – broadly focused on personal conflicts, where the first is considered functional and the latter dysfunctional (Amason and Mooney, 1999). While affective conflicts are present both in family and non-family firms, the literature on family business has emphasized the presence of emotional conflicts in this category of firms (Eddleston & Kellermanns, 2007; Corbetta & Salvato, 2004; Sharma, 2004), considering conflicts among family members amongst the key reasons of family firms inefficiencies and failure (Claessens et al., 2002). In fact, the coexistence of economic and non-economic goals is likely to generate situations where not all family members agree on the relevance and distribution of non-economic goals, creating tensions among family members.

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Generally, conflicts in family firms arise either as a result of a prioritization of family needs and demands over business needs, or, vice versa, as a prioritization of business needs over family needs and demands (Carr & Hmieleski, 2015), such as tensions among family members intensify when either family, or business, responsibilities are privileged. In fact, as stated by Greenhaus & Bautell (1985), family requests and business needs are rarely compatible. Moreover, even when there is incompatibility among family members, the exit of key family members is not always a viable solution (Gomez-Mejia et al., 2011; Sharma, 2004). Family firms solve these tensions mainly in two ways: either indulging family members, which is more likely when family members value unity and harmony among family members – an important proxy of socio-emotional attachment, or involving professional, non-family parties to slacken tensions, providing the family firm with their knowledge, experience and objectivity (Chrisman et al., 2004; Schulze et al., 2002). The involvement of non-family parties in managerial and governance structures represents a viable solution to family conflicts, because they can act *super partes*, focusing on objective and family-unrelated facts, to encourage a more balanced approach to decision-making. In addition, non-family parties are accountable to shareholders, in this case to family shareholders. Consequently, they can not justify a decision-making process based on personalistic and particularistics criteria (Mintzberg, 1994). As such, we expect that family decision-makers will consider a non-family party to ease family conflicts, and to prioritize the achievement of business related goals.

Yet, when socio-emotional attachment is pervasive, and represents a key decision-making driver in family firms (Berrone et al., 2012), family decision-makers opt to reduce family tensions favoring incompetent family members rather than skilled and qualified professional parties to avoid discussions within the family (Kets de Vries, 1996; Morck et al., 2005). In fact, Berrone et al. (2012) identify family unity and harmony as one of the items most recurrently

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associated to the sustainment of socio-emotional utility in family firms. It is then likely to expect that when socio-emotional ties are strong, family members are less likely to resort to professional non-family parties in conflictual situations, but will maintain family control over corporate governance structures.

The second context we identify as associated to greater involvement of non-family parties in governance structures is when family members lack the managerial skills to run the family business.

Family firms are frequently associated with unqualified human resources and with limited use of professional management (Chua, Chrisman and Bergiel, 2009). There is broad evidence of family firms preferring to appoint family members rather than professional managers (Chrisman, Chua & Zahra, 2003; Chua et al., 2009; Classens et al., 2000), in order to satisfy family demands and priorities, such as to ensure family control over the business, and to facilitate the transgenerational intentions and the identification of the family with the family business. This behaviour demonstrates that family members in family firms favour family kinship over talent, even when more capable non-family parties are available (Carney, 2005; Handler 1992; Lansberg, 1999), because this behaviour assure the family to maintain control over the family business (Martin et al., 2016). Consequently, the selection of candidates is carried out over a pool of family members, which is, by definition, smaller than the pool of professional candidates available in the market, often resulting in nepotism and managerial entrenchment (Gomez-Mejia, Nunez-Nickel and Gutierrez, 2001; Villalonga & Amit, 2006). As a result, it is less likely to find the necessary managerial skills and experience to run the business if the selection is limited to family candidates (Mehrotra et al., 2013). This lead to lower quality of the top management team human capital (Gomez-Mejia et al., 2001; Levie &

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Lerner, 2009). In fact, non-family parties would bring to the family business their specialized professional knowledge, their networks and experience (Su & Lee, 2013), and also their unbiased contributions to the business, as they are not part of the proprietary family. Change and Shim (2015), based on Burkart, Panunzi and Shleifer (2003), clearly explain the greater advantage of non-family parties over family members in terms of managerial skills, defining non-family parties as "*a self-selected group of people who survived a tournament of competition based on managerial talent*" (36:1299).

In addition, it is more difficult for family firms to attract talented managers, given that meritocracy is at stake (i.e. Bennesden et al., 2007). In fact, key managerial positions are frequently assigned to family members to satisfy, and match, socio-emotional values and demands; career perspectives for non-family parties are limited (Bennedsen et al., 2007; Mehrotra et al., 2010); family executives are usually privileged with favourable contracts, where compensation is uncorrelated to merit (Cruz, Gomez-Mejia & Becerra, 2015; Kotlar et al., 2018); and family members usually have tenures three times longer than non-family counterparts (Martin et al., 2016). Therefore, family firms' talents are biased, unless family members do not act based on family ties, but opt to select the best candidates based on objective requirements and qualifications. In fact, family firms professionalize because they lack internally the managerial skills required to compete in the market (Change & Shim, 2015), and address the professional market of managers to find superior talents. As such, a solution to an internal human capital problem is a search for competences and experience outside the family members.

However, it is more likely that when family members are socio-emotionally attached to the family firm, the involvement of non-family parties in managerial and governance positions is limited, even when family members do not display the required skills and experiences, to

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exercise family power over the family business. In these circumstances, the pursuit of particularistic objectives deprive family businesses from the necessary managerial resources (Miller, Le Breton-Miller, Lester, 2013).

The described contexts, one in which family firms face a conflictual situation among family members, and the other, where family members lack the managerial competences to manage the family business, represent situations that are not unusual for family firms, and in which the intensity of socio-emotional attachment is crucial to understand the propensity towards the involvement of non-family parties.

Hp.1. The propensity to involve non-family parties is lower when socio-emotional ties to the family firm are strong.

3.2 The effect of education on corporate governance decisions.

Family firms are overall characterized by lower level of education compared to non-family firms (Perez-Gonzalez, 2006). Indeed, family members often underestimate the importance of education, valuing more training on the field rather than formal education (Fiegener, et al., 1996). Yet, education is an important element of managerial talent (Lin et al., 2011; Barker & Mueller, 2002; Useem and Karabel, 1986; Perez-Gonzalez, 2006), and a strong correlation between education background and implementation of corporate decisions exists (Simeon, 2001), like R&D investments, mergers and acquisitions and internationalization strategies (Hsien-Chang Kuo, Lie-Huey Wang and Li-Jen Yeh, 2018).

In addition, non-family parties are particularly valuable as organizational complexity increases and the challenges of global competition requires not only important capital investments, but

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also specific managerial skills. Yet, family firms often fail to professionalize their corporate governance structures. In family firms it is common to assist to biased talents' and skills' perceptions of family members, especially when parents have to evaluate their children abilities (Belenzon, Patacconi and Zarutskie, 2016), which result in the appointment of family members to top managerial positions, independently from their real capacity to manage the firm. Consequently, family firms are often characterized by a human capital quality problem (Gomez-Mejia, Nunez-Nickel & Gutierrez, 2001; Levie & Lerner, 200X).

Yet, socio-emotional preferences explain only partially the resistance of family firms towards the involvement of non-family parties. We follow the line of research of Bloom et al. (2011), and posit that this resistance is partially driven by family firms' lack of human capital. Bloom et al. (2011) find that the reason why Indian manufacturing firms do not implement superior managerial practices is either because they are not aware of the existence of these practices, or because they underestimate the benefits and overestimate the costs of their implementation. In fact, the authors find that once supplied with knowledge about the existence, and related benefits, of superior managerial practices, these firms significantly vary their attitudes, and, as a result, are more likely to implement them. We apply the same reasoning to family firms and to their approach to governance structures. We advance that family firms do not involve non-family parties because they lack specific knowledge about how significantly they would benefit from a more professionalized structure. In fact, the literature on family firms identifies the incapacity of family members to recognize the importance of involving non-family parties. However, there exist explicit guidelines that define superior governance practices, like the ones presented in the Codes of Conduct for public firms listed on the Stock Exchange (i.e. London Stock Exchange Code of Conduct; New York Corporate Governance Guide; Codice di Autodisciplina), about, among the others, the presence of independent directors, board

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diversity, board tenure, succession plans, managerial independency from the ownership, disclosure policies and others.

As such, we argue that lack of knowledge is a likely explanation to why family firms are so resistant to the involvement of non-family parties in managerial and governance structures. Importantly, Bloom & Van Reenen (2010) claim that the likelihood of implementing superior managerial practices is greater when decision-makers are educated. Given that family firms are overall characterized by lower level of human capital, we hypothesize that a generalized low level of education in family firms may explain the low propensity of this category of firms to involve non-family parties. Then, we expect family members with higher level of education to be more inclined to the involvement of non-family parties in managerial and governance structures.

Hp2. The propensity to involve non-family parties is greater when family decision-makers are educated.

4. METHODS.

We use two sources of data. The first are survey data, the second are data collected with experimental scenarios. We collect the data using the software Qualtrics and delivering an online survey and scenario to family and non-family top decision-makers. We send to each firm an email with an introductory letter to explain the relevance of the research, and to guarantee anonymous treatment of the respondents. Yet, the goal of the research was not shared with the respondents in order not to bias their answers. To motivate the respondents, we offered a free report about the main results, and a free workshop held by Bocconi University.

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We resort to a scenario-based experimental approach to identify the antecedents of governance structures in family firms. Scenarios have the great advantage to recreate situations in which knowledgeable and experienced respondents identify themselves, mirroring the behavior they would have in the reality, and to estimate the causal effect of the dimensions under study as a result of the manipulation of a treatment. Our experimental scenarios are brief texts that describe a family firm in a situation where changes to governance structures are necessary. We resort to a survey to collect family-related factors, like the level of socio-emotional attachment and the level of education of family respondents.

4.1 Sample.

Italy has a very high percentage of family firms. Moreover over thirty percent of these firms exhibit a strong resistance to the involvement of non-family parties, maintaining under total family control firms' stakes, CEO position and board of directors (Data: AUB 2016). Yet, there is sufficient variance: approximately 50% of Italian family firms have at least a non-family director in the board of directors, 21% a non-family CEO, and 24% a non-family shareholder. As such, we consider the Italian population of family firms a good candidate to improve our understanding on the definition process of family firms' corporate governance structures.

The sample is drawn from the Italian Observatory of Family Firms. The Observatory incorporates detailed financial and corporate governance information about the entire population of Italian family firms. Family firms are defined according to the percentage of equity owned by a single, or two, family. In detail, given that in Italy family owners generally hold a high percentage of stakes, we qualify as family firms those firms where a family holds a minimum threshold of 50% of the stakes, considered necessary to control a family company in Italy (Bennesden and Wolfenzon, 2000). Moreover, we considered firms with a minimum

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turnover of € 20 million. In fact, we expect smaller firms to have minor managerial complexity and to be characterized by a less intuitive and straightforward quantification of the benefits derived from the involvement of external parties.

We identified 5001 contactable family firms. In fact, not all family firms in the population have an internet address and an email. We collect 501 observations of family members in top executive positions. This is equal to, approximately, 10% of the contactable population of Italian family firms, in line with studies that target executives in upper echelons (Geletkanycz, 1997; Cruz et al., 2010; Schulze, Lubatkin & Dino, 2003a). In Italy, there is a non-family firm every two family firms. We want to maintain this ratio in our sample of firms, and collect over 270 observations of non-family firms, that we will use as a benchmark for family firms' behaviour.

Some respondents either didn't complete the entire questions set or misinterpreted part of the questionnaire, and as such we delete some observations both from the family sample and the non-family sample, ending up with 446 observations of family firms, and 265 of non-family firms.

To mitigate the possibility of self-selection bias, which would prejudice the validity of our results, we stratify our sample according to some key firms' characteristics, namely geographical distribution of the firms, sector, size, and corporate governance structures in place. For this reason, we aimed at maintaining firms' observable characteristics as close as possible to the population present in the Italian Observatory of Family Firms, which includes the entire population of Italian family firms (appendix 3).

We collect one observation per firm. The respondents are all influent decision-makers, either CEOs, GMs, directors, chairmen, or top level executives (appendix 3).

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In our sample, 80% of family firms are characterized by an ownership whose stakes are total under family control; 87% have a CEO who is a member of the proprietary family, and 49% have a board of directors made up entirely of family members. Based on turnover, 57% of family firms has a turnover that ranges between 20 and 50 mln €, 26% between 50 and 150 mln €, and 17% greater than 150 mln €. In line with the Italian population of family firms, the most represented sectors are the manufacturing sector (around 19%) and the whole commerce sector (around 15%).

4.2 Scenarios-based data.

We use a scenario-based methodology to understand the effect of socio-emotional attachment and education on the decision to involve non-family parties in managerial and governance structures of Italian family firms.

For family members to take into consideration a change in their governance structures, we are aware we need to present respondents with a situation where changes are strictly necessary. As such, scenarios describe a family firm, totally controlled and managed by a family, which is facing a financial crisis. The literature on family firms emphasizes that the main reference item to make decisions in family businesses is socio-emotional attachment (Gomez-Mejia, 2011). Yet, when under financial distress, especially compared to a reference point (i.e. sectorial performance, key competitors), family firms' priorities shift to supporting economic objectives, which are essential to guarantee the survival of the family firm, and a necessary condition for the perpetuation of family values and preferences. As such, even if socio-emotional attachment generally works against the involvement of non-family parties in governance structures, we expect respondents to be more disposed to evaluate a change in their governance structures when facing a situation of financial distress. Moreover, the scenarios describe direct

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competitors that are successfully reacting to the financial crisis either internationalizing or diversifying the business (appendix 1 for scenarios' extracts). The decision to mention internationalization and diversification strategies in the scenarios is driven by the consideration that they are complex strategies, and as such require specific skills and experience, that are not present in the family as described in the scenarios. Again, this is done to recreate a context that increases the propensity to evaluate a change in their governance structures.

Table 1. Descriptive statistics: family and non-family sample.

	(1)	(2)	(3)	(5)	(6)	(7)	(8)	(9)	(11)	(12)
	Non-family firm					Family firm				
VARIABLES	N	mean	sd	min	max	N	mean	sd	min	max
OBOD	265	2.887	1.341	1	5	450	3.280	1.556	1	5
OGM	265	3.521	1.340	1	5	450	3.438	1.375	1	5
OCEO	265	3.336	1.501	1	5	450	2.598	1.421	1	5
OOWN	265	2.728	1.229	1	5	450	2.282	1.352	1	5
conf	265	0.517	0.501	0	1	396	0.396	0.490	0	1
comp	265	0.411	0.493	0	1	396	0.568	0.496	0	1
educ	265	2.977	0.743	1	5	450	2.780	0.774	1	5
d_educ	265	0.762	0.427	0	1	450	0.640	0.481	0	1
conf*educ	265	1.558	1.609	0	5	396	1.131	1.475	0	5
comp*educ	265	1.208	1.537	0	5	396	1.556	1.486	0	5
sew						450	3.356	0.796	1	5
d_sew						450	0.533	0.499	0	1
conf*sew						396	1.314	1.696	0	5
comp*sew						396	1.958	1.817	0	5

The respondents identify themselves with the CEO of the described family firm. Overall, the scenarios are perceived as realistic, with mean value equal to 3.51 (between " realistic" and "very realistic"). See appendix 4 for details.

The idea behind the scenarios is to force respondents to evaluate whether a change in their governance structures would be appropriate, in a context where non-family parties are available

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to support the improvement of the financial situation of the described family firm, which clearly needs new human capital to face a critical and complex situation.

Within this context, scenarios permit to get rid of an objectivity bias. Indeed, in family firms it is very likely that family members are also part of managerial and governance structures. Consequently, a survey could affect the objectivity of responses when, for example, a father is asked when he would substitute his son with a non-family manager. Moreover, scenarios overcome social desirability issues because this methodology makes use of indirect measurement (Aiman-Smith et al., 2002). Furthermore, we elaborate the scenarios to outdo the most significant reasons why firms do not adopt superior managerial practices, accordingly the cost factors, and the heterogeneity of firms. Indeed, firms may not be willing to implement superior managerial practices because of higher costs, and because superior managerial practices are not universally applicable to the vast heterogeneity of firms (Bloom et Van Reenen, 2006). The scenarios explicitly tackle the cost factor, specifying that the company wouldn't incur in excessive costs following the involvement of external parties into corporate governance structures. As such, we exclude our results are driven by cost-related considerations, and ascribe the effects to the dimensions of interests. For what concerns the heterogeneity problem, we opt for scenarios because we acknowledge that firms are heterogeneous: the description of a carefully constructed situation permit to isolate the effects we are interested in, providing strong control over the studied context. In fact, a confined scenario permits to achieve great control and good reliability, and to moderate firms' heterogeneity to investigate the specific research questions about governance structures.

The success of scenarios-based experiments depends on how likely and strong is the identification of respondents with the situations described in the scenarios (Highhouse, 2009). Moreover, its external validity is accepted when manipulations are strong and respondents'

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identification, and knowledge of the matter, is great (Karren & Barringer, 2002). Our respondents are key decision-makers in family, and non-family firms. As such, they represent a sample of people who routinely make this type of decision, or, at least, influence this type of decision, in the reality of their firms. As a result, they have the competence and the experience to personify the decision-maker described in the scenario.

Furthermore, we opt for strong manipulations, recurring to dummy variables that take extreme values (either high or low in the described scenarios). The manipulations have been selected to recreate situations in which the propensity towards the involvement of non-family parties is expected to be greater. We manipulate two dimensions within the scenarios: the level of conflicts among family members, and the level of managerial competences of family members involved in the family business. The level of conflicts can be either high or low. The scenarios specify that when the level of conflict is high the decision-making process within the family firm is inefficient. The level of managerial competences of family members is either high or low compared to the managerial skills available in the professional market. Manipulating conflicts and competences we generate four scenarios (figure 1). A first-case scenario, where respondents face a situation where conflicts among family members are present, and where the level of managerial skill of family members is aligned to the level of skills available in the market. A second-case scenario, where respondents identify with a situation where family members do face a conflictual situation among family parties, and where managerial family members' skills are not aligned to market level. A third-case scenario, where respondents identify with a scenario where family members do not face a conflictual situations among family parties, and where the level of managerial skills of family members is lower compared to the ones available in the professional market. A fourth-case scenario, where respondents face

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a situation where conflicts among family members are not present, and where family members do not lack managerial skills compared to professionals available in the market.

