

How Cognitive Institutional Dimension affects Leadership Structures of Corporate Boards: A Post-Crisis Ibero-American Study

Abstract

The current research project aims to identify whether cognitive institutional perspectives affect the leadership structures of boards of directors due to their strategic and control roles. This study focuses on the Ibero-American context of firms listed on stock exchanges after the global financial crisis of 2009 and the creation of the Integrated Markets of Latin America (MILA) as part of the Pacific Alliance.

The literature review considers the neo-institutional theory and its potential effects on corporate governance structures. We see an interesting connection between the cognitive institutional dimension, within the external institutional context, and both theories of resource dependence and agency to explain the possible changes in the strategic and control roles of corporate boards.

This research uses yearly panel data from companies for the period 2009-2015. The sample considers those firms listed on stock exchanges belonging to MILA, from Mexico City, Santiago de Chile, Lima and Bogotá, along with the firms listed in IBEX of Spain. We also consider two analysis stages to test the direct and indirect effects. We use panel data to see the circumstances by which institutional dimension affects firm performance and board changes related to control and strategic roles. The expected outcomes show the strong moderating effect of the cognitive institutional dimension on the board strategic role that impact finally on the governance leadership structure.

Finally, the relevance of this study is to broaden the field of corporate governance from the point of view of how boards of directors are structured. We also expand the research agendas to develop corporate governance concerns in the MILA region from the institutional perspective.

Keywords: *Institutional Theory, Agency Theory, Resource Dependence Theory, Boards of Directors, Firm Performance, MILA, IBEX.*

Introduction

Since the owners delegate their management activities to third parties in the organizations, they develop a relationship that requires the institutionalization of a mechanism capable of establishing corporate governance (Daily, Dalton, & Cannella Jr., 2003). For this reason, one of the most important internal mechanisms of corporate governance is the board of directors (Shleifer & Vishny, 1997). Therefore, over the years, there are studies of the different attributes of the boards of directors, such as its composition, characteristics, structures and processes, as well as their effects on firm performance (Zahra & Pearce

II, 1989). Moreover, the theoretical perspectives have made it possible to show the roles played by these boards of directors (Johnson, Daily, & Ellstrand, 1996), being analyzed mainly under a micro vision, that is, within the firm and its organizational behavior (Dalton & Dalton, 2011).

One of the main economic perspectives comes from the agency theory, where a contract establishes a principal-agent relationship in an organization (Eisenhardt, 1989; Jensen & Meckling, 1976). Therefore diverse agency problems may appear, where under information asymmetry, problems of adverse selection and moral hazard appear between principal and agent, causing different effects and potential risks on the firm results (Fama, 1980). In this context, the board of directors, as an internal mechanism of corporate governance, may exercise its control role to mitigate the individual self-interest of the agents in favor of the principals.

Agency theory is not the only perspective deeply rooted in the literature. The provision of external resources and the idea that the board of directors may play a strategic role towards management (Pfeffer & Salancik, 1978) is also quite popular. This is the perspective of the resource dependence theory relevant, too (Hillman, Cannella Jr., & Paetzold, 2000; Hillman, Withers, & Collins, 2009; Hillman & Thomas, 2003). In particular, this strategic role works as a catalyst between the principal and the agent, providing a strategic responsibility to the agent to lead new external resources towards the achievement of higher benefits for the company (Hillman et al., 2009).

These two roles of the board of directors, control or monitoring and strategy providers, are relevant at the time of determining a leadership structure capable of promoting business growth (Hillman & Thomas, 2003). However, after the financial crisis, current discussions mention that not only should the roles assumed by the board of directors be studied in an integrated manner, other external factors should be included too. External factors, at the macro level, could affect the development of these governance structures (Aguilera, Judge, & Terjesen, 2018; Aoki, 2010; Dalton & Dalton, 2011).

Considering this, several studies have also focused, from social and psychological perspectives, on understanding how certain context factors affect organizational decisions that strengthen the change of those leadership structures that face the business dynamics (Selznick, 1948, 1996). In particular, the institutional theory began to take relevance in the field of organizations with focus in the corporate governance (Coase, 1998; DiMaggio & Powell, 1983; Powell & DiMaggio, 1991). Considering the institutional perspective, the normative, regulatory and cognitive dimensions gain value by establishing, socially, an environment capable of affecting the organizational culture, based on their routine and roles and, therefore, in the institutional leadership structure that the organization develops (Dacin, Goodstein, & Scott, 2002; Scott, 1995).