The treatment is randomly assigned to each respondent using Qualtrics randomization feature. Each respondent replies to a single scenario. At the end of the scenario, family respondents answer a set of questions about whether they would involve non-family parties in key managerial and governance structures (i.e. CEO and general manager position, board of directors, ownership).

Figure 1.

		Competences	
		Low	*High*
Conflicts	*High*	II	I
	Low	III	IV

We insert a control check immediately after the texts of the scenarios, to verify that respondents perceived correctly the intensity of conflicts among family members and the level of managerial competence of family managers compared to non-family parties. The use of control check prior to scenarios-related questions is also a helpful tool to focalize the attention of the respondents towards the manipulated dimensions. Furthermore, we use the control check to assign respondents to pertinent scenarios in case they misinterpreted either the level of conflict or the level of managerial skills described in the scenarios. To exemplify, assume a respondent assigned to scenario 1, where both the level of conflicts among family parties and the level of managerial skills of family executives are described as high, wrongly perceives the level of conflicts as low, and correctly perceived the level of managerial skills as high. In this case, we

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reassign the respondent to scenario number 4, which is characterized by low level of conflicts among family parties and high level of family executives' managerial skills. We verify that this reallocation of respondents do not impact on the results. As such, we compare the results we obtain when not considering all answers obtained in case a respondent misperceived the manipulation, with the results we obtain when reallocating the respondent to a scenario. The magnitude of the effects is approximately the same, with greater significance of the results in the latter case. For this reason, we believe the reallocation of the respondents do not cause the results to be biased.

We delivered scenarios to a sample of non-family firms too. This permits to use non-family firms as a benchmark for family-firms. In non-family firms, we cannot collect data about socio-emotional attachment as it is theoretically defined for family firms. Nonetheless, we can compare propensity to make changes in managerial and governance structures between respondents in family firms and respondents in non-family firms, to assess major differences between family and non-family firms in their approach towards decision-making about governance structures.

We create scenarios specifically for non-family firms to increase the identification of respondents with the scenarios. In these scenarios, the firm is not a family firm, but a generic non-family firm. The respondents identify themselves as a consultant, hired to solve a critical financial situation. The context is the same as for family firms, and the manipulated dimensions remain the same, with some minor changes.

4.2.1 Pretest of the scenarios: validation of the manipulated variables.

The idea behind the scenarios is to force respondents to reconsider the managerial and governance structures of the firm presented in the scenarios. For this reason, we describe in the

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scenarios a firm in a critical financial situation, and we also identified in the family firms' literature variables that are often associated with an increased propensity to involve non-family parties in managerial and governance structures, i.e. the level of conflict among family members, and the level of managerial competence of family members. Yet, we need to validate the effectiveness of the manipulated dimensions. To confirm that conflict and managerial competence have a significant impact on managerial and governance decisions, we decide to run a pretest on a sample of students.

Table 2a. Student pretest: the manipulation of managerial skills on the decision to change managerial and governance structures.

VARIABLES	(1) OCEO	(2) OGM	(3) OBOD	(4) OOWN
comp	-0.904***	-1.113***	-0.479***	-0.456***
	(0.155)	(0.170)	(0.156)	(0.133)
Constant	3.502***	4.130***	4.243***	3.000***
	(0.142)	(0.132)	(0.130)	(0.139)
Observations	161	161	161	161
Number of id	102	102	102	102

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

Table 2b. Student pretest: the manipulation of conflicts on the decision to change managerial and governance structures.

VARIABLES	(1) OCEO	(2) OGM	(3) OBOD	(4) OOWN
conflict	0.639***	0.747***	0.825***	0.297**
	(0.151)	(0.131)	(0.145)	(0.134)
Constant	2.530***	2.911***	3.296***	2.215***
	(0.138)	(0.121)	(0.129)	(0.124)
Observations	193	193	193	193
Number of id	108	108	108	108

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

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We believe students are good candidates to identify themselves with the scenarios for the following two reasons: first, they are students at the last year of a master of science in business studies, consequently, they have a substantial understanding of how firms work; second, the scenarios were submitted at the end of a course focused on corporate governance, such as we expect them to be aware of what are, generally, considered good governance practices, and their impact on firms' decision-making processes; in addition, the course bring up issues specifically related to family corporate governance, such as students are conscious of key corporate governance complications in family firms. The participation to the experiment was totally spontaneous, and we explicitly stated that participation was anonymous. No incentives were provided to students that decided to participate to the experiment. We submitted the survey online using Qualtrics. The firm described in the pretest scenarios is identical to the ones we submitted to the final sample. However, given that the goal of the pretest is to validate each of the manipulated dimensions, we submit to every student four scenarios, resulting from the manipulation either of the level of conflicts or of the level of managerial skills. The submitted scenarios, then, either have high, or low, level of conflicts (conf), and either high, or low, level of managerial competences of family members (comp).

The dependent variables are the same used in the family firms' sample (i.e. the propensity to involve a non-family CEO, OCEO; a non-family director, OBOD; a non-family general manager, OGM; and a non-family shareholder, OOWN). We collect 214 observations for each dependent variable. We delete observations that are either not fully completed or where the respondents misperceived the level of conflict and/or of competence. Aware of these misperception problems, we improve the scenarios to be submitted to the final sample of firms. Students had more difficulties to correctly perceive the level of family members' managerial competence. For this reason, we end up with 193 observations on scenarios where the

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manipulated dimension is conflicts, and 161 observations on scenarios where the manipulated dimension is the level of managerial skills of family members.

The main effects are validated over the sample: conflicts significantly increase the likelihood of involving non-family parties in managerial and governance structures, as lack of managerial competences does. As such, when students identify themselves in family CEOs, they perceive the involvement of non-family parties as a way to mitigate conflictual situations among family members, and to convey managerial competences to family firms (table 2a and 2b).

The pretest confirms that the presence of conflicts among family members, and the lack of managerial competences of family executives, represent two contexts where family firms are more likely to involve non-family parties.

4.3 Survey data.

Some information is not readily available through public sources. This is especially true for what concerns family firms, which are overall characterized by lower disclosure level compared to non-family firms (i.e. Wagner et al., 2015), especially when privately held, because they have no obligations to disclose information. As such, dependable data are difficult to obtain (Schulze, Lubatkin and Dino, 2003). Yet, we didn’t want to proxy socio-emotional attachment using corporate governance measurements (i.e. involvement of the family members in managerial and governance structures). In fact, family power to accomplish socio-emotional utilities, is often inferred by family control, to which follows that an important assumption in the family firms’ literature is the idea that a linear relationship exists between governing the firm through ownership and managerial control, and the likelihood of a predictable set of behaviors within family firms. This is as stating that the ability to achieve a goal and which goals are to be achieved overlap (Allison, 2014). Yet, inferring socio-emotional attachment

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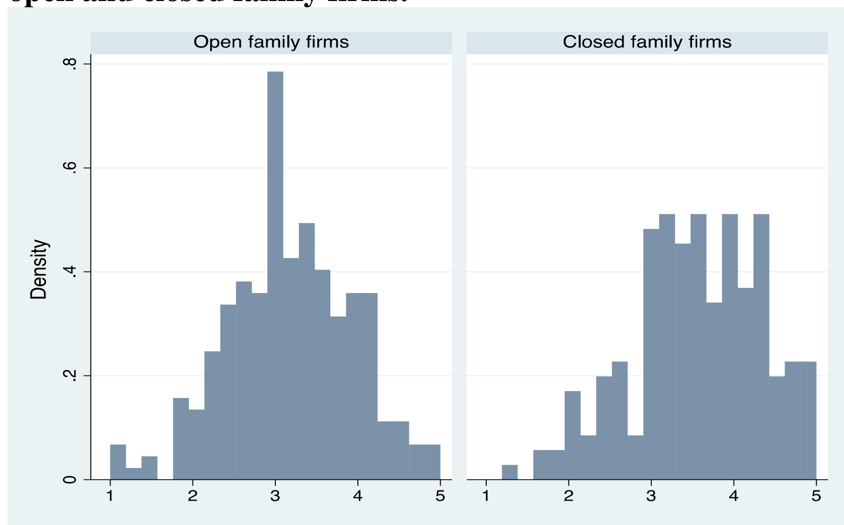
influences decision-making based on family control of governance structures is a strong assumption. For this reason, we asked family respondents how much socio-emotional attachment influences their decision-making process, resorting to questions (appendix 2) about the influence ten items recurrently associated to socio-emotional utilities in the literature of family firms exercise on decision-making (Berrone et al., 2012). This allows us to have an accurate perception of the real influence of socio-emotional attachment on decision-making in family firms.

Table 3. Distribution of socio-emotional attachment in family firms: comparison between open and closed family firms.



Overall, the sample has a mean value of socio-emotional attachment equal to 3.35. We define family firms that have at least a non-family member in their governance structures "open family firms", whereas family firms that are totally under family control are defined "closed family firms" – where both ownership, CEO and board of directors under family control. Table 3 shows the distribution for socio-emotional attachment, comparing open and closed family firms. The graphs show that when a non-family member is involved in governance structures, the distribution of socio-emotional attachment is normally distributed. On the contrary, when

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family firms are totally managed and controlled by a family, the distribution is more skewed to the right, towards the highest values of socio-emotional attachment. Moreover, a t-test confirms a statistically significant difference in means between open and closed family firms' socio-emotional attachment values (t=4.772), with open family firms characterized by higher socio-emotional attachment mean values (mean=3.56) compared to closed family firms (mean=3.19). These data support the existence of a relationship between socio-emotional attachment and governance structures in place in family firms.

We use the survey also to collect educational data of decision-makers in family and non-family firms.

In our sample, the educational gap between family and non-family firms is neat. The difference in means between the education level of family and non-family firms is statistically significant (t=3.3405), with non-family firms characterized by an overall higher level of education compared to family firms. In fact, 76% of non-family firms is characterized by an high level of education, against 64% of family firms (table 4a). More in depth, when making a comparison within family firms the educational gap is even striker. Open firms overall have higher education level compared to closed family firms. In fact, 67% of open family firms' respondents have at least a university degree, against 52% of closed family firms (table 4b). These data support a straightforward evidence of a relationship between education and governance structures, hinting at the importance of education in influencing governance structures' decisions in family firms.

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Table 4a. Educational level: comparison between family and non-family firms.

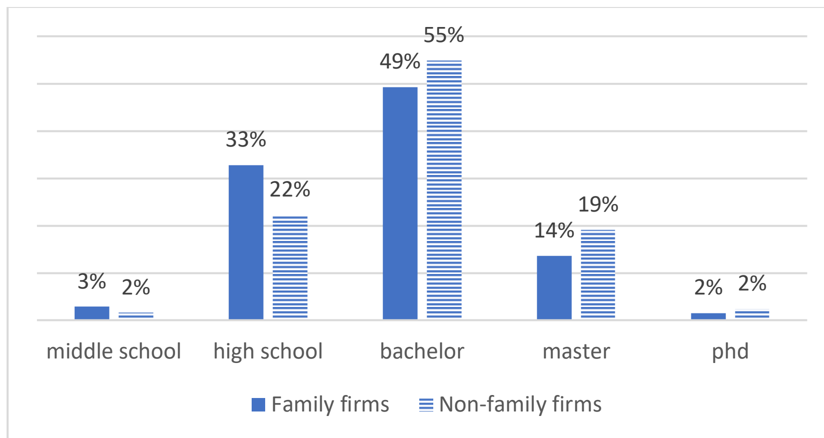
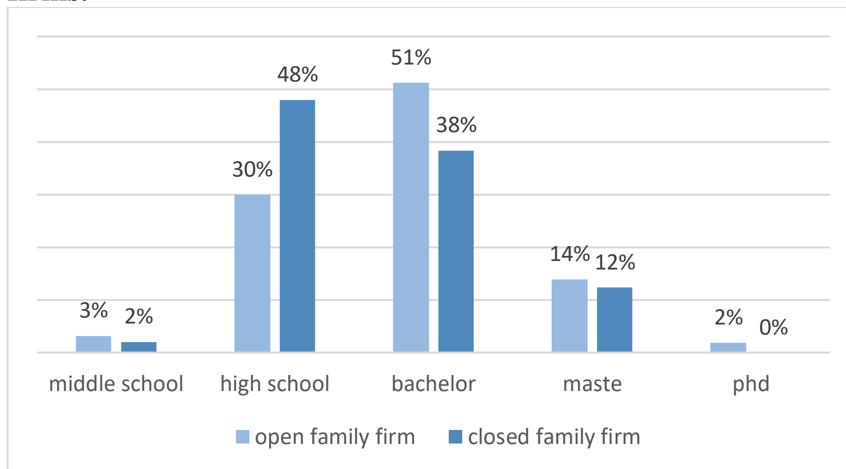


Table 4b. Educational level: comparison between open family firms and closed family firms.



4.3.1 Validation of the relationship between education and governance structures.

Previous results demonstrate the significant relationship between education and awareness about the existence, and related benefits, of superior practices (Bloom and Van Reenen, 2006). Yet, studies up to date do not explicitly validate the relation between education and awareness about governance's best practices.

As such, we need to validate that a correlation between education and awareness exist in our data, and its applicability to corporate governance structures.

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We use the survey to collect data on awareness. We ask family respondents how aware they are of the possibility to involve non-family parties in their family business, and how they quantify the benefits of involving non-family parties in managerial and governance structures (appendix 6a, 6b, 6c).

Data collected with the survey confirm that a correlation between education and awareness exists. We asked respondents how aware they are of the benefits of involving non-family parties in their managerial and governance structures (in the board of directors, in the ownership, and as managers). Higher mean values of education are associated to higher level of awareness about the benefits non-family parties bring to managerial and governance structures of family firms. In fact, we find that the highest mean values levels are the ones associated to a situation where family respondents are not only aware of the possibility of involving non-family parties in their family business, but also have evaluated the benefits they would bring to their business.

Secondly, to validate the relationship between education level and governance best practices, we verify in our data that a correlation between education and the knowledge of the requirements to be listed on the Stock Exchange is in place. In fact, among the requirements for listing, there are guidelines and recommendations about what are commonly defined best practices for governance structures, like, in example, the introduction of independent directors in the board of directors. To do so, we ask family respondents how well they know the requirements to be listed on the Stock Exchange.

We regress education on knowledge of the requirements, controlling for firm's size (log_turnover) and sectors, and find that education significantly impacts on how deeply respondents know about stock exchange requisites (table 5), supporting the idea that higher level of education are associated to greater knowledge of governance best practices. Thus, the relationship between education and knowledge is validated.

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Table 5. The effect of education on the knowledge of the requisites to be listed on the stock exchange.

VARIABLES	Knowledge about how to be listed on the stock exchange
educ	0.209***
	(0.0803)
lg_turnover	0.279***
	(0.0742)
Observations	375
Sector	YES
Role respondent	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

4.4 Description of the variables.

Dependent variables. We measure four dependent variables, namely: the propensity of involving non-family parties in the board of directors (*OBOD*), the propensity of involving non-family parties in the ownership (*OOWN*), the propensity of involving non-family parties as CEO (*OCEO*), the propensity of involving non-family parties as general manager (*OGM*). The dependent variables are measured on a Likert scale from 1 to 5, where 1 stays for "it is extremely unlikely I will involve non-family parties", and 5 stays for "it is extremely likely I will involve non-family parties".

For non-family firms we measure the same four dependent variables, slightly modified. In detail, for non-family firms, *OBOD* represents the propensity of involving new directors in the board of directors, *OOWN* the propensity of involving new shareholders, and *OCEO* and *OGM* respectively the propensity of changing the CEO and the GM.

Manipulated variables. For the family sample, *conf* is a dummy variable, equal to 1 when the level of conflicts among family members is high, and to 0 otherwise. Similarly, for the non-family sample, *conf* is the level of conflicts among managers. In the family sample, *comp* is a

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dummy variable, equal to 1 when family members do not lack managerial competences compared to non-family parties, and 0 otherwise. In the non-family sample, *comp* is the level of internal managerial competences compared to the level of managerial competences available in the market.

Explanatory variables. We collect the educational background (*educ)* of the respondents on a scale from 1 to 5, where 1 stays for the lowest achievable educational level in Italy (middle school), 2 for high school, 3 for university degree, 4 for master degree, and 5 stays for Ph.D. *Deduc* is a dummy variable, equal to 1 when the level of respondent's education is high, 0 otherwise. High levels of education correspond to educational achievement greater than high school (i.e. university, post-university master and PhD).

Table 6 plots the mean values of the four dependent variables (OCEO, OGM, OBOD and OOWN) for increasing values of education. As the level of education increases, the propensity to involve non-family parties is higher. The trend is especially remarkable for what concerns the decision to involve non-family directors in the board of directors. In fact, OBOD moves from a mean value equal to 2.93 for low levels of education, to a mean value of 3.22 for high levels of education.

For each family firm's respondent, we collect ten items related to the influence socio-emotional attachment exercises on decision-making. To identify the ten items we follow the literature on family firms. Specifically, we refer to the paper of Berrone et al. (2012). The authors identify five macro-categories where family priorities and values impact on the business, namely family control and influence, family members' identification with the firm, binding social ties, emotional attachment, renewal of family bonds through dynastic succession. Berrone et al. (2012) also propose a list of items for conducting surveys, identifying several elements per category. We decide to inspire our survey questions to Berrone et al. (2012), and to use at least

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one item per category in our measurement of respondents' socio-emotional ties to the family firm. Specifically, we aim at understanding how much socio-emotional attachment influences decisions within the family business. In the survey, we asked each family respondent how much, on a scale from 1 to 5, the ten items associated to socio-emotional attachment influence decision-making in their family business. Following a Cronbach Alpha test ($\alpha = .8399$), we generated a single variable, defined *sew*, as the weighted average of the ten items. The mean value of *sew* is equal to 3.35, with standard deviation equal to 0.79. We generate a dummy variable, *Dsew,* equal to 1 when the level of respondent's socio-emotional attachment is greater than 3.35, 0 otherwise.

Table 7 reports the mean values of the four dependent variables for low and high level of socio-emotional attachment. The propensity to involve non-family parties and socio-emotional attachment are negatively correlated. The line is particularly steep both for OCEO and OOWN, whereas for OBOD and OGM the line is relatively flat. The graph suggests that socio-emotional attachment plays a major role in the decisions to involve non-family CEOs and non-family shareholders.

Interaction terms. We interact level of conflict with education level (*conf***educ*) and with socio-emotional attachment (*conf***sew*). This allows to understand how family firms behave in conflictual situations when the socio-emotional attachment to the firm increases, or when the level of education increases. We interact also the level of managerial competence with education level (*comp*educ*) and socio-emotional attachment (*comp*sew*), to understand how family firms act when they lack managerial competences in two circumstances, for increasing socio-emotional attachment to the family firm, and for increasing education levels.

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Table 6. Average values for involvement of non-family parties in board of directors, GM, ceo, ownership, by education (educ).

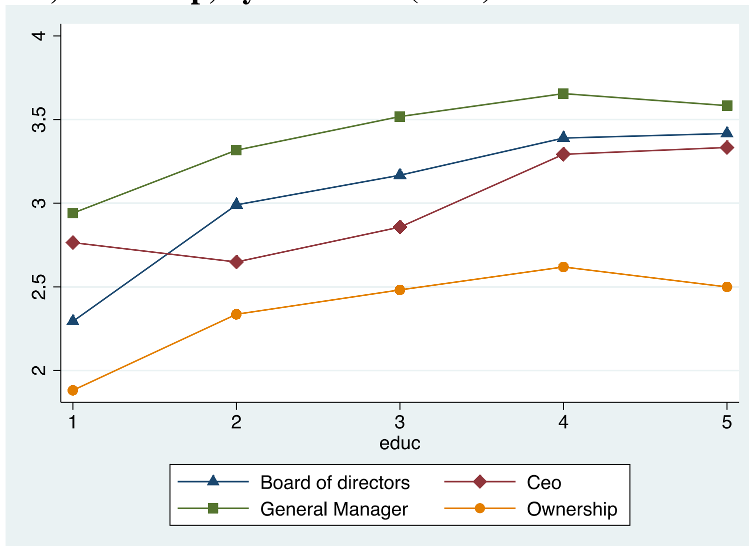
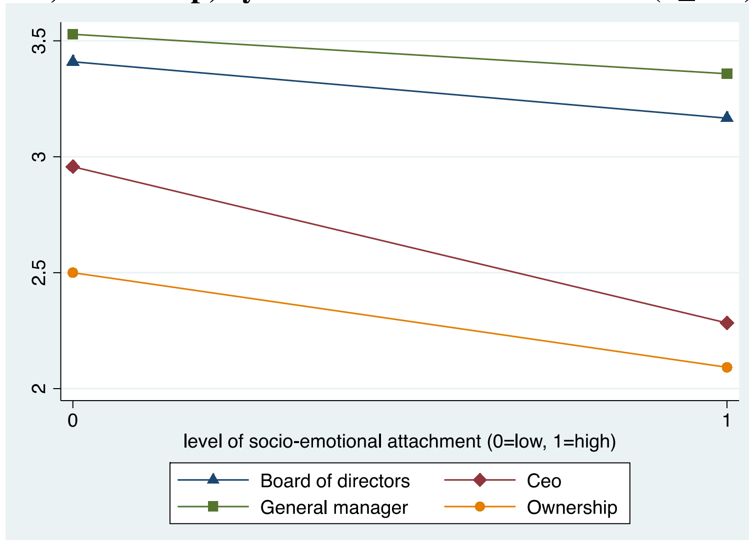


Table 7. Average values for involvement of non-family parties in board of directors, GM, ceo, ownership, by socio-emotional attachment (d_sew).



For non-family firms, we can not observe socio-emotional level as theoretically defined for family firms. As such we assign the value *0* to socio-emotional attachment for non-family firm, and we determine a dummy variable, *FAM_firm*, equal to 1 when the respondent belongs to a family firm, and to 0 when the firm is a non-family firm. We interact *FAM_firm* with *sew*,

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*sew*FAM_firm*, such as when the observed firm is a non-family firm, the resulting socio-emotional attachment value is equal to 0.

4.5 The model.

We estimate the following equation:

$$changes\ in\ managerial\ and\ governance\ structures = \alpha + \beta_1 educ + \beta_2 sew*FAM_firm + \beta_3 conf + \beta_4 conf*educ + \beta_5 conf*sew*FAM_firm + \beta_6 comp + \beta_7 compXeduc + \beta_8 comp*sew*FAM_firm + \beta_9 FAM_firm + \varepsilon \quad (1)$$

For the dependent variables are ordered responses from 1 to 5, we use ordered probit analysis. We also use OLS to estimate the results. As ordered probit analysis and OLS do not differ meaningfully in their magnitude and significance, we only show OLS results because of their more intuitive interpretation of the results.

5. RESULTS.

Table 8 shows results for equation (1). We estimate three models. In the first model and second model we consider only family firms; in the first model we limit the analysis to the manipulated variables; in the second model we control also for education, socio-emotional attachment; the third model is an extension of the second one, and consider also non-family firms.

When family firms are facing conflictual situations among family parties, the likelihood of involving non-family parties is greater when decisions concerns a non-family CEO (+0.447) or a non-family member of the board of directors (+0.545). However, conflicts have no effect on the likelihood of involving a non-family general manager and a non-family shareholders. The results suggest that family firms identify a non-family CEO or a non-family director as a viable solution to a situation of internal conflicts.

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Table 8. Results for the antecedents of a family governance.

		OCEO			OBOD			OGM			OOWN	
VARIABLES	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
conf	0.445***	0.945	0.744	0.546***	0.110	-0.190	0.260*	-0.168	0.712	-0.0265	-0.179	-0.245
	(0.145)	(0.815)	(0.474)	(0.159)	(0.898)	(0.482)	(0.140)	(0.792)	(0.442)	(0.137)	(0.777)	(0.427)
comp	-0.467***	-1.102	0.341	-0.0605	0.669	0.380	-0.480***	-0.207	-0.427	-0.169	0.128	-0.199
	(0.143)	(0.818)	(0.478)	(0.157)	(0.901)	(0.486)	(0.138)	(0.794)	(0.446)	(0.135)	(0.779)	(0.430)
educ		0.131	0.309**		0.563***	0.338**		0.461***	0.310**		0.113	0.0485
		(0.180)	(0.141)		(0.198)	(0.143)		(0.174)	(0.131)		(0.171)	(0.127)
conf*educ		-0.0762	-0.0976		-0.0441	0.0303		-0.390**	-0.260*		0.0147	0.0672
		(0.191)	(0.150)		(0.210)	(0.152)		(0.186)	(0.140)		(0.182)	(0.135)
comp*educ		0.0491	-0.177		-0.432**	-0.278*		-0.226	-0.0991		0.0400	0.00138
		(0.193)	(0.151)		(0.212)	(0.154)		(0.187)	(0.141)		(0.184)	(0.136)
sew*Fam_firm		-0.403**	-0.295***		-0.382**	-0.373***		-0.308**	-0.166*		-0.206	-0.269***
		(0.157)	(0.102)		(0.173)	(0.103)		(0.152)	(0.0947)		(0.150)	(0.0914)
conf*sew*Fam_firm		-0.0949	-0.0228		0.149	0.180***		0.444**	0.0945		0.0277	0.00572
		(0.180)	(0.0642)		(0.198)	(0.0653)		(0.175)	(0.0599)		(0.171)	(0.0578)
comp*sew*Fam_firm		0.174	-0.0565		0.162	0.121*		0.107	0.0738		-0.104	0.0191
		(0.176)	(0.0648)		(0.194)	(0.0659)		(0.171)	(0.0605)		(0.168)	(0.0584)
Fam_firm			0.492			1.267***			0.341			0.371
			(0.318)			(0.324)			(0.297)			(0.287)
Constant	2.670***	3.615***	2.257***	3.101***	2.782***	2.110***	3.607***	3.370***	2.929***	2.311***	2.667***	2.686***
	(0.127)	(0.754)	(0.438)	(0.140)	(0.830)	(0.446)	(0.123)	(0.732)	(0.409)	(0.120)	(0.718)	(0.395)
Observations	396	396	661	396	396	661	396	396	661	396	396	661
R-squared	0.057	0.102	0.127	0.031	0.077	0.073	0.043	0.084	0.071	0.004	0.037	0.061

Standard errors in parentheses
*** $p<0.01$, ** $p<0.05$, * $p<0.1$

When family firms possess internally the managerial skills, they are less prone to involve non-family parties as CEOs (-0.4888) and general managers (-0.493). The results indicate that a solution to a family-related managerial skill problem can be reduced involving non-family CEOs and non-family general managers. However, the effect is not significant on the board of directors, suggesting that family firms perceive as more valuable the role of non-family directors as intermediaries between family and business goals, rather than as providers of managerial skills and competences.

However, the complete model shows that the manipulated dimensions lose totally their explanatory power when controlling for education and socio-emotional attachment. Indeed, the key drivers to make changes in managerial and governance structures are mainly two: the level of education of decision-makers, and the socio-emotional attachment to the family firm.

In fact, higher levels of education are associated to greater propensity to involve non-family parties in managerial and governance structures. However, this is not true when family firms make decisions about the involvement of non-family shareholders in the family firm. This is very likely driven by the fact that decisions to involve non-family shareholders are usually

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based on strict financial necessities, and as such other factors drive their changes. Yet, education increases the propensity to hire non-family CEOs and non-family general managers, and, above all, the predisposition to involve non-family directors in the Board of Directors, where the magnitude of the effect is even stronger. On the contrary, socio-emotional attachment impacts negatively on the propensity to involve non-family parties in managerial and governance structures. In fact, socio-emotional attachment significantly reduces the predisposition to involve non-family CEOs, non-family directors and non-family shareholders. Nevertheless, socio-emotional attachment can also exercise a positive effect on the propensity to involve non-family parties. In fact, both interaction terms, *conf*sew* and *comp*sew*, significantly increases the propensity to involve non-family directors. A likely explanation is that family parties do not perceive the involvement of non-family directors as a threat to maintaining and exercising control over the family firm, but as a viable solution to a critical situation, that, if successfully managed and solved, may guarantee the survival of socio-emotional attachment.

A final remark is about the difference between family and non-family firms. Only when the decisions to involve non-family directors and non-family shareholders is at stake, family and non-family firms exhibit significantly different behaviors, with family firms more prone to involve non-family directors and non-family shareholders. Yet, the magnitude of the effect is small (approximately + 0.06).

5.1 Is socio-emotional attachment the result of a penalized access to the managerial market?

In this study, we claim that socio-emotional attachment is, together with the education level of decision-makers, a key driver of corporate governance decisions. However, it may be that the effect we ascribe to socio-emotional attachment is the consequence of some other firms'

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characteristics. Take the example of a firm that cannot participate efficiently to the managerial market, like firms located far from metropolitan areas: these firms may be less attractive to managers compared to firms located in important metropolitan areas. In this context, the negative influence of socio-emotional attachment on the decisions to involve non-family parties may express the inability of family firms to effectively access the managerial market, rather than a real attachment to family socio-emotional elements.

Table 9. Metropolitan areas and their impact on managerial and governance decisions.

VARIABLES	(1) OCEO	(2) OBOD	(3) OGM	(4) OOWN
conf	0.781	0.314	-0.120	-0.622
	(0.882)	(0.979)	(0.858)	(0.841)
comp	-1.796**	0.298	-0.355	-0.150
	(0.882)	(0.980)	(0.859)	(0.842)
educ	-0.0142	0.478**	0.483**	0.0620
	(0.195)	(0.216)	(0.190)	(0.186)
conf*educ	-0.101	-0.0994	-0.397**	0.0183
	(0.203)	(0.225)	(0.198)	(0.194)
comp*educ	0.208	-0.325	-0.206	0.0192
	(0.207)	(0.230)	(0.201)	(0.197)
sew	-0.441**	-0.351*	-0.327**	-0.317*
	(0.171)	(0.190)	(0.166)	(0.163)
conf*sew	-0.0355	0.126	0.428**	0.125
	(0.193)	(0.215)	(0.188)	(0.185)
comp*sew	0.246	0.195	0.153	-0.0205
	(0.190)	(0.211)	(0.185)	(0.182)
d_met	-0.0386	-0.0216	0.157	-0.0436
	(0.164)	(0.182)	(0.160)	(0.156)
Constant	4.459***	2.774***	3.167***	3.740***
	(0.905)	(1.005)	(0.881)	(0.864)
Observations	368	368	368	368
R-squared	0.139	0.121	0.137	0.097
Sector	YES	YES	YES	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

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To exclude this option, we perform an analysis based on the 14 metropolitan areas in Italy, namely: Bari, Bologna, Cagliari, Catania, Firenze, Genova, Messina, Milano, Napoli, Palermo, Reggio Calabria, Roma, Torino and Venezia. We generate a dummy variable, *d_MET*, equal to 1, when a family firm's head quarter is in a metropolitan area, 0 otherwise. Approximately 33% of family firms in our sample is in a metropolitan area.

To exclude that proximity to metropolitan areas matters, we include *d_met* as an explanatory variable in equation (1). The results do not change (table 9), reinforcing the idea that socio-emotional attachment is not the result of a penalized geographical location. We can then advance that socio-emotional preferences are independent of the managerial market, which implies that the development of socio-emotional attachment is not the outcome of an inefficient managerial market.

6. DICSUSSION AND CONCLUSIONS.

Human capital and socio-emotional attachment are important antecedents of governance structures in family firms. We test, using a scenario-based approach, the relationship in place between socio-emotional attachment, education and the involvement of non-family parties in key governance structures; our results confirm that the propensity to involve non-family parties is affected both by the intensity of socio-emotional attachment and by the level of educational attainment of key decision-makers.

We extend our understanding on the socio-emotional construct providing empirical evidence of the influence socio-emotional attachment exercises on governance structures. This relationship has been, to our best knowledge, either studied resorting to a theoretical approach, or inferred by the governance structures in place in family businesses. The direct measurement of socio-emotional attachment used in this study not only permits to empirically demonstrate

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that higher levels of socio-emotional attachment are associated to lower propensity to involve non-family parties in governance structures, but it also reveals a new aspect of the construct, that we didn't anticipate in our reasoning: socio-emotional attachment does not influence the definition of governance structures with the same intensity; the effect is stronger when family members have to renounce to leadership positions inside the family firm (i.e. CEO), whereas it is less pronounced when family members make the decision to involve a non-family general manager in the family business. The logic behind the socio-emotional construct predicts that the control of governance structures is a necessary condition to exercise family influence and to prioritize family demands. Yet, our results support the idea that the control of leadership positions is essential for family members characterized by high levels of socio-emotional attachment. We can hypothesize that as the achievement of non-economic goals is dependent on family's control over the firm, family members are particularly reluctant to acknowledge leadership positions to non-family parties, because it lessens their discretion and control over non-economic goals (Kotlar et al., 2017; Berrone et al., 2012; Deephouse & Jaskiewicz, 2013; Carney, 2005). CEOs are key figures for the definition of strategies and resources allocation (Jung, Chow & Wu, 2003; Hambrick & Mason, 1984), and have a major role in the definition of corporate guidelines, to which follow a strong influence over organizational processes (Gedajlovic, Lubatkin & Schulze, 2004) and over goals' prioritization. As such, the control of leadership increases the likelihood of allocate resources respecting the values and beliefs of the controlling party (Finkelstein & Hambrick, 1990), in this case of the family itself.

Secondly, the introduction of human capital provides new insights on the decision-making process of family firms. Our data confirm that a relationship between education and knowledge of best-governance practices exist, extending the applicability of Bloom et al. (2011) results to governance practices. Moreover, the scenarios extend our understanding on this relationship,

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associating to higher educational achievements a greater propensity towards the involvement of non-family parties. This effect is particularly strong for the involvement of non-family directors and non-family general managers. These results emphasize an unexplored aspect of the decision-making processes of family firms, suggesting that less educated family parties underestimate the benefits non-family directors and non-family general managers bring to the family business.

Implications for practitioners are relevant. Indeed, the identification of human capital as a driver of governance-related decisions in family firms permits to recognize a specific area of intervention: the educational level of family members. A greater alignment between family firms' governance practices and governance best practices can then be realized intervening on the educational aspirations of family members, rather than on their socio-emotional attitudes.

6.1 Limitations and future area of research.

We are aware of some limitations in our study. The most relevant ones are associated to how we measure human capital. Education is often used to proxy human capital (Lin et al., 2011; Perez-Gonzalez, 2006). However, even if it represents a common practice in the business field, we recognize that our results would be enriched by the introduction of broader measurements of human capital. Moreover, we didn't consider where respondents obtained their university degree. We are aware that eliterian universities can have an impact in the definition of managerial skills (Perez et al., 2006; King, Srivastav & Williams, 2016), however in Italy there is not as much heterogeneity in terms of university quality as, for example, in the USA. Consequently, we don't think this issue would affect our results as our sample is drawn from the Italian population of family firms, even if the results could positively benefit from the replication of the study in countries characterized by greater educational heterogeneity.

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7. APPENDIX

Appendix 1.1. Extracts from the scenarios (family firm sample):

- Family firm, third family generation
- 100% family controlled and managed
- Many family members active in the family firms, without previous experience outside the family firm
- Financial Crisis
- High/low conflicts among family members (manipulated dimension)
- High/low managerial skills of family members (manipulated dimension)
- Competitors successfully reacted to the crisis internationalizing and diversifying
- To contrast the crisis, the firm should imitate their competitors
- Availability of managers, potential partners, directors, who may generate immediate benefits whenever the firm decides to internationalize or diversify

Appendix 1.2 Extracts from the scenarios (non-family firm sample):

- The respondents identify with a consultant with a broad mandate to make decisions
- Financial Crisis
- Competitors successfully reacted to the crisis internationalizing and diversifying
- High/low conflicts among managers (manipulated dimension)
- High/low managerial skills of top management team (manipulated dimension)
- Competitors successfully reacted to the crisis internationalizing and diversifying
- To contrast the crisis, the firm should imitate their competitors
- Availability of managers, potential partners, directors, who may generate immediate benefits whenever the firm decides to internationalize or diversify
- Competitors successfully reacted to the crisis internationalizing and diversifying
- To contrast the crisis, the firm should imitate their competitors
- Availability of managers, potential partners, directors, who may generate immediate benefits whenever the firm decides to internationalize or diversify

Appendix 2.