Recent studies have attempted to establish a vis-a-vis between macro and micro dimensions to see how, from an institutional perspective, macro dimensions could be aligned with micro dimensions in the area of corporate governance

(Aguilera et al., 2018; Aoki, 2010; Briano-Turrent & Rodríguez-Ariza, 2016). Furthermore, beyond the normative and regulatory dimensions that are more punctual and lasting, the institutional cognitive dimension represents a more systematic way of recognizing collective changes that may well exert pressure on the managerial behavior and, therefore, on their governance (Aoki, 2010). Thus, some macro variables associated with an institutional cognition that the society of a country adopts in time could exert an effect, along with the annual firm results, in the two roles of the board of directors, control and strategic, and this could involve a change in the leadership structures of the corporate governance. In order to carry out this type of studies we need to have longitudinal information that allows, on one hand, to describe the behavior over time and, on the other hand, variables at the macro level for some comparable countries (Dalton & Dalton, 2011). Consequently, Latin America becomes a reasonable option to carry out a comparative study capable of supporting micro and macro level studies (Briano-Turrent & Rodríguez-Ariza, 2016; Sáenz González & García-Meca, 2014).

Taking into consideration the previous framework, launching a study in Latin America would need to contemplate comparatively homogeneous countries in their size of industries and their growth dynamics (Aguilera, Kabbach de Castro, Lee, & You, 2012). For these reasons, we focus on a part of Latin America that has been developing certain common aspects, such as the developing of the Pacific Alliance and the creation of an integrated stock market called MILA (Arbeláez García & Rosso, 2016). Those countries, Mexico, Chile, Peru and Colombia, concentrate almost 40% of the GDP, 50% of the international trade and 50% foreign direct investment of all Latin America (Dastis, 2017). Given the commercial closeness with Spain and prior studies, we will also include this country in the analysis (Galve-Górriz & Hernández-Trasobares, 2015).

Iberoamerica has gone through several changes in recent decades. Notwithstanding the changes that have occurred in North America, several Latin American emerging countries have sought to follow part of good practices in corporate governance issues (Briano-Turrent & Rodríguez-Ariza, 2016; Chong & Lopez-de-Silanes, 2004, 2007; Kabbach de Castro, Crespi-Cladera, & Aguilera, 2013; Lagos Cortés & Botero, 2016). Almost in general, all these countries have had to overcome in the nineties macroeconomic problems associated with economic policies (Chong & Lopez-de-Silanes, 2007). One of the main problems that affected these economies was governments with poor practices of governance and management, even assuming governance structures based on international principles. In addition, overcoming critical inflation or severe social problems were characteristic of these countries.

In such a context, one of the main problems that the countries began to face as part of their restructuring was the assumption of new leadership structures based on the privatization of public companies (Chong & Lopez-de-Silanes, 2004). This generated a great impetus from national policies and regulations to incorporate new corporate governance standards valid not only in the public sphere, but also to strengthen the relationship with the private sector.

Likewise, the context of new technologies in a knowledge society, improved the dynamics within the stock markets reflected in the first decade of the new millennium. Moreover, with the arrival of the global financial crisis, these changes were almost mandatory in these markets, with the need of a much more complete and transparent information for the listed companies (Cueto, 2010; Galve-Górriz & Hernández-Trasobares, 2015). In addition, this increased information allowed more analyses, not only from a financial perspective but also from an organizational perspective, thanks to the continuous public reports and the greater samples of the listed companies of local creation in emerging countries.

Finally, our work wants to connect also with new studies related to institutional comparisons that build up on different realities and face dynamics changes in their governance structures (Pelayo-Maciél & Sánchez-Gutierrez, 2013). One of the challenges currently facing academics is to approach other emerging contexts to understand comparatively how institutional aspects could affect the development of changes in corporate governance associated with internal mechanisms that could determine the leadership structures changes of the boards (Krause, Semadeni, & Cannella, 2014). Consequently, these accounting or market features can be seen as, not only antecedents of prior firm-performance, but also as causal effects on these changes of the boards.