To measure socio-emotional attachment we generate a variable sew, taking items from Berrone et al. (2012), an influential paper in family business research which reviews the most important dimensions of socio-emotional attachment. We have selected 10 among the many cited in the paper (at least one per identified category), and asked family respondents how much these dimensions, on a Likert scale 1-5, influence decision-making in their family firms:

- Maintaining majority of shares under family control

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- Maintaining strategic decisions under family control
- Assigning the majority of managerial positions to family members
- Maintaining a family board of directors
- Maintaining a family firm identity
- Promotion of social activities for the local community
- Nurturing a sense of belonging towards the family firm
- Providing economic stability to family members
- Transferring the family business to the next generation
- Maintaining strong relationship among family members involved in the family business

Appendix 3. Descriptive statistics of the sample.

The turnover between sampled firms and Italian population of firms is approximately the same, around € 104 mln. Sectors are well represented too, even if sampled firms have a marginally higher percentage of manufacturing firms. Geographically, sampled firms have a slightly higher percentage of firms from northern Italy, following that firms from central Italy are marginally lower represented in the sample. However, firms from southern Italy are perfectly represented in the sample. Overall, geographical representation is satisfactory.

Appendix 3a. Distribution across regions: comparison between family firms' sample and population of Italian family firms.

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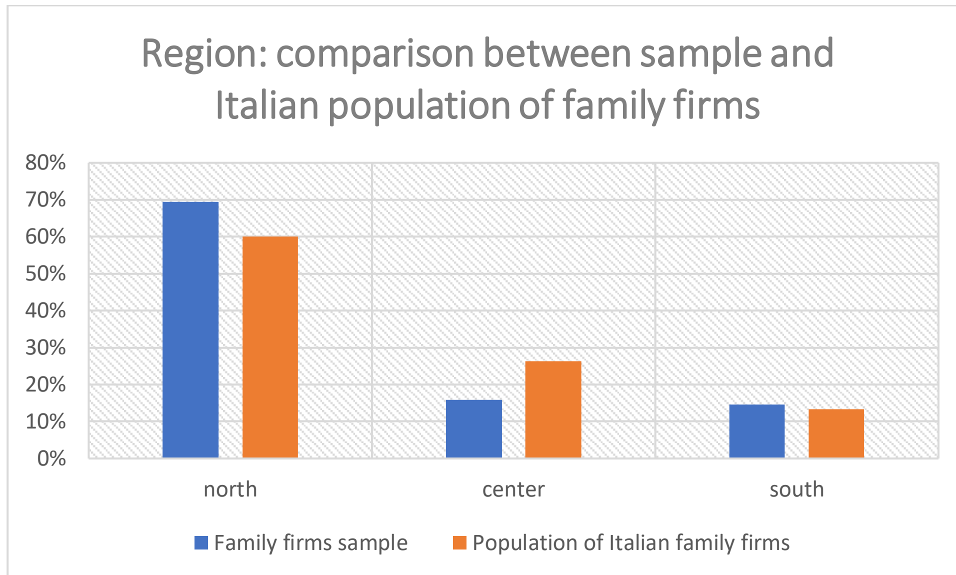
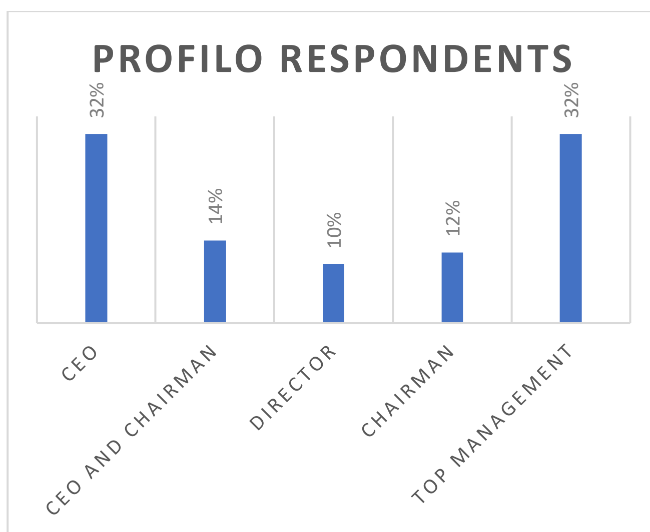


Appendix 3b. Description of respondents' profiles.



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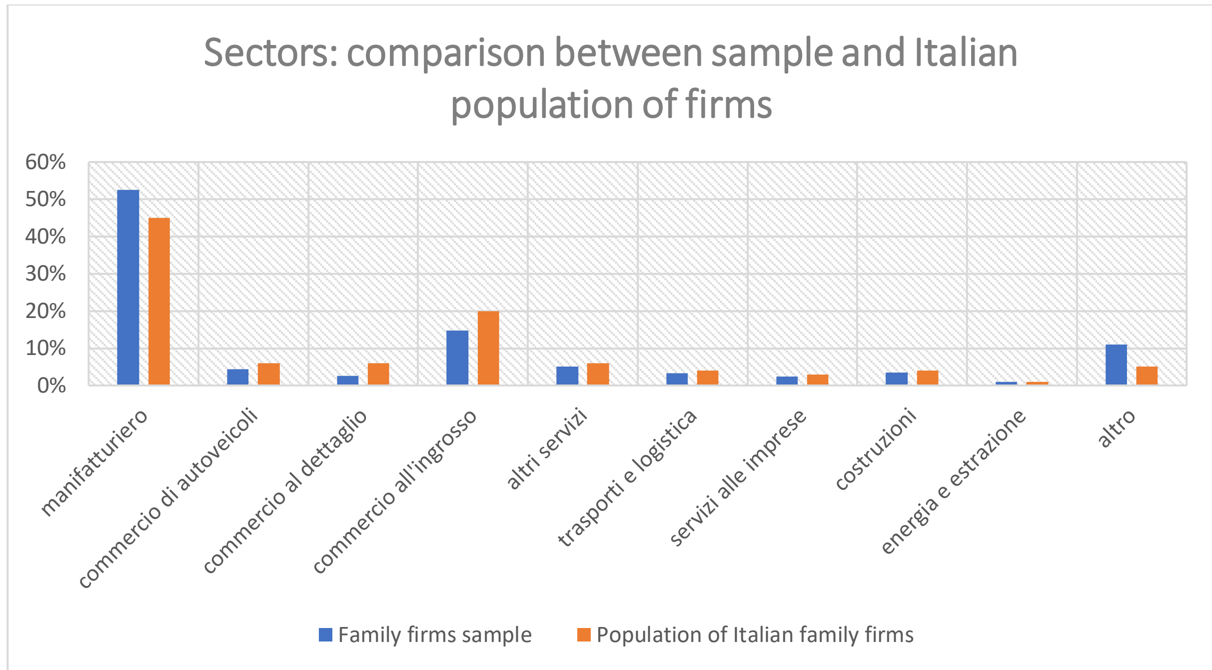
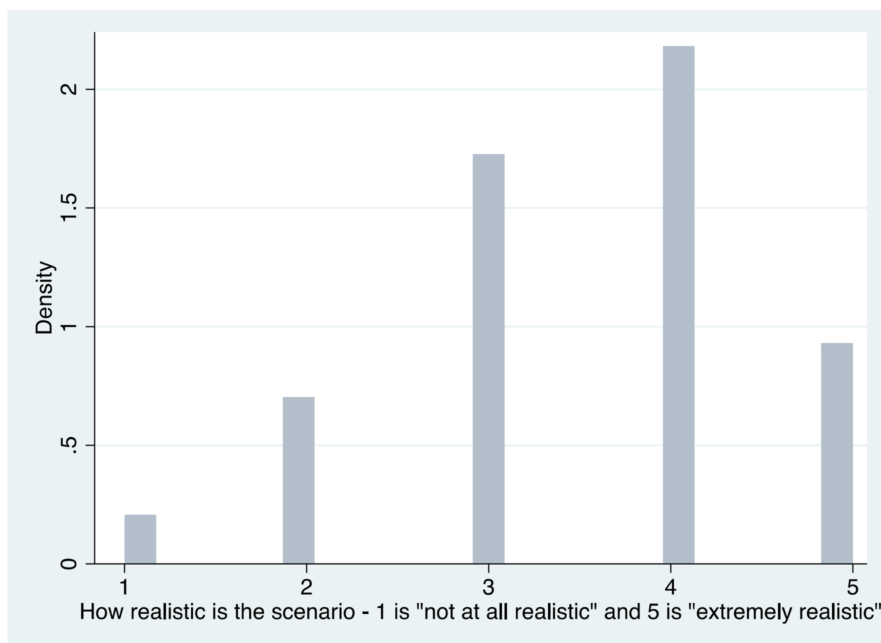
Appendix 3c. Distribution across sectors: comparison between family firms' sample and Italian population of family firms.



Appendix 4. Respondents' perception of the scenarios (entire sample).



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Appendix 5a. Scenarios mean values and standard deviation: comparison between family and non-family firms.

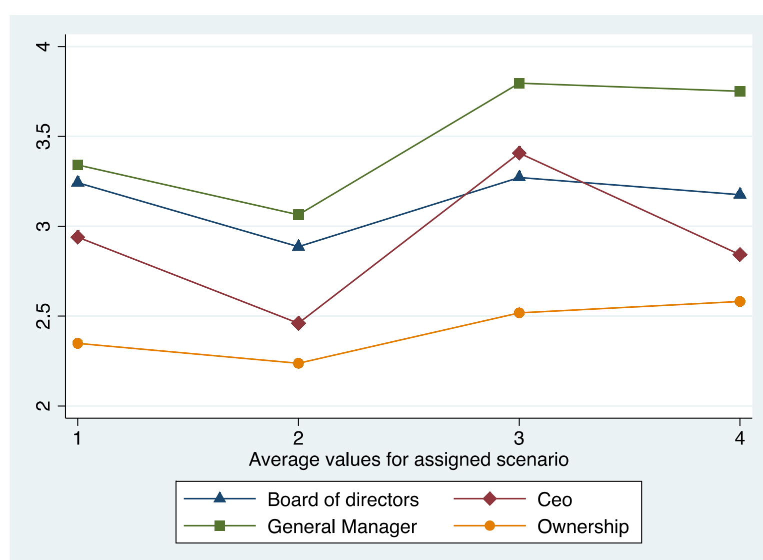
	Scenario I		Scenario II		Scenario III		Scenario IV		Control scenario
	Family N= 77	*Non-family N=57*	*Family N= 151*	*Non-family N=52*	*Family N=85*	*Non-family N=80*	*Family N= 96*	*Non-family N=76*	*Family N=54*
OAD	(2.46;1.39)	(3.54;1.42)	(2.29;1.35)	(2.96;1.50)	(3.26;1.37)	(3.55;1.53)	(2.54;1.44)	(3.21;1.48)	(2.72;1.35)
OCDA	(3.71;1.44)	(2.59;1.36)	(2.98;1.54)	(2.65;1.29)	(3.51;1.44)	(3.02;1.41)	(3.2;1.68)	(3.11;1.23)	(3.25;1.58)
ODG	(3.54;1.35)	(3.05;1.31)	(3.04;1.40)	(3.13;1.38)	(3.70;1.30)	(3.88;1.29)	(3.73;1.27)	(3.75;1.22)	(3.44;1.38)
OOWN	(2.19;1.36)	(2.52;1.26)	(2.09;1.32)	(2.65;1.20)	(2.19;1.21)	(2.85;1.91)	(2.37;1.33)	(2.80;1.25)	(2.85;1.48)

Note: in parenthesis means and standard deviations.

5b. Descriptive statistics by scenario.

VARIABLES	(1) assigned_scenario 1 mean	(2) sd	(3) assigned_scenario 2 mean	(4) sd	(5) assigned_scenario 3 mean	(6) sd	(7) assigned_scenario 4 mean
turnover_last_available_year	113,859	363,320	111,727	350,811	113,739	205,201	147,894
ROA	5.317	7.010	5.847	7.468	5.978	9.201	5.690
ROI	7.744	9.674	8.332	7.367	8.071	9.374	8.262
ROS	4.496	5.700	4.482	6.195	4.595	6.236	4.546
ROE	7.832	18.06	7.932	19.71	10.83	16.34	7.332
OCDA	3.235	1.497	2.897	1.487	3.258	1.451	3.163
ODG	3.324	1.349	3.078	1.402	3.791	1.298	3.741
OAD	2.934	1.492	2.456	1.422	3.393	1.463	2.849
OOWN	2.360	1.337	2.235	1.311	2.509	1.244	2.572
educ	2.841	0.790	2.777	0.819	3	0.739	2.836
sew_overall	3.447	0.776	3.433	0.854	3.174	0.776	3.290
d_educ	0.667	0.473	0.619	0.487	0.765	0.425	0.715
d_sew	0.605	0.492	0.553	0.499	0.439	0.499	0.528
generation== 1.0000	0.240	0.430	0.289	0.455	0.159	0.367	0.213
generation== 2.0000	0.427	0.498	0.376	0.486	0.512	0.503	0.393
generation== 3.0000	0.200	0.403	0.242	0.430	0.244	0.432	0.281
generation== 4.0000	0.133	0.342	0.0940	0.293	0.0854	0.281	0.112
az_chiusa_strict	0.147	0.356	0.100	0.301	0.0366	0.189	0.124
az_chiusa	0.440	0.500	0.407	0.493	0.329	0.473	0.416

5c. Average dependent variables values per scenarios.



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Appendix 6a. Awareness and education: board of directors.

	Summary of d_educ		
Awareness - Non family parties in the BoD	Mean	Sd	Freq
I thought about it and they bring benefits to the firm	.71	.45	241
I thought about it and they don't bring benefits to the firm	.55	.50	66
I though about it, but I never evaluated the benefits	.64	.48	73
I never thought about it	.49	.50	70
	.64	.48	450

Appendix 6b. Awareness and education: managers.

	Summary of d_educ		
Awareness - Non family parties as managers	Mean	Sd	Freq
I thought about it and they bring benefits to the firm	.69	.46	320
I thought about it and they don't bring benefits to the firm	.45	.50	46
I though about it, but I never evaluated the benefits	.59	.49	44
I never thought about it	.47	.47	40
	.64	.48	450

Appendix 6c. Awareness and education: ownership.

	Summary of d_educ		
Awareness - Non family parties in the ownership	Mean	Sd	Freq
I thought about it and they bring benefits to the firm	.69	.47	125
I thought about it and they don't bring benefits to the firm	.59	.50	85
I though about it, but I never evaluated the benefits	.63	.49	105
I never thought about it	.64	.48	135
	.64	.48	450

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CHAPTER 2

Returns to a family corporate governance:

an empirical advancement.

Abstract

This paper studies the returns to a family corporate governance by means of instrumental variables. Using a sample of Italian private family firms, we find evidence that, once controlled for education and socio-emotional attachment, a family ownership achieves greater financial returns compared to a non-family structure, whereas a non-family board of directors is a booster for growth.

Keywords: corporate governance, education, socio-emotional preferences, family firms, decision-making

1. INTRODUCTION.

The debate on whether a family governance affects positively or negatively the performance of family firms comprises a vast literature. Yet, this is "fundamentally an empirical question" (Belenzon, Patacconi & Zarutskie, 2016: 7).

We aim at progressing our knowledge on the topic through an empirical analysis of the data collected on a sample of private family firms, resorting to three different sources of data: public data (i.e. AIDA), survey data and data collected with experimental scenarios.

We advance our understanding of the topic focusing our attention on private family firms. In fact, the majority of studies on the subject focuses on public family firms (i.e. Anderson & Reeb, 2004; Lee, 2016; Van Essen, Carney & Gedajlovic, 2015). Public family firms are generally a very competitive form of organization, which benefit from the strength of having a

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family at the helm, without incurring in the limitations usually associated to family firms. In fact, the decision to list the family business on the stock exchange requires the family to trade some socio-emotional aspects with some purely objective economic considerations (Kotlar et al., 2018), reducing the likelihood of particularistic behaviors that favor family over business demands.

On the contrary, private family firms are more exposed to the risk of prioritizing socio-emotional aspects over business ones. For this reason, we have surveyed around 400 family firms to collect data on how strongly socio-emotional attachment influences business decisions. This direct measurement of socio-emotional attachment allows us to use it as a control, rather than as a proxy, when evaluating the effect of a family governance on performance. We are aware it is a common practice in the family business literature (i.e. Minichilli, Nordqvist, Corbetta & Amore, 2014); yet the recent developments in the family business literature have clearly posited that the influence socio-emotional priorities and values exercise on decision-making is among the key reasons why family and non-family firms differ (i.e. Dyer, 2018). As such, our attempt at introducing a direct measurement of socio-emotional element in the evaluation of what the consequences of a family governance are on firm performance could improve our understanding on the matter.

Then, we introduce in our analysis an important topic in the family business literature: human capital. Only few studies explicitly take it into consideration when evaluating the effect of a family governance on performance. This is an important contradiction in the field of family business. In fact, a vast plethora of family business scholars cite human capital as one of the most salient limitations for the success of family firms (i.e. Stewart & Hitt, 2012; Tsui & Auch, 2004; Belenzon, Patacconi & Zarutskie, 2016; Sciascia & Mazzolla, 2008): the decision to involve family members in the family business regardless of their talent; the propensity to

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promote family members to top management positions rather than more talented non-family parties; the desire to transfer the family business to the next generation even if the heirs do not show any propensity towards the business. These are just some examples that point at the human capital limitations that often characterize family firms. As such, we measure education to proxy the level of human capital in family firms, and we include it in our analysis of the effects of a family governance on performance.

Eventually, we introduce a new approach to instrumental variables. In fact, we use instrumental variables extracted by experimental scenarios submitted to family members actively engaged in the family business to disentangle the causal effect of a family governance on performance. Our analysis is then based not only on correlations, but is improved by the introduction of a causal identification between family governance and its effect on performance.

This chapter is organized as follow: first we present a review of the actual advancement of the relationship under study; we decide to focus our attention on two governance structures: the board of directors and the ownership structure of family business. This choice is driven by the fact that they represent the most relevant governance mechanisms in place in corporations (Deephouse & Jaskiewicz; 2013), and as such play a key role in the balance between economic and non-economic goals, a critical element for the success of family businesses.

Then, we present our empirically analysis and our conclusions.

Our findings support, and add to, the family business literature, confirming a positive effect of family ownership on financial performance, and a negative influence of a board of directors totally under family control on operational performance. Socio-emotional attachment and education affect performance only indirectly, through the definition of governance structures. In fact, as shown in chapter 1 of this study, the level of education and of socio-emotional attachment are antecedents to the identification of governance structures; yet, our data support

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they don’t exert any direct effect neither on financial performance, nor on operational performance.

2. THEORETICAL BACKGROUND.

2.1 Family firms and performance.

The study of the relationship between performance and family businesses is not a recent one. According to Dyer (2018) the interest on the topic raised around the 80s, but it wasn’t until 2003 that scholars provided significant empirical contribution to the subject: Anderson and Reeb (2003) published their results based on a sample of public family and non-family firms, and found that family firms had a performance advantage over non-family firms.

Since then, hundreds of articles have been published on the topic improving our understanding on the subject: scholars have attempted to disentangle the relationship resorting to many empirical tools, like propensity score matching, instrumental variables, and, recently, meta-analysis (O’Boyle, Pollack & Rutherford, 2012; Wagner, Block, Miller, Schwens, & Xi, 2015); have introduced new facets critical to the advancement of the field, presenting the concept of socio-emotional wealth (Gomez-Mejia et al., 2007); have identified contingencies to assess under what conditions family firms perform better, or worst, than non-family firms (i.e. Lee, 2006; Minichilli, Corbetta & Macmillan, 2010; Vandekerkhof, 2015; Chang & Shim, 2015).

The research on the topic is mainly focused on public family firms, and on the comparison between family and non-family firms. In fact, accessibility to financial data and reports, in addition to their relevance to worldwide economy, make this category of firms attractive and significant from a research point of view. Yet, private family firms represent a type of organization which cannot be compared with public family firms, differing, among other features, in terms of incentives structures and mechanisms, agency costs and corporate

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governance structures (Carney, Van Essen, Gedajlovic and Heugens, 2013). Above all, public family firms have less discretion over particularistic goals: the presence of minority shareholders make it less likely for public family firms to prioritize family demands over business demands. On the contrary, private family firms exercise greater discretion, and as such are free to prioritize not only economic objectives but also non-economic ones. The relevance of non-economic goals in private family firms is such that “family and nonfamily firms are largely noncomparable entities” (Dyer, 2006, 31(2):244), addressing the research on the relationship between performance and family business towards an approach which aims at disentangling the heterogeneity within family businesses (i.e. Chrisman, Sharma & Taggar, 2007; Chua, Chrisman, Steier & Rau, 2012).

2.1.1 The role of the family in public and private family firms.

In the past, the literature on family firms focused on public family firms, aiming at disentangling whether the involvement of the family produces positive or negative returns on performance, and at understanding whether this typology of firms overperform other ownership structures.

Overall, scholars agree on public family firms having an advantage over public non-family firms (i.e. Anderson & Reeb, 2004). The main explanation to these results resides in the idea that when family firms go public, they have already trade-off some of the socio-emotional utilities which may negatively affect firm’s valuation, and as such benefit both from the exploitation of family assets and from the access to a professional financial market. These studies often defines family involvement in terms of family ownership, and in some cases consider family involvement in the management and in the board of directors (i.e. Lee, 2006; Sacristan & Navarro, 2011; Patel, 2014; Van Essen et al., 2015). When family management is considered, the results support the idea that family management is often associated to lower

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firms' value. Perez et al. (2006) find that when family CEOs succession takes place, the market reacts negatively to the announcement and firm's value decreases. Chang and Shim (2015) use propensity score matching to validate the positive effect of professional managers on firms' performance, introducing some contextual factors which strengthen the effect, like the transition from founder to second generation, and the succession of professional managers with high educational level. Minichilli, Nordqvist, Corbetta and Amore (2014) find that the implementation of succession mechanisms is able to limit the negative effect of family CEOs succession on financial performance. Yet, this is true only when the board of directors is not controlled by family members. The board in these studies represents an important tool available for family businesses to monitor the behaviour of family managers (Anderson and Reeb, 2004), and to balance the conflict of interests that may take place in case of disagreement on corporate priorities, divergences which can be present both at family level, but also between family and non-family parties. The expertise and objectivity of non-family directors is considered essential to limit and preclude the expropriation of wealth and the entrenchment of family managers (Kroll, Walters and Wright, 2008; Dalton et al., 1998), and also to prevent unskilled family members to undertake key managerial positions (Shleifer and Vishny, 1997).

Recently, scholars' interest shifted to private family firms, aiming at comparing performance within family firms and between private family firms and non-family firms. A recent meta-analysis (Carney et al., 2013) conducts a comparison between family and non-family firms, and reports no significant difference between the two categories of firms, nor from a financial performance perspective, neither from an operational ones. Yet, when leadership positions are taken into consideration, scholars mostly agree on the beneficial effects of a family leadership (Minichilli, Corbetta and Macmillan, 2010; Miller et al., 2014) when mechanisms are in place to mitigate family discretion.

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Whereas the role of the board of directors is deeply investigated for public family firms, for private family firms scholars have mostly omitted the relevance of this governance mechanism in affecting corporate performance. In fact, family studies often use the structure of the board of directors to provide a definition of family firms, neglecting the direct effect boards could exercise on firms' performance. Few studies have directly attempted to assess the effect of outsiders in the board of directors over performance (i.e. Maseda et al., 2015), finding a positive effect of non-family parties' involvement on firms' performance, and underlying the importance of non-family directors to limit family-related opportunistic behaviours and liabilities.

The effect of family ownership on the performance of private family firms has attracted less interest than for public family firms. However, previous results find either no effect of a family ownership on performance (Westhead, 2006), or superior financial returns for increasing involvement of the family in the ownership (De Massis et al. 2013; Mazzola, Sciascia & Kellermans, 2013).

Overall, private family firms are less researched compared to public family firms. This is driven not by less interesting and important considerations about this category of firms, but by a limited availability of data. However, scholars have attempted to fill this gap with conceptual contributions to the subject (i.e. Gomez-Mejia, Cruz, Berrone, De Castro, 2011; Bammens 2011; Dyer, 2006; Kellermans, 2013; Che & Langli, 2015).

2.1.2 Operationalization of performance.

When family scholars evaluate the influence of a family governance on performance, they recurrently resort to three broad performance's measurement categories: accounting performance measures (Minichilli, Corbetta and Macmillan, 2010; Sacristan Navarro, 2011; Miller et al., 2014; Minichilli, Nordqvist, Corbetta and Amore, 2014; Chang and Shim, 2015);

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operational performance measures (Carney, 2013;); market value driven measurement (Lien and Li, 2013; Anderson and Reeb, 2004). Among public family firms, scholars evaluate firm's performance using Tobin's Q, a measure largely appreciated for his capacity to capture both current and future operating performance. Market valuations are not useful for private family firms, as such a myriads of accounting performance are used to compute family firms' performance, making it more difficult for scholars to compare results. Yet, return on assets is commonly used, followed by return on equity, return on investment, return on sales, and operating return on assets, appreciated because it not sensible to the capital structure of the firm. The most commonly used operational performance measures are the ones related to sales and employees growth, or R&D, internationalization, diversification ratios and corporate social responsibility. Lately scholars asked for new outcome measurements (Holt et al., 2017). In fact, the literature underlines that family firms often balance economic and non-economic goals (Kellerman, Eddleston & Zellweger, 2012), and that under some circumstances, they value non-economic returns more than economic ones, pointing at the importance of introducing socio-emotional related performance items.

2.1.3 Relevant contingency factors.

Contingency factors can be divided mainly in three categories: macroeconomic factors; firm-specific factors; family-related factors. In the first category enter studies that evaluate how environmental factors influence decision-making in family firms, and result in greater, or worst performance. Mostly scholars have focused on comparing developing countries to developed countries. In example, Fang, Memili, Chrisman and Welsh (2012) support that developing and developed countries differ in their attitude towards professionalization for reasons attributable

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to prevalent norms, both in terms of how diffused is professionalization, and of how diffused family firms with major family involvement are.

Firm-specific factors mainly refer to firm characteristics like size, firm age, industry, CEO tenure, governance structures in place (i.e. CEO duality), geographic area, which may moderate and better contextualize the effect of a family governance on performance (Sciascia & Mazzolla, 2008; Minichilli, Corbetta & Macmillan, 2010; Sacristan & Navarro, 2011; Zattoni, 2012; Deender, Aguilera & Crespi, 2013).

Family-related factors result from elements related to the family. Most commonly, scholars consider whether the founder is actively involved in the family business; the generation of the family business; the presence of family members in governance structures, like ownership and board of directors; the presence of major family shareholders; the ratio of family managers over non-family managers; the presence of the family name in the corporate name. These elements are relevant because they allow to make an evaluation of family discretion over decision-making, and to estimate how strongly socio-emotional utilities pervade the family business. However, few studies have empirically emphasized the role of human capital in influencing decision-making and performance in family firms, even if its importance is broadly recognized (i.e. King, Srivastan, Williams, 2016), and scholars conceptually recognize family firms' limitations with regard to human capital. Education plays a key role in influencing financial performance. Past research has emphasized the explanatory power of top management's education for performance differentials (Miller et al., 2015; Beber and Fabbri, 2012). However, this field of research remains largely unexplored in family firms, with few exceptions (i.e. Perez-Gonzalez, 2006), that have underlined the importance of family members' education for firm performances, where greater education impacts positively on overall firm's value.

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3. METHODS.

We resort to OLS analysis to identify correlations between a family governance and performance, and we employ instrumental variables to assess the causal relationship between family governance structures and performances.

We exploit three different sources of data. The data are the same used for chapter one, specifically we use: survey data, to assess family-related factors, in term of how strongly socio-emotional attachment affects decision-making in the surveyed firm, and of the level of education achieved by the respondent; we use data collected with the scenarios to extrapolate instrumental variables; we use public data to collect data about firms' performance, both in terms of financial performance and operational performance, and other firm-related factors.

3.1 Scenarios-based data.

In chapter one we use experimental scenarios to assess the antecedents of a family governance. In detail, the dependent variables measured through the scenarios capture the propensity to involve non-family parties in the governance structures of family firms. In fact, scenarios describe a family firm facing a critical financial situation, where the introduction of non-family parties would be a likely solution to the problem. Scenarios to be an effective tool to assess the causal relationship under study, require to have respondents that can identify with the scenarios. Our respondents are all family members that can influence the definition of governance structures in their family firm, because they are part of the family and have major executive roles. As such, we believe respondents to access to their own experience and preferences when identifying themselves with the scenarios, making scenarios' dependent variables good candidates for instrumental variables.

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3.2 Archival data.

To evaluate the effect of family corporate governance on performance, we collect financial data from public sources (i.e. AIDA and ORBIS). We are interested in financial performances (i.e. ROS and ROA), operational performances (i.e. size in terms of turnover and employees) and additional public information about treated firms (i.e. sectors, geographic area, age of the firm).

3.3 Survey data.

We resort to a survey to collect information that is not reliably collected using public sources. The survey has the main goal to capture two elements that affect the definition of governance structures in family firms, namely the level of socio-emotional attachment, and the level of education of the respondents. We also collect information about the generation actively involved in the business.

3.4 Sample.

We use the same sample as in chapter 1 of this project (see descriptive statistics chapter 1). Yet, we were not able to find financial and operational performance data for all family firms' that are comprised in the sample. As a consequence, our final sample ranges from a minimum number of observations equal to 287 to a maximum number of observations equal to 354, depending on the kind of performance measure we are using to perform the analysis. The sample is drawn from the total population of Italian family firms, as reported in the Italian Observatory of Family firms. Family firms are defined in terms of minimum stakes held by a single, or two, family. The minimum stake is 50 percent, because this is the threshold considered necessary in Italy to exert control over a family business (Bennesden and Wolfenzon, 2000). Socio-emotional priorities can be exercised only when the proprietary

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family exercises sufficient discretion over decision-making. As such, we believe a minimum threshold is required to validate the influence socio-emotional attachment may have over performance.

We collect one observation per firm. The respondents are all influent decision-makers, either CEOs, GMs, directors, chairmen, or top level executives.

3.5 Description of the variables.

3.5.1 Dependent variables.

We use four dependent variables, namely: return on sales, or *ros* (profit margin), return on assets (*roa*), logarithm of turnover (*log_turnover*) and logarithm of employees (*log_employee*).

3.5.2 Instrumental variables.

We use *OBOD* and *OOWN* as instrumental variables for the governance structures in place in the surveyed firms. *OBOD* and *OOWN* are extracted from the scenarios (see chapter 1 for description).

3.5.3 Explanatory variables.

We generate two dummy variables, *family_board* and *family_ownership*. The dummy variable *family_board* is equal to 1 when the board of directors is totally under family control, 0 otherwise; *family_ownership* is equal to 1 when the ownership is totally under family control, 0 otherwise. We collected these data using the survey.

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3.5.4 Control variables.

We include some control variables in our model. Following the literature on family firms, we control for the generation actively involved in the family business, as the presence of the founder, and of next generations, may partially explain firm's performance. We generate a dummy that identify which generation is running the family business, distinguishing among first generation, second, third and above third generation. We also control for sectors, because performance may vary across sectors, and we want to exclude our results are driven by sectorial differentials rather than by governance structures. We include firm's age, as more mature firms may be characterized by different growth rate and financial performance compared to younger firms. Eventually, we also control for the geographic area in which family firms operate. In fact, some areas in Italy are characterized by greater performance compared to others (i.e. north vs south). We generate a dummy for each of the twenty regions in Italy, to distinguish across regional performance.

3.6 The effect of a family governance structure on performance.

The literature on family firms' presents mixed results on the effect of a family governance structure on performances. We believe this discrepancy in results is driven by two important factors. First, by the omission of some important variables in the model. Our data support that the education of family decision-makers and the socio-emotional attachment to the family firm contribute significantly to the definition of family managerial and governance structures. As such, they should be controlled for. Moreover, socio-emotional attachment assumes that the family is willing to trade some economic return with non-economic utility. Consequently, socio-emotional attachment could potentially affect family firms' financial and operational

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performance. Also the educational attainment of the top management holds explanatory power in explaining performances differential.

Second, there is an important endogeneity problem. In fact, there is simultaneous causality between the dependent variable (performance) and the independent variable (family managerial and governance structures). The literature has mainly focused on the effect a family corporate governance has on performance. Yet, performance affects decisions about corporate governance structures. In fact, the cost of non-family resources is among the reasons why family firms do not involve non-family parties in their managerial and governance structures. Yet, also the opposite is true. In fact, hiring top executives or directors, is strictly dependent on the resources available to pay them. As such, it is likely to hypothesize that financial performance affects the decisions to involve non-family parties in governance structures. To solve the endogeneity issue, we resort to instrumental variables, using an innovative approach. In fact, the instruments of a family governance structure are extracted from the scenarios. We want to estimate the following model:

$$performances = \alpha + \beta_1 family_board + \beta_2 family_ownership + \beta_3 educ + \beta_4 sew + \varphi_1 sector + \varphi_2 geographic\ area + \varphi_3 family\ generation + \varphi_4 firm\ age + \varepsilon \quad (1),$$

where the first stage regressions are equal to:

$$family_board = \alpha + \beta_1 (OBOD) + \beta_2 educ + \beta_3 sew + \varphi_1 sector + \varphi_2 geographic\ area + \varphi_3 family\ generation + \varphi_4 firm\ age + \varepsilon \quad (2),$$

and to:

$$family_ownership = \alpha + \beta_1 (OOWN) + \beta_2 educ + \beta_3 sew + \varphi_1 sector + \varphi_2 geographic\ area + \varphi_3 family\ generation + \varphi_4 firm\ age + \varepsilon \quad (3),$$

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We rely on instrumental variables for two different typologies of corporate governance structures, namely the board of directors and the ownership. In the survey, we collected data on governance structures in family firms. Family firms' respondents had to declare whether the ownership (family_ownership) and the board of directors (family_board) are totally under the control of the family. Family_ownership and family_board are dummy variables, equal to 1 when the governance structure is totally under family control, 0 otherwise. In the scenarios, we collected the following relevant dependent variables: the propensity to involve non-family shareholders in the ownership of the family firm (*OOWN*), and the propensity to involve non-family directors in the board of directors (*OBOD*), on a scale from 1 (extremely unlikely) to 5 (extremely likely). Then, we consider *OBOD* and *OOWN* as the instruments for *family_board*, and for *family_ownership*. We expect strong correlation between the instrument and the instrumented variable, because we expect family firms that are involving non-family parties into managerial and governance structures, to be characterized by higher propensity to involve non-family parties also in the scenarios. In fact, for behavioral consistency, behavior in the past is a good predictor of future behaviors, such as an individual attitude will be consistent with his behavior. In our context, the attitude towards the involvement of non-family parties in the scenarios is expected to be correlated with respondents' behavior in the reality: if respondents in the past have involved non-family parties in their governance structures, their attitude towards the involvement of non-family parties in the scenarios should be stronger.

The first stage regressions confirm our expectations (table 1). As the instruments are extracted by the scenarios, which represent fictitious firms, it seems plausible that the instruments are not correlated with the error term of equation (1). This idea is positively reinforced by the fact that we control for education and socio-emotional attachment, which, otherwise, would be correlated not only to performance, but also to the likelihood of involving non-family parties

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in managerial and governance structures, and, consequently, to the instruments. We also control for sectors, as we want to ascribe the effect on performance to family managerial and governance structures and not to sectorial differentials.

4. RESULTS.

Table 1 reports the results of the first stage regression. Model (1) supports that the propensity to involve non-family shareholders in the scenarios is strongly correlated to real ownership structures, supporting the validity of *OOWN* as an instrument for *family_ownership*. Model (2) confirms that the propensity to involve non-family directors in the scenarios is strongly correlated to real board of directors' composition. First stage regressions confirm that when family firms involve non-family parties as shareholders or as directors in their real governance structures, they are more likely to involve non-family parties also in the scenarios. These results corroborate our assumption that exists behavioral consistency between real governance decisions and governance decisions in a controlled and constructed context, like the scenarios. These data also positively validate the external validity of the experimental scenarios, confirming that the results collected through scenarios reproduce real decision-making about governance structures.

Table 2 shows the impacts of a family governance structure on performances. We compare OLS and IV analysis. Overall, OLS underestimates the effects of a family governance on performances.