Agency and Resource Dependence Theories on Governance Leadership Structure

CEO duality is a phenomenon widely discussed by academics as part of the leadership structure of the board of directors (Brickley, Coles, & Jarrell, 1997; Dalton, Daily, Ellstrand, & Johnson, 1998; Dalton & Dalton, 2011; Finkelstein & D'Aveni, 1994; Krause et al., 2014). Initially, the studies defined CEO duality as the presence, or not, of the CEO within the board of directors (Brickley et al., 1997; Dalton et al., 1998). In early studies, the priority has been to establish, in a dichotomous way, if the CEO was at the same time president of the board of directors or not. Until now, the results of this approach remain controversial (Krause et al., 2014). Initially, academics studied the direct relationship of CEO duality on firm performance, either accounting or market performance, even at the level of bankruptcy (Daily, 1995). The findings to date are very varied, even from the first meta-analysis that warned of the non-existence of significant effects in a general way (Dalton et al., 1998). Subsequent studies, have made it possible to understand the nature of significant effects due to turbulent contexts in organizations that are not as complex, in contrast to situations of calm with much larger and more complex companies (Finkelstein & D'Aveni, 1994).

The search for a refinement of the dependent variable allowed us to study whether the CEO duality is product of any internal or external member to the organization at the time of the change (Davidson III, Worrell, & Nemeč, 1998). Consequently, the academics undertook studies to see the antecedents of the CEO duality, including the CEO turnover as one of the variables that help to disintegrate the CEO duality (Goyal & Park, 2002; Parrino, 1997) and, in other cases, as an

interacting part of the variables that cause the existence of duality (Tuggle, Sirmon, Reutzel, & Bierman, 2010). In addition, in the search to refine duality, other options were sought to present the variable not in a dichotomous way (Krause & Semadeni, 2013). Under this premise, one of the considerations to be studied is that the CEO can be part of the board of directors without being the chairman, as an intermediate option to whether there is duality or not.

Beyond CEO duality, the different roles played by the board of directors become also relevant. Therefore, considering attributes such as the board size or the board independence, as well as the levels of rotation or the experience may be affecting the leadership structures. This allowed us to open the threshold of the theories associated with the roles that the board could assume and the effects on the leadership structure. For the present study, it will be relevant to delve into the widely studied relationship coming from two perspectives, that of agency theory and that of resource dependence, focusing on the control and the strategic roles respectively.

Control Role and Leadership Structure of Boards

One of the theories widely studied in the corporate governance field is the agency theory. Searching to understand how to reduce the agency problems due to information asymmetries, as well as the moral hazard and adverse selection generated by the hiring of agents to carry out the objectives of value creation for the principals (Fama, 1980; Hillman & Thomas, 2003; Shapiro, 2005). With these premises, several studies sought to understand the boards of directors or the ownership structure, as well as the internal mechanism designs to mitigate the problems of the principal-agent relationship.

For these reasons, from a control perspective, the academics studied the attributes of the boards of directors, using variables such as size, independence, as well as the rotation of members or experience, tenure, and many others (Daily, Dalton, & Cannella Jr., 2003; Daily, Dalton, & Rajagopalan, 2003; Johnson et al., 1996). These variables, as well as others, which were even grouped by composition, characteristics, structure and processes, to show how monitoring conditions, and other potential roles, could exert on firm performance (Zahra & Pearce II, 1989). Even, in the actions of management and even opening the threshold that leads us to this study, the leadership structure that must be assumed in the governance and the top management (Brickley et al., 1997; Daily & Dalton, 1993; Dalton et al., 1998; Dalton & Dalton, 2011; Linck, Netter, & Yang, 2008). The studies in this strategic field opened a threshold not yet conclusive, in which many questions have remained open, and that in this recent decade have been discussed as future agendas to be addressed in greater depth (Krause et al., 2014).

Studies of the antecedents of boards of directors, under the vision of agency, that affect the leadership structure are, on one hand, by poor performance, as well as by the combination of the presence of independent members in the board and the industrial concentration, affecting significantly the determination of CEO duality (Harrison, Torres, & Kukalis, 1988).

Moreover, in a later study with companies that did not involve the financial sector, the findings showed that there was no relation of previous firm performances on the determination of CEO duality (Iyengar & Zampelli, 2009). Even considering variables as board independence, which at present opens a threshold of discussion to see in other samples, or contexts, what is happening with this effect types.