Financial performance benefits from an ownership under total family control. In fact, return on assets and return on sales significantly increases, respectively by +9.72 and +8.82, compared to an ownership which comprises also non-family shareholders. Having a board of directors totally under family control has no effect on financial performances. This result likely suggests that the contribute of non-family directors is not strictly directed to the achievement of financial

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returns. In fact, non-family directors play a key role for what concerns the achievement of operational returns, i.e. turnover and employee. The results show that when the board of directors is totally under family control, both turnover and employees significantly decrease (respectively by -0.672 and -0.829). Our interpretation is that the contribution of non-family directors to a family governance is to balance economic and non-economic objectives, restricting the use of business resources for family demands, and permitting to redirect resources to strategies that value growth.

Table 1. First stage regressions.

VARIABLES	(1) Family_board	(2) Family_ownership
OBOD	-0.102***	-0.0165
	(0.0168)	(0.0129)
OOWN	-0.0102	-0.0606***
	(0.0196)	(0.0151)
Educ	-0.0468	-0.0158
	(0.0364)	(0.0277)
Sew	0.0751**	0.0527**
	(0.0328)	(0.0251)
Firm_age	0.00105	-0.000274
	(0.00144)	(0.00111)
Constant	0.738**	0.993***
	(0.351)	(0.275)
Observations	379	402
R-squared	0.264	0.144
Geographic area	YES	YES
Family generation	YES	YES
Sector	YES	YES

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Table 2. Returns to a family governance (OLS vs IV comparison).

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Return on assets		Profit margin		Log_turnover		Log_employee	
VARIABLES	OLS	IV	OLS	IV	OLS	IV	OLS	IV
Family_board	0.899	-2.297	1.671*	1.286	-0.187**	-0.712**	-0.319**	-0.936**
	(0.888)	(3.203)	(0.872)	(2.960)	(0.0934)	(0.349)	(0.124)	(0.463)
Family_ownership	1.390	10.24**	1.101	7.517*	-0.0373	0.370	0.210	0.638
	(1.175)	(4.729)	(1.149)	(4.399)	(0.119)	(0.567)	(0.159)	(0.748)
Educ	0.730	0.584	0.658	0.675	-0.0268	-0.0585	0.0343	-0.00851
	(0.613)	(0.706)	(0.605)	(0.669)	(0.0626)	(0.0692)	(0.0837)	(0.0923)
Sew	1.330**	0.879	0.976*	0.512	0.0228	0.0455	0.0646	0.101
	(0.542)	(0.666)	(0.536)	(0.626)	(0.0559)	(0.0687)	(0.0747)	(0.0937)
Firm_age	-0.0166	-0.00438	-0.0134	-0.00586	0.00737***	0.00788***	0.0144***	0.0147***
	(0.0233)	(0.0268)	(0.0229)	(0.0252)	(0.00248)	(0.00263)	(0.00332)	(0.00347)
Constant	-0.598	-4.875	1.511	-2.143	10.57***	10.46***	4.484***	4.389***
	(5.355)	(6.377)	(5.260)	(5.971)	(0.594)	(0.709)	(0.773)	(0.893)
Observations	293	293	291	291	378	378	355	355
R-squared	0.191		0.223	0.121	0.172	0.085	0.386	0.333
Geographic area	YES	YES	YES	YES	YES	YES	YES	YES
Family generation	YES	YES	YES	YES	YES	YES	YES	YES
Sector	YES	YES	YES	YES	YES	YES	YES	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

4.1 Robustness check.

We use instrumental variables extracted from the scenarios to instrument real managerial and governance structures. However, the propensity to involve non-family parties could be driven not only by the described scenarios, but also by what family firms experienced in the past. In fact, firms that experienced a radical performance shock may be less, or more, prone to involve non-family parties in their managerial and governance structures. We need to exclude that nothing but scenario-based considerations drive managerial and governance decisions, and controlling for socio-emotional attachment and education may not be sufficient.

For this reason, we decide to regress past performances on the instruments, to ascertain that the instrument is exogenous to past performances. Given that the main effect is significant on profit margin (ros), roa and log_turnover, we verify that for these performance measures the instrument is exogenous. We cannot verify for log_employees because our data do nor report complete employees statistics for years from 2014 to 2016.

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We generate lagged performance variables, at time t-1 and t-2, and regress them on the instruments:

OBOD or OOWN = $\alpha + \beta_1\, ros_t + \beta_2\, ros_{t-1} + \beta_3\, ros_{t-2} + educ + sew + \varepsilon$ (5)

OBOD or OOWN = $\alpha + \beta_1\, roa_t + \beta_2\, roa_{t-1} + \beta_3\, roa_{t-2} + educ + sew + \varepsilon$ (6)

OBOD or OOWN = $\alpha + \beta_1 \log_\text{turnover}_t + \beta_2 \log_\text{turnover}_{t-1} + \beta_3 \log_\text{turnover}_{t-2} + educ + sew + \varepsilon$ (7)

In case the instrument is endogenous to past performances, we should find a significant beta. However, all betas are insignificant, meaning that the instrument is not affected by past performances (table 3a, 3b and 3c). As such we can confirm the validity of the instrument in explaining the causal nexus between a family corporate governance and performances.

Tables 3a. Impact of (lagged) profit margin (return on sales) on instrumental variables.

VARIABLES	(1) OBOD	(2) OOWN
ros	-0.00224	-0.00990
	(0.0214)	(0.0193)
lag_ros_t-1	-0.0295	-0.0395
	(0.0351)	(0.0316)
lag_ros_t-2	-0.00524	0.0113
	(0.0292)	(0.0263)
educ	0.227*	0.165
	(0.122)	(0.110)
sew_overall	-0.103	-0.240**
	(0.112)	(0.101)
Constant	3.094***	3.572***
	(0.664)	(0.599)
Observations	305	305
R-squared	0.110	0.124
Sector	YES	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

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Tables 3b. Impact of (lagged) return on asset on instrumental variables.

VARIABLES	(1) OBOD	(2) OOWN
roa	0.00426	-0.0133
	(0.0192)	(0.0171)
lag1_roa	-0.0211	-0.0280
	(0.0318)	(0.0284)
lag2_roa	-0.00943	-0.00262
	(0.0209)	(0.0186)
educ	0.229*	0.157
	(0.122)	(0.109)
sew_overall	-0.101	-0.248**
	(0.112)	(0.0998)
Constant	3.092***	3.575***
	(0.657)	(0.586)
Observations	309	309
R-squared	0.101	0.127
Sector	YES	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

Tables 3c. Impact of (lagged) log_turnover on instrumental variables.

VARIABLES	(1) OBOD	(2) OOWN
log_turnover	-0.00109	-0.345
	(0.372)	(0.328)
lag_logturnover_t-1	0.619	0.460
	(0.497)	(0.437)
lag_logturnover_t-2	-0.437	-0.0820
	(0.402)	(0.353)
educ	0.272**	0.142
	(0.110)	(0.0969)
sew_overall	-0.184*	-0.326***
	(0.0995)	(0.0875)
Constant	0.776	3.096***
	(1.212)	(1.066)
Observations	380	380
R-squared	0.112	0.107
Sector	YES	YES

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

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5. DISCUSSION AND CONCLUSION.

The role of the family is central to goals' definition in family firms. We focused our analysis on two governance structures, namely the composition of ownership, and the composition of the board of directors, and compare the implication at performance level of family involvement in these governance structures. The comparison is across private family firms, and takes into consideration also family decision-makers' socio-emotional attachment and educational level.

Socio-emotional attachment and educational level do not appear to affect directly performance. However chapter 1 of this dissertation demonstrates a direct effect of socio-emotional attachment and education over the decisions to involve non-family shareholders and non-family directors. Specifically, higher values of education are associated to greater propensity towards the involvement of non-family directors, whereas high levels of socio-emotional attachment are associated to lower propensity to involve non-family shareholders. These considerations are essential because if a direct effect between governance structures and performance is in place, then it is important to understand how to modify governance structures to achieve the desired effects on performance.

Greater family concentration in ownership's structures is associated to improved financial performance. This is in line with previous contributions (i.e. Che & Langli, 2015; Mazzola et al., 2013). Yet, our results benefit from the inclusion of socio-emotional attachment and education, and from the identification of the causal nexus between family ownership and financial performance through instrumental variables. Most families involved in a family business have an important part of their personal financial capital invested in the business. As such, their lifestyle is directly related to the survival of the family business. It is then logical to expect families to be extremely concerned about the achievement and maintenance of satisfactory financial performance (Carney, 2005). Moreover, family shareholders have a

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double-bind connection with the family business, which is not exclusively based on financial ties, but also on socio-emotional ones. As socio-emotional attachment does not affect directly performance, but only indirectly through the composition of the ownership structure, its role is central to understand a set of behaviors which may explain our findings. When socio-emotional attachment to the family firms is high, family members aim at perpetuating family values and at preserving family priorities (i.e. financial support; transfer of the family business to the next generation; protection of the family name), and implement actions to ensure the long-term survival of the organization. Hence, we expect controlling families to be more attentive to financial performance of the family business, and to be strongly incentivized to achieve and preserve efficiencies, and also to be parsimonious in how they use their financial capital (Gedajlovic et al., 2004).

However, the same attention is not granted to the achievement of growth objectives. In fact, our data do not find any significant effect of a family ownership over measures of operational performance, suggesting that family shareholders are mainly concerned with the achievement of financial returns.

Still, greater attention to growth is guaranteed when non-family directors have a role in the board of directors. In fact, our data find that board of directors entirely under family control are associated to smaller firms' size. This aspect is less explored in the literature on private family firms. However, there is general agreement on how a lack, or limited presence, of independent directors, represents among the main reasons why board of directors fail to accomplish their monitoring role (Finkelstein & Hambrick, 1996). Under these premises, the likelihood of decisions and behaviors that prioritize family needs over business needs is more likely (Le Breton-Miller & Miller, 2009); for this reason, the presence of non-family directors is necessary to balance economic and non-economic goals, and to reduce the likelihood of particularistic

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family behaviors. Yet, there could be a second relevant aspect that would help to understand why boards with non-family directors are associated to greater size. In fact, among the reasons why family firms involve non-family directors is their skills and experience, when they are not present within the family members (Miller, Minichilli & Corbetta, 2013). These competences can be very valuable for family firms, which are overall characterized by lower managerial skills (Schulze et al., 2001; Lansberg, 1999). In fact, complex strategies of growth, like M&A and internationalization of the business, are strongly correlated to managerial skills. Then, the presence of non-family directors in the board of family firms is useful to supplement the family with their competences, and to increase the likelihood of implementing complex strategies aimed at business growth, that, in return, affect positively firms' size.

Family preferences and lack of specific competences are then, indirectly, drivers of family firms' performance. However, where particularistic priorities are satisfied with the achievement of superior financial returns, the competence gap represents a limit to the growth of family firms. When operational performance represent a priority, it is then necessary to intervene on the education level of family firms, as it increases the propensity towards the involvement of non-family directors, which, in turn, positively affects family firms' size.

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6. APPENDIX

Appendix 1. Descriptive statistics for financial performance measures.

Variable	Obs (population)	Mean	Std. Dev.	Obs (sample)	Mean	Std.Dev.
roa	6720	5.52	14.88	322	6.15	6.82
roe	6593	11.01	19.27	319	10.00	16.19
roi	5963	8.93	8.53	300	8.69	8.18
ros	6601	4.66	6.57	320	5.26	6.74

Appendix 2. Descriptive statistics by scenario.

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	assigned_scenario 1		assigned_scenario 2		assigned_scenario 3		assigned_scenario 4
VARIABLES	mean	sd	mean	sd	mean	sd	mean
turnover_last_available_year	113,859	363,320	111,727	350,811	113,739	205,201	147,894
ROA	5.317	7.010	5.847	7.468	5.978	9.201	5.690
ROI	7.744	9.674	8.332	7.367	8.071	9.374	8.262
ROS	4.496	5.700	4.482	6.195	4.595	6.236	4.546
ROE	7.832	18.06	7.932	19.71	10.83	16.34	7.332
OCDA	3.235	1.497	2.897	1.487	3.258	1.451	3.163
ODG	3.324	1.349	3.078	1.402	3.791	1.298	3.741
OAD	2.934	1.492	2.456	1.422	3.393	1.463	2.849
OOWN	2.360	1.337	2.235	1.311	2.509	1.244	2.572
educ	2.841	0.790	2.777	0.819	3	0.739	2.836
sew_overall	3.447	0.776	3.433	0.854	3.174	0.776	3.290
d_educ	0.667	0.473	0.619	0.487	0.765	0.425	0.715
d_sew	0.605	0.492	0.553	0.499	0.439	0.499	0.528
generation== 1.0000	0.240	0.430	0.289	0.455	0.159	0.367	0.213
generation== 2.0000	0.427	0.498	0.376	0.486	0.512	0.503	0.393
generation== 3.0000	0.200	0.403	0.242	0.430	0.244	0.432	0.281
generation== 4.0000	0.133	0.342	0.0940	0.293	0.0854	0.281	0.112
az_chiusa_strict	0.147	0.356	0.100	0.301	0.0366	0.189	0.124
az_chiusa	0.440	0.500	0.407	0.493	0.329	0.473	0.416

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CHAPTER 3

Correction mechanisms in family firms: the impact of ex-ante and ex-post knowledge search on corporate governance.

Abstract

Owners' identity influences the definition of goals in organizations. Corporate governance structures and practices are put in place to achieve alignment between organizational goals and managerial actions, where goals refer to both economic and non-economic goals. The alignment between goals and corporate governance should enhance the likelihood of achieving desired outcomes.

This theoretical essay aims at disentangling the role that knowledge plays on the definition of corporate governance, in private and highly concentrated firms. These ownership structures, typical of family firms, are characterized by a strong preference for non-economic goals over economic goals.

Categorizing knowledge as either exogenous or endogenous, it is possible to identify two different mechanisms that influence the definition of goals and resulting corporate governance in family firms. The first is an ex-post correction mechanism, that results from endogenous knowledge searched as a result of unsatisfactory economic performances. In this context, endogenous knowledge modifies the prioritization of non-economic goals over economic ones, favoring the implementation of corporate governance mechanisms that privilege the achievement of economic goals. The second one is an ex-ante correction mechanism. In this scenario, it is proposed that exposure to exogenous knowledge affects the prioritization of goals, depending on how strongly owners are attached to the achievement of non-economic goals. If prioritization of economic goals over non-economic goals takes place, then corporate governance is improved. Some contextual factors, in example size and development stage, moderate the mechanism.

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1. INTRODUCTION.

Organizational ownership plays a key role in the definition of corporate governance and in the achievement of economic performance (e.g. Shleifer and Vishny, 1997; Short, 1994). The relationship, however, can be understood only considering another element, the owners' identity (Thomsen and Pedersen,2000). In fact, owners represent a very heterogeneous category of decision-makers: institutional investors, governments, families, and banks, just to cite some examples. These ownership types widely differ in terms of corporate governance and of economic performances. Indeed, ownership is able to impose organizational goals, and it is likely to expect that different ownership identities are characterized by different goals' priorities. Broadly speaking, government entities are mainly owned by the State and are mainly concerned with the achievement of social, political and moral goals, whereas economic goals are less important. Private firms are characterized by a heterogeneous set of goals (Singla et al., 2014). Firms owned by institutional investors, in example, are mainly focused on the achievement of economic goals, mostly measurable goals that benefit all shareholders, like increasing shareholder value, and implement corporate governance mechanisms, like independent board of directors, that enhance the achievement of economic goals.

Family ownership represents, on the other side, a very peculiar ownership identity. In family firms, the predominant stakeholder is the family itself, leading to an overlap between family and business. The consequence of this overlay is an unusual definition of organizational goals, where both economic and non-economic goals are important. Non-economic goals, otherwise called socio-emotional goals, refer to the satisfaction of socio-emotional outcomes, defined as "non-financial aspects of the firm that meet the family's affective needs, such as identity, the

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ability to exercise family influence, and the perpetuation of the family dynasty” (Gomez-Mejia, 2007:106).

This double goal’s structure typical of family firms results in the implementation of heterogeneous corporate governance, spanning from highly efficient corporate governance mechanisms to inadequate ones.

The relationship between corporate governance and economic outcomes has been widely studied in the literature (e.g. David et al., 1998). A superior corporate governance is a documented and accepted way to realize economic goals. Indeed, the respect of corporate governance principles facilitates managerial control and enhances the alignment between decision-makers and organizational goals, resulting in strategic actions in line with the objectives of the organization. In corporations owned by institutional ownership, the main goals are economic goals, so it makes sense, to them, the implementation of a superior corporate governance. On the other side, when owners’ value both economic and non-economic goals, the identification, and subsequent implementation, of a corporate governance that matches these mixed goals is not straightforward.

This study relies on the assumption that when a prioritization of economic goals over non-economic goals is clearly stated, a superior corporate governance is the most straightforward mechanism to achieve economic objectives. Nevertheless, when an owners’ identity prioritizes both economic and non-economic goals, as it is in family firms, corporate governance cannot be easily predicted as a result of the ownership structure. Family firms grant prominent importance to non-economic goals. As a result, they are sometimes characterized by a corporate governance that consents suboptimal decision process of economic utility maximization. This typology of corporate governance is here defined as weak. Moreover, the literature on family firms recognizes that socio-emotional goals and outcomes are of many forms, and are not

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necessarily uniform across the entire population of family firms. In example, some family firms are more attached to the goal of perpetuating the family business over family generations, whereas others are more prone to maintain the goal of family identification with the family business. What is, then, the role that ownership identity plays in the definition of organizational priorities and of corporate governance? This essay proposes that owners' attachment to non-economic goal is a key element in the definition of corporate governance and resulting organizational outcomes.

This arises an important question. What are the consequences of such decisions in the long-run? Evidence supports that the persistent prioritization of non-economic goals over economic-goals results in lower shareholders' value. In example, nepotism, a diffused behavior in family firms, impacts negatively both on the capacity of attracting, and keeping, talented managers and on the overall level of organizational performance. Nevertheless, the decision to appoint family members in managerial positions, represents a viable way through which family firms realize their non-economic goals.

Two considerations follow. The first one is that the satisfaction of socio-emotional outcomes is feasible only until a family business exists. The survival of the organization is then key to the achievement of non-economic goals, where a superior corporate governance is positively related to survival rates. The second consideration is that negative economic performances, or below aspirations performances, activate a correction mechanism which induces family firms prioritize economic goals over non-economic goals, and to search for corrective measures.

The literature has mainly focused on this correction mechanism, ignoring the role that other factors exercise on the prioritization of economic goals over non-economic goals. In this study, it is proposed that knowledge, meant as greater awareness about the benefits of a superior corporate governance, plays a key role in the activation of correction mechanisms, fostering the

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prioritization of economic goals over non-economic goals, even when economic feedbacks are not below expectations.

In addition, family firms' scholars recognize that socio-emotional goals and outcomes vary over time. This variation is the result of organizational factors, in example performance, increasing size and complexity, and of family-related factors, in example, early generations involved in the family business. As a consequence, it is likely to expect that as the strength of non-economic goals vary over time, so will the prioritization of organizational goals, potentially leading to a prioritization of economic goals, or, at least, to a balance between economic and non-economic goals.

In reality, even when family firms possess knowledge, the correction mechanism does not necessarily take place. Indeed, it is necessary to recognize that even among family firms there is wide heterogeneity in term of how strongly owners are attached to non-economic goals, and that this variability affects the prioritization of economic goals over non-economic goals. Owners that value strongly non-economic goals are defined as preference-driven, whereas knowledge-driven owners are all those subjects that, once exposed to knowledge, prioritize economic goals over non-economic goals.

This theoretical essays aims at contributing to the literature on family firms, corporate governance and organizational theory. Indeed, the theory on family firms limits its attention to the consequences that negative performances exercise on the prioritization of economic goals over non-economic goals. In this essay, the model is further expanded, and permits to predict the development of corporate governance as a result of the prioritization of economic goals over non-economic goals. Moreover, the model proposes a new mechanism, not yet included in the literature on family firms and corporate governance, that moderates the influence of non-economic goals on the definition of corporate governance, namely, knowledge. Finally, the

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model considers for heterogeneity in terms of non-economic goals' attachment across family firms, permitting to distinguish two scenarios: one, in which family firms are strongly attached to non-economic goals, and do not act on organizational goals priorities even when exposed to knowledge; the other, where the attachment to non-economic goals is less powerful and permits to activate a correction process of reprioritization of organizational goals.

The essay is organized in the following way: in the first chapter, an overview of the theoretical model is proposed, together with a definition of the main terms used in the essay. Next, an in-depth analysis of the model is detailed, and theoretical propositions are offered, to conclude with some limitations and recommendations for future research.

2. A KNOWLEDGE-BASED MODEL OF CORPORATE GOVERNANCE.

This chapter provides an overview of the theoretical model. The model is represented in figure 1.

The key idea of the theoretical model is that family ownership prioritizes non-economic goals over economic goals, unless some correction mechanisms take place. Two correction mechanisms modify the prioritization of goals in family firms, increasing the likelihood of modifying corporate governance, in order to align the new goal priorities to corporate governance mechanisms.

The first mechanism has been broadly explored in the literature, and it refers to the influence that below expectations economic performances exercise on the definition of organizational goals. In these contexts, family firms are expected to prioritize economic goals over non-economic goals. When economic performances are below expectations, socio-emotional outcomes are at stake. As a result, a search process takes place to restore an organizational situation sustainable in the long-run. Given that a superior corporate governance enhances the

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achievement of economic goals, under these circumstances family firms may end up strengthening their corporate governance. This is here defined as ex-post correction mechanism, and deals with endogenous knowledge, given that it is a reaction to past performances.

The second mechanism refers to an exogenous exposure to knowledge. It is likely to expect that an exposure to exogenous knowledge activates ex-ante correction mechanisms. Family firms are not always aware of the consequences that their mixed structure of economic and non-economic goals exercise on the achievement of long-term economic, and non-economic, objectives. Indeed, a negative relationship exists between the attachment to non-economic goals attachment and survival rates, where the satisfaction of non-economic goals is dependent on the survival of the organization.

An exogenous exposure to such knowledge is likely to increase the awareness of their particularistic situation, activating a search process that affects the prioritization of non-economic goals over economic goals, before economic outcomes deteriorate as a result of the prioritization of non-economic goals over economic ones. As a result, exogenous knowledge activates the implementation of a corporate governance in line with the achievement of economic goals, namely a superior corporate governance.

In the literature, the adjustment of goals' prioritization takes place every time performances are below expectations. The model presented in this essay expands the theory proposing that the prioritization of economic goals in family firms is negatively associated to the implementation of superior corporate governance mechanisms.

The second mechanism, on the other side, is not always activated. Indeed, when family firms are exposed to exogenous knowledge they decide whether on not to prioritize economic goals

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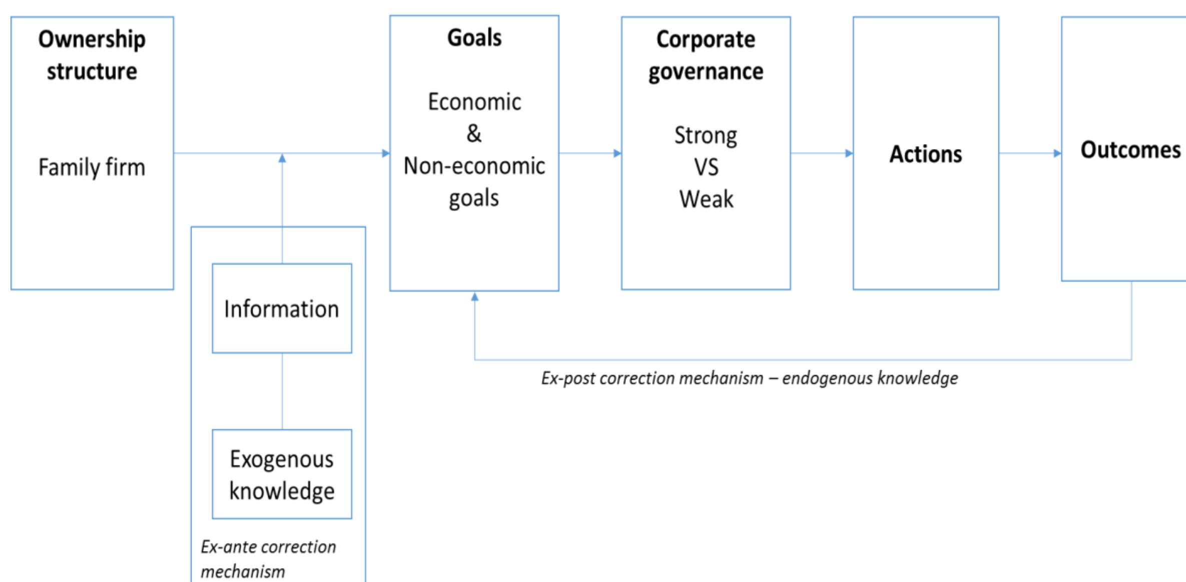
over non-economic goals, depending on how strongly family ownership values non-economic goals.

Figure 1.



Knowledge and information are central to the analysis of performance heterogeneity across firms (Argyres et al., 2012; Bertrand and Schoar, 2003), and authors like Holmstron and Roberts (1998) identify them as influential factors in corporate governance design. Specifically, Argyres et al. (2012) address the theme of capability governance, where managers and entrepreneurs need knowledge to make decisions on how to implement effective governance practices. In this framework, agents are motivated through rewards, whose definition depends on the principals' capacity to identify aspirational goals. The same reasoning can be applied to the concept of "contract design capability" (Mayer and Argyres, 2004). In this context, the achievement of the desired goals is dependent on the ability to design the right contract. Given that it is extremely difficult to write contracts that include all relevant elements of employee behavior and desired goals (Osterloh and Frey, 2000), dysfunctional decision-makers behavior

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results. The knowledge held by those who have control over decision rights, namely the owners, influences decision-makers' behavior.

2.1 Definition of main terminologies.

Knowledge refers to being aware that it is possible to improve on performance (Gibbons and Henderson, 2012). We divide knowledge into exogenous and endogenous knowledge. Endogenous knowledge is when the organization becomes aware of the possibility to improve on performance as a result of unsatisfactory performances. Exogenous knowledge is when the awareness derives from an exogenous exposure to knowledge. For the purpose of this essay, knowledge refers to two main elements: the awareness of the impact of non-economic goals' prioritization over long-term economic, and non-economic, outcomes; and the awareness of the positive relationship between superior corporate governance and the achievement of economic goals.

Ex-post correction mechanisms refer to the actions undertaken by decision-makers as a result of the achieved outcomes. Specifically, when these outcomes are not satisfactory, decision-makers activate a search process to identify new knowledge.

Ex-ante correction mechanisms refer to the actions undertaken by decision-makers as a result of the exposure to exogenous knowledge. Information is here defined as a second search step: once decision-makers are provided with knowledge, they decide to search new elements in order to support and implement decisions. Family firms driven mainly by socio-emotional goals, decide, on purpose, not to proceed to the second search step, and to maintain their actual goals prioritization. The search process is, then, either inconclusive, in case of family firms strongly attached to non-economic goals, or results in a prioritization of economic over non-

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economic goals. In the second scenario, family firms will proceed in searching for specific information on how to improve their situation. This scenario is described in figure 2.

Corporate governance provides a structure through which organizational objectives are set, and also a mean to achieve these objectives and to monitor performance. It is possible to distinguish between superior and weak corporate governance. Superior corporate governance is defined as the set of corporate governance best practices that respect the principles and guidelines stated in corporate governance codes. Examples of superior corporate governance's elements are: independent board of directors; disclosure and transparency of information; protection of minority shareholders; alignment mechanisms of key executive and board remuneration with the long term interests of the company and its shareholders; directors placing priority on the objective of creating value for the shareholders over a medium-long term period (e.g. Hermalin and Weisbach, 1998; Bhagat and Bolton, 2008; Gompers et al., 2003).

Weak corporate governance is defined as a corporate governance where these elements are not, overall, present.

Corporate governance affects the breadth of actions' options in organization. Based on Bertrand and Schoar (2003), weak corporate governance permits the imposition of the decision-makers skills, risk and other individual preferences, potentially causing the adoption of inefficient strategies. In case of superior corporate governance, organizations have the capability to select the best firm-manager match to achieve desired goals and enhance corporate performances. In this scenario, the idiosyncratic characteristics of the decision-makers do not impact, necessarily, negatively on corporate strategies and actions as far as corporate structures, like the board of directors, are able to select properly the best candidates and perform their tasks (i.e. monitoring).

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Outcomes refer to the goals accomplished by the organization, as a result of its implemented corporate governance. Outcomes can be divided into economic and non-economic outcomes, where economic outcomes refer to the achievement of economic goals, and non-economic outcomes refer to the achievement of non-economic goals.

The following paragraphs propose a literature review of the main elements of the model and derived theoretical propositions.

3. OWNERSHIP AND GOALS' HETEROGENEITY: A NECESSARY STEP TO UNDERSTAND THE SET UP OF GOVERNANCE IN ORGANIZATIONS.

David et al. (1998) recur to the heterogeneous category of institutional investors to state that ownership by itself is not able to affect the choice of corporate governance. They exemplify that banks, public and private pension funds, and insurance companies, are characterized by diverse inclination to set up corporate governance structures and procedures, because their organizational goals differ. This idea is further developed by Singla et al. (2014): the authors claim that family ownership is not sufficient to predict corporate governance, and that the relationship is moderated by the involvement of family shareholders in management position. Indeed, the active involvement of family shareholders, from now on called family managers, in family firms influences the definition of organizational goals, resulting in ownership structures that prioritize non-economic goals over economic goals. Whenever organizational goals deviate from the goal of profit maximization, family managers are less willing to implement a superior corporate governance that prevents the achievement of non-economic goals.

Family firms are characterized by a heterogeneous category of socio-emotional goals (for a review, see Berrone et al., 2012) that significantly affects corporate governance structures' choices. In example, Leitterstoft and Rau (2014) claim that given the non-economic goal of preserving family control and influence over the family business, family firms are willing to

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underprice shares' value during IPO. The authors state that given that underpriced shares exercise lower attractiveness to the market, the IPO will not compromise the ability of family shareholders to maintain control. This exemplifies the willingness of family firms to trade economic outcomes with non-economic outcomes, as a consequence of their peculiar goals' definition and prioritization. Moreover, it confirms that the combination of owners' identity and goals have an impact over corporate governance. In fact, the consequences of the prioritization of non-economic goals over economic goals result in the maintenance of a concentrated familial ownership structure.

4. THE IMPACT OF GOVERNANCE ON ACTIONS AND OUTCOMES.

This study relies on the assumption that a superior corporate governance affects positively corporate value. The impact a supeior corporate governance exercises is not limited to the implementation of corporate structures, like, in example, an independent board of directors, but is extended to the implementation, and compliance with, of governance practices, like, in example, the disclosure of documents and of information in general.

A brief literature is presented to validate it. Gompers et al. (2001) state that a superior corporate governance affects positively firm value, profits and sales growth. Specifically, Gu and Hackbarth (2013) demonstrate the importance of accounting transparency in affecting both firm value and operating performances, whereas Zaman et al. (2014) underline the importance of voluntary disclosure as a mechanism to enhance corporate performance. Classens et al. (2002) claim that superior corporate frameworks affect positively the access to financing, and negatively the cost of capital.

A superior corporate governance enhances the implementation of governance practices (Sarkar and Sarkar, 2000), the achievement of business value and the creation of control systems that

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are consistent with economic goals. Said differently, corporate governance is considered a mean to ensure that decision-makers concentrate on firm's value maximization (Shleifer and Vishny, 1997). A superior corporate governance permits the alignment between goals and actions, resulting in the achievement of economic outcomes. This literature stream has narrowly focused on large, public organizations, where goals are broadly shared among shareholders, and can be strictly defined as concerned with profit maximization. In this typology of organizations, superior corporate structures are implemented to achieve organizational goals, namely economic goals, in order to increase shareholders' value.

This literature omits what would be the outcome of a mixed definition of organizational goals on corporate governance. Indeed, in private family firms the coexistence of economic and non-economic goals creates conflicts in the definition of corporate structures. The literature on family firms has addressed broadly the problematic consequences of favoring non-economic goals over economic goals in the long-term. Here follow some examples. Family firms are prone to maintain control and influence over the business through family ownership, compromising their ability to access capital markets (Kets de Vries, 1994). This limitation may potentially bound the growth of family firms. Nevertheless, given that family shareholders may perceive external sources of capital as potentially interfering with their non-economic goals definition, family decision-makers may favor to pursue non-economic goals rather than economic goals, maintaining governance mechanisms that do not focus on the achievement of economic goals. Gomez-Mejia et al. (2007) provide another example of the influence of socio-emotional goals on corporate governance structures and, in the end, on firm performances. In their influential paper, the authors demonstrate that given that family firms prioritize non-economic goals over economic goals, they willingly refuse to improve on their governance structures. Another remarkable consequence on corporate governance structures of the

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prioritization of socio-emotional goals over economic goals can be found in an explicit preference of family firms for informal mechanisms of control (e.g. Cruz et al., 2010), that result in ineffective control mechanisms (Schulze et al., 2001), that are more likely to permit the achievement of non-economic goals.

Overall, the literature on family business recurrently refers to the relevance of socio-emotional goals to explain the reluctance of family firms to set up superior corporate governance structures. This preference holds even when family decision-makers face decisions that from an economic point of view would increase corporate value. Indeed, family firms are sometimes aware of the economic benefits that derive from a change of their corporate governance mechanisms. Still, they may prefer not to act on the basis of economic outcomes.

Nevertheless, it is possible to identify a situation where even family firms reprioritize their goals. This is when family firms perceive the socio-emotional outcomes they derive from the family business at stake. In this situation, family firms prioritize economic goals over non-economic goals (e.g. Patel and Chrisman, 2014; Wiseman and Gomez-Mejia, 1998).

5. THE IMPACT OF OUTCOMES ON THE DEFINITION OF GOALS AND RESULTING CORPORATE GOVERNANCE (ex-post correction mechanisms).

Under certain conditions, the prioritization of non-economic over economic goals in family takes place. Wiseman and Gomez-Mejia (1998) posit that actors are loss averse and their behaviors depend on the framing of the decision context. Specifically, the theory predicts that when decisions are framed positively, the likelihood of taking high-risk decisions is lower compared to negatively framed scenarios. An important contribution is, then, that risk bearing is influenced not only by how the compensation mechanisms are designed, that is, by effective governance structures, but also by how the decision-makers expect their outcomes to change

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because of business performances. In their seminal paper, Wiseman and Gomez-Mejia (1998) propose an initial analysis of the influence of non-economic outcomes on decision-making. The authors posit that non-economic outcomes are preferred to economic outcomes in positively framed situations, whereas the opposite is true in negatively framed situations, introducing aspirational performances as an important moderator of the prioritization of non-economic goals over economic goals.

In their influential paper, Gomez-Mejia et al. (2007) apply this framework to family firms. Specifically, they claim that the most valued outcomes in family firms are socio-emotional outcomes, that act as a powerful reference points in decision-making. Indeed, family firms are willing to take up more risk, in term of economic outcomes, in order to protect and guarantee the achievement of socio-emotional outcomes. A common way to achieve these goals in the short-term, is through corporate governance structures controlled and managed by family members. In fact, weak corporate governances in family firms are recurrently associated to a strong preference for non-economic goals over economic goals. The consequences of weak governance are that governance structures will not be able to monitor and align the actions of decision-makers with stakeholders' goals, resulting in the imposition of the decision-makers risk, experience, and preferences, that in the long-run result in inefficient actions and outcomes.

It is here proposed that, assuming ex-post correction mechanisms are able to correct the prioritization of non-economic goals over economic goals, endogenous knowledge fosters the implementation of superior corporate structures and processes.

The key element that activates the prioritization of economic goals over non-economic goals is aspirational performance, activating a process of organizational learning (Blettner et al., 2015). Indeed, as a result of below expectations performances, family firms put in place some correction mechanisms. Following the work of Greve (2013), when current actions are

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associated with unsuccessful outcomes, in this case, unsuccessful economic outcomes, organizations engage in a search process, in order to identify a solution to their unsatisfactory results. This search process may provide the firm with endogenous knowledge, that is, knowledge that is explored in reaction to unsatisfactory results. A powerful search strategy is imitation of practices adopted by others, predominantly by successful implementers of practices. Greve (2013) explain the rational behind this imitation strategies, assuming that imitators infer that successful implementers made use of information to evaluate the quality of available alternatives.

Given that in this context family firms are required to prioritize economic goals, the successful behavior family firms aim at observing, and replicating, is economic goal prioritization. As a result, a family firm facing unsatisfactory economic outcomes, compare itself to successful firms and would try to imitate some of the practices put in place by successful firms. Consequently, based on the assumption that superior corporate governance are related to economic goals' prioritization, the probability of family firms imitating firms characterized by efficient corporate governance is higher. As a result, the adoption of more efficient corporate governance increases when socio-emotional outcomes are at stake.

In addition, in front of severe problems, like unsatisfactory economic outcomes, decision-makers become aware of the necessity to limit discretion (Klingebiel and De Meyer, 2013). Discretion is more freely applicable when socio-emotional goals are prioritized. In fact, socio-emotional goals are characterized by a great degree of heterogeneity among stakeholders, and consequently their prioritization over economic goals can be broadly discretionary. On the other side, economic goals, characterized by measurability and by a greater degree of shared agreement among stakeholders, are characterized by lower degree of discretion. Consequently, this secondary mechanism may further focus the attention of family firms toward economic

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goals. Given that a suitable mean to ensure the achievement of economic goals is a superior corporate governance, it is likely to expect that as a result of endogenous knowledge, family firms will modify their corporate governance. In fact, corporate governance is considered here as the mechanism through which goals are expressed. Superior corporate governance mechanisms are associated to an organization mainly focused on economic goals, whereas a weak corporate governance is more likely associated to an organization that prioritizes non-economic goals. The literature on family firms has investigated the relationship between below expectation performances and prioritization of economic goals over non-economic goals, without extending the analysis to the impact that the prioritization of economic goals exercises on corporate governance. As far as family firms are focalized on economic goals, superior corporate mechanisms represent a suitable way to achieve them. The exposure to endogenous knowledge, resulting from below expectations performances, is the factor that increases the likelihood of implementing changes to corporate governance. As below expectations performances prioritize economic goals over non-economic goals, the search process is focused on looking for solutions that sustain the prioritization of economic goals over time, like, in example, superior corporate governance structures and processes.

It is then proposed that:

Proposition 1. The search of endogenous knowledge, activated by a prioritization of economic goals over non-economic goals, increases the likelihood of implementing superior *corporate governance in family firms.*

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6. THE ROLE OF EXOGENOUS KNOWLEDGE ON THE DEFINITON OF GOALS (ex-ante correction mechanisms).

Dynamic complexity, knowledge factors, feedbacks over time, are some of the elements that characterize and influence the managerial decision-making process (Yim et al., 2004). Furthermore, individuals and organizations are affected by cognitive and motivational biases that affect their attention to information and to decisions (De Dreu et al., 2008; Ocasio, 2011). This is especially true when firms face complex decisions, because in these circumstances it is less likely that decision-makers will apply techno-economic principles (Hambrick and Mason, 1984). Even when complexity is high, as it is in case of strategic-related decision-making, clear and univocal organizational goals constrain the discretion range of the decision-maker, providing guidelines and standards for decision-makers (Montanari, 1978). The key question is then: what happen when organization set up both economic and non-economic goals that are, occasionally, conflicting in the long term and that, potentially, do not benefit all shareholders? Zahra and Filatotchev (2004) support knowledge-based and motivational-based arguments in their analysis of goal's misalignment among decision-makers. The authors recognize that the misalignment rises due to heterogeneity among actors in terms of both economic and non-economic goals, and that to effectively structure governance mechanisms, it is necessary to understand the motivational drivers of decision-makers, and their consequences on outcomes. In addition, the authors claim that decision-makers are characterized by knowledge constraints, such that they may not have the experience or knowledge to make things happen. Recently, Bloom et al. (2013) provided an empirical validation of the role that information and knowledge exercise on managerial decision-making. Specifically, they demonstrate that after providing the firms with a treatment aimed at increasing awareness of the existence and benefits of some organizational practices, the treated firms reported increased performances. The authors imply

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that decision-makers may ignore the existence and beneficial effects of certain managerial practices on performance.

Overall, it can be inferred that knowledge heterogeneity is a key element, together with motivation, in the definition of corporate governance mechanisms.

Can this explain the reluctance of family firms to implement superior corporate governance mechanisms? If yes, it would mean that family firms are not aware of the benefits derived from a superior corporate governance. It would then mean that either family firms somehow lag behind other firms in terms of knowledge or they show a preference for non-economic goals. Indeed, it is not necessarily true that family firms lag behind public firms, or other type of private firms, in term of knowledge. In fact, the prioritization of non-economic goals over economic goals can be made on a rational basis, grounded on the choice to satisfy socio-emotional goals. Different ownership structures are characterized by different goals, and as a result behave and act differently (Ramaswany et al. 2002; David et al., 1998). The decision-makers' main knowledge-based objective is the sustainment of profits recurring to knowledge (Nickerson and Zenger, 2004), where a key amount of knowledge derives from existing external knowledge. Family firms have a lower attitude to engage in external knowledge acquisition given that their socio-emotional goals drive them toward family control and management of the firm, and discard all those situations where their socio-emotional outcomes may be at risk.

The consequences of privileging non-economic goals over economic goals are not, at least in the short term, detrimental to firm value. The broad heterogeneity of socio-emotional goals result in family firms prioritizing different non-economic goals. Some of these socio-emotional goals do not exercise a negative influence on financial performance, and, if kept under control by a knowledgable family manager, aware of the long term impact of socio-emotional goals on firms' survival, are maintained over the long-term without serious impact on economic

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performance. Imagine, for example, the beneficial effect of the non-economic goal of identifying the family with the family business and of binding social ties. The likely implication is a durable investment in both reputation and relationships with main stakeholders, resulting in the creation of strong partnership, that, ultimately enhance financial performance (Cennamo et al., 2012; Berrone et al., 2010).

Nevertheless, overall the impact of socio-emotional goals on firm performance is detrimental in the long term. Consequently a better understanding of the problem, is required.

Gavetti and Levinthal (2000) differentiate between cognitive and experience-based choice. Experience is a process of choices' evaluation based on prior outcomes, and takes place especially as a result of negative outcomes. Decision-makers search for new knowledge as a consequence of negative outcomes. This is the mechanism describe in the previous chapter, where this type of knowledge acquisition is defined as endogenous. Endogenous knowledge search usually takes place at local level, and is characterized by incremental, slow, changes to existing practices (Gavetti and Rivkin, 2007).

On the other side, cognition is defined as a forward-looking form of search, based on actors' beliefs about the consequences of their actions on outcomes. The beliefs, and resulting organizational outcomes, are the result of decision-makers values and cognitive bases (Hambrick and Mason, 1984). The forward-looking search, is here defined as exogenous knowledge search, and is not driven by a prior outcome, but by some exogenous phenomena like, in example, business planning. This type of search permits the exploration of neighborhood search, but also of distant alternatives' evaluation. As suggested by Gavetti and Levinthal (2000) when firms engage in exogenous knowledge search, the likelihood of improving on their performance is greater and more immediate than in endogenous knowledge, because a more likely identification of the "best" alternative arises when firms engage in ex-

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ante knowledge search, as the alternatives' search is broader than in ex-post knowledge search processes.

Supposedly, an exogenous exposure to knowledge about the peculiar structure of economic and non-economic goals in family firms, activate the ex-ante search process of family firms, prioritizing economic goals over non-economic goals, and acting on corporate governance mechanisms before incurring in below expectations financial performances.

In fact, the search process would bring knowledge to family firms about the disadvantages faced by family firms when non-economic goals are prioritized over economic goals in the long-run and, specifically, that socio-emotional outcomes are at risk if economic outcomes are not sustainable in the long term. If decision-makers perceive as pertinent to their situation this piece of knowledge, they may then evaluate alternative solutions to this phenomenon. An immediate solution is prioritizing economic goals over non-economic goals. At this point, some decision-makers proceed and search for specific information on how to concretely improve on the situation. This decision is influenced by how much non-economic goals influence decision-making in family firms: when non-economic outcomes are considered very important for the organization, it is possible that decision-makers momentarily dismiss the problem until ex-post correction mechanisms do not take place. Others, those less influenced by the achievement of non-economic goals over economic goals, evaluate different alternatives and solutions. Based on the assumption that when economic goals are clearly prioritized, superior corporate governance mechanisms enhance the relationship between goals achievement and financial performances, family firms may decide to imitate some corporate governance mechanisms in place in (financially) successful firms.

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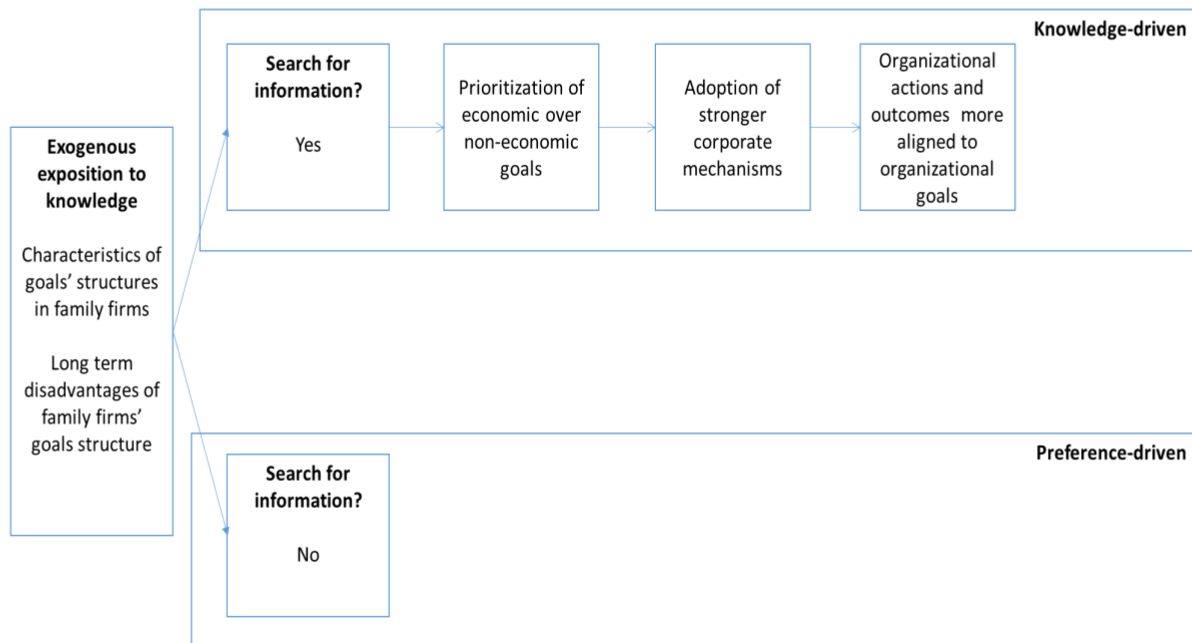
Expanding the model proposed in figure 1, and focusing the attention on the ex-ante correction mechanisms, figure 2 represents graphically the potential outcomes of an exposure to exogenous knowledge.

Figure 2.



As family firms can be driven by both economic and non-economic goals, the following propositions are then proposed:

Proposition 2. The exposure to exogenous knowledge affects the prioritization of goals in family firms.

Proposition 3. The likelihood of implementing a superior *corporate governance increases when a family firm modifies its goals, prioritizing economic goals over non-economic goals, and search for information to improve on them, as a result of an exposure to exogenous knowledge.*

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The key distinction is between family firms that when exposed to exogenous knowledge search for information and those family firms that even when exposed to exogenous knowledge do not implement a search process. This category of family firms is characterized by a strong attachment to socio-emotional goals and outcomes.

When family firms' economic goals prevail over non-economic goals as a result of exposure to exogenous knowledge, they are defined knowledge-driven firms. When family firms' non-economic goals prevail over economic goals even after the exposure to exogenous knowledge, they are defined preference-driven firms.

An important consideration is that in the long-term, both knowledge-driven and preference-driven firms potentially end up implementing the same corporate governance. What is different is how they achieved it. In case of knowledge-driven firms, the enhanced corporate governance mechanisms are the result of an ex-ante correction mechanisms, whereas for a preference-driven firm the resulting corporate governance mechanisms originates from ex-post correction mechanisms. Given that ex-post correction mechanisms take place because of below expectations performances, ceteris paribus, economic outcomes, in a given moment in time, for preference-driven firms are likely to be lower compared to a comparable knowledge-driven firm. Assuming this is what happen in reality, it is possible to provide an explanation to why the family firms' literature on the relationship between corporate governance and economic performances reports so many inconclusive results. Indeed, not taking into consideration the source of corporate governance change, namely either ex-ante or ex-post correction mechanisms, limits the understanding of the consequences of corporate governance on performances. In addition, given that ex-post correction mechanisms are characterized by local search and incremental changes, the prioritization of economic goals over non-economic goals

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and the consequential implementation of a superior corporate governance is slower compared to ex-ante correction mechanisms.

Proposition 4. The attainment of a positive relationship between superior corporate governance and the achievement of economic goals is slower in preference-driven firms than in knowledge-driven firms.

The distinction between knowledge-driven and preference-driven family firms is derived by the influence socio-emotional goals exercise on decision-making processes. Consequently, it is important to assess which elements may affect the strength of socio-emotional goals in family firms.

The literature on family firms report some key elements, namely organizational aspects (e.g. size), and family-related elements (e.g. family stage, family ownership, professional management).

Family stage is expected to be negatively related to socio-emotional outcomes, given that as the dispersion of ownership among family members increases, the identification and engagement with the family business decline (e.g. Gomez-Mejia et al., 2011). The impact of size on socio-emotional outcomes is inconsistent. In fact, scholars report both a positive and negative relationship between the two dimensions. Even so, the expectations in large firms are that the importance of socio-emotional goals is more limited than in small firms, because family welfare is guaranteed and the presence of professional directors or managers limits the discretion of family members (Schulze and Kellerman, 2015). As family firms achieve greater dimensions, the need to manage complexity is stronger, and the introduction of skilled and experienced decision-makers in corporate structures is necessary to guarantee firm's survival. The presence of non-family members in governance mechanisms is negatively related to

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socioemotional outcomes (e.g. Gomez-Mejia et al., 2011). In fact, the presence of non-family members implies that the family already traded-off some socio-emotional outcomes with economic ones.

The highest level of socio-emotional outcomes are associated to early family generations and are especially strong when the founder is still present and active in the family business (Gomez-Mejia et al.,2007). As families evolve over time, identification with the family business declines, conflicts among family members increase, and many other aspects related to socio-emotional outcomes drop. Over time, socio-emotional goals exercise less influence on family decision-makers, and family owners and family managers exercise less resistance to the prioritization of economic goals over non-economic goals. In general, as the family distances itself from the management of the family business, socio-emotional goals decline over time.

The following propositions follow:

Proposition 5. As family firms move from early generations to the next, the likelihood of searching for information as a result of an exposure to exogenous knowledge increases.

Proposition 6. As family firms increase in size, the likelihood of searching for information as a result of an exposure to exogenous knowledge increases.

Some consideration can be drawn. Ex-ante correction mechanisms are preferable to ex-post correction mechanisms as they reduce the likelihood of family firms to face strain and stressful situations. In fact, ex-post correction mechanisms take place only as a reaction to below aspiration performances. It should then be preferred to provide family firms with exogenous knowledge before they actually face these financially critical moments.

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7. **DISCUSSION AND CONCLUSION.**

The theory in this essay proposes that owners are characterized by both motivational and knowledge-related biases. In fact, even when knowledge biases are reduced, family firms do not necessarily act on the basis of the new knowledge.

Two correction mechanisms take place. The first one is an ex-post correction mechanism, and is activated as a consequence of below aspirations performances. The literature predicts that under these circumstances, family firms prioritize economic goals over non-economic goals, reducing the motivational bias of family firms. Below aspirations performances set up a search process for new knowledge, here called endogenous knowledge, that reduces the knowledge-related bias and affects the definition of corporate governance mechanisms. The second one, is an ex-ante correction mechanism. This mechanism takes place following an exposure to exogenous knowledge, that acts on the knowledge-related bias, reducing it. Nevertheless, exposure to exogenous knowledge can not be sufficient to reduce the motivational bias. In fact, some family firms exhibit high level of attachment to socio-emotional goals that prevent the prioritization of economic goals over non-economic goals. A distinction is made between family firms that are preference-driven and those family firms that are knowledge-driven. The latter category of family firms is more likely to implement a superior corporate governance, given that superior corporate governance mechanisms are related to the achievement of economic goals. The former category, on the other side, is more likely to dismiss the exogenous knowledge, at least until ex-post correction mechanisms take place and prioritize economic goals over non-economic goals.

Some contextual factors play a role in the process. In fact, size, complexity and family generations, influence the attachment to socio-emotional goals. Specifically, the theory predicts that young and small firms are characterized by high level of attachment to socio-emotional

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goals. As a result, this cateogory of family firms is very resistant to ex-ante correction mechanisms that aim at prioritizing economic goals over non-economic goals. Nevertheless, given that the motivational bias in this category is very strong, and impacts on the survival of the organization itself, an early exposure to exogenous knowledge could help in reducing, over time, the attachment to non-economic goal and in activating a search process of exogenous knowledge.

The model relies on some assumptions, key to the attainment of the correction mechanisms. The first assumption is grouned on the positive relation between a superior corporate governance and the achievement of economic goals. The second one is based on the negative consequences that the attachment to socio-emotional goals exercises, in the long-term, on firm survival. The model generalizes family firms as an ownership identity characterized by weak corporate governance, as far as non-economic goals prevail over economic goals. Nevertheless, there exist examples of successful family firms, in example family dynasties, that are able to balance economic and non-economic goals in such a way that the survival of the family firm is actually reinforced by the achievement of non-economic goals, rather than limited. These family firms are large corporations, characterized by excellent examples of corporate governance. In the future, it is then important to understand this phenomenon, that is likely driven by the heterogeneity of socio-emotional goals present in family firms.

Moreover, the model does not take into consideration factors that affect the choice of corporate governance, apart from knowledge and attachment to socio-emotional goals. Available resources, industry, regulatory constraints, are just some of the elements that influence corporate governance adoption. The model proposed in this essay, on purpose, simplifies the mechanisms of adoption of corporate goverance to permit an easy understanding of the correction mechanisms. Even so, future research in this field should try to build a more

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comprehensive model, that takes into consideration a broader cateogry of internal factors, as well as external environmental elements.

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