Furthermore, studies told about the direct effect together, and in the last decade, the scholars extended the studies to measure the interactions of the governance internal mechanisms as moderator effects (Balsam, Puthenpurackal, & Upadhyay, 2016). However, currently, few studies talk about the mediation (Bergh et al., 2016), and for these reasons, one of the opportunities to open a gap related to measure the indirect effects could be possible. Consequently, we present the following hypothesis:

H1a: There is mediation by board independence, as control role, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

Likewise, based on determinate industries, a study showed that members of watchdog boards, conditioned to their independence, had significant positive effects on the CEO duality determination. However, the past high performance of the organization and a high level of informal power of CEOs weakened the effects (Finkelstein & D'Aveni, 1994).

With this last, one of the fields developed widely was that of CEO turnover. If initially studies have gone directly to see their effects on the firm performance (Brickley, 2003; Intintoli, Zhang, & Davidson, 2014), at present, the studies of CEO turnover have sought to measure their antecedents (Wiersema & Moliterno, 2015), using the firm performance as common antecedent. For these reasons, we present the following hypothesis:

H1b: There is mediation by CEO turnover, as control role of boards of directors, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

On the other hand, other studies contemplated that the presence of CEO founders of small, fast-growing and listed companies had no significant effect on the determination of CEO duality (Daily & Dalton, 1992). Nevertheless, if the CEO founders of small listed companies with a certain level of employees and small sales amounts would have significant positive effects on the determination of CEO duality (Daily & Dalton, 1993). However, similar studies later showed that companies

of initial public offering in the stock markets of the goods and services industry had significant negative effects on the CEO duality determination (Beatty & Zajac, 1994).

Appropriately, the previous studies related companies with family ownership structures. Moreover, in the same way, there exist Latin-American researches that study the effects of both family and non-family listed firms related to their corporate governance (Briano-Turrent & Poletti-Hughes, 2017). So, one of the elements that can be considered, within a control role, is that having a family property structure, can exercise greater control over the government leadership structure that you want to keep based on the prior performance that it reviews. Therefore, we present the following hypothesis:

H1c: There is mediation by family shareholders, as control role from boards of directors, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

Strategic Role and Leadership Structure of Boards

On the other hand, another theory widely addressed in the corporate governance field is the resource dependence theory (Hillman et al., 2000, 2009; Hillman & Thomas, 2003; Lynall, Golden, & Hillman, 2003; Pfeffer & Salancik, 1978). Unlike the theory of agency, where the mechanism design of control is a priority, this perspective sees the mechanism design of service or strategic by the board of directors regarding the corporate governance leadership structure.

This perspective allows understanding the effects of dependency and obtaining resources (Pfeffer & Salancik, 1978). Likewise, previous studies based on literature reviews show that this perspective is more accepted than other complementary perspectives to demonstrate the roles of the board of directors (Hillman & Thomas, 2003; Hillman et al., 2009).

Thus, the first studies based on the theory of resource dependence and oriented to the boards of directors sought to understand attributes such as size and composition in the determination of critical resources for the company (Hillman et al., 2000; Hillman & Thomas, 2003). Concluding that the size and composition of the councils are not random or independent attributes, but are a response to external conditions that allow us to determine the most optimal governance structures for their purposes, including significant effects on the performance of the company (Hillman et al., 2009).

However, after studies in which the direct relationship of size and insider board members as composition directly affect the firm performance (Hillman et al., 2000; Hillman & Thomas, 2003), with various discussions, subsequent research suggests a deeper understanding in which the size and insider board members as composition should also depend on prior firm performance (Krause et al., 2014).

For these reasons, the studies of boards attributes, from a resource dependence vision, saw how the insider members by knowledge and belonging related to the firm could have significant effects on performance. In the same way, we can assume that these attributes could be results of the prior firm performance effects, and as antecedents to the governance leadership structure. For these reasons, we present the following hypothesis:

H2a: There is mediation of board dependence, as service role, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

Complementarily, another antecedent put to test is the CEO permanence, or no turnover, identifying that in situations where the permanence and tenure are greater, it has a significant positive effect on CEO duality (Linck et al., 2008).

Often, this CEO permanence is due to the experience in the top management position and, which will seek to share their knowledge within the organization. This is not new, in previous studies it is even mentioned that not changing CEO in times of turbulence or with companies that are not so complex allows an optimal developing and firm value creation (Finkelstein & D'Aveni, 1994). For these reasons, we mention the following hypothesis:

H2b: There is mediation of CEO no turnover, as service role of boards of directors, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

On the other hand, one of the aspects that is also relevant in this type of perspective is the need for external resource dependence (Drees & Heugens, 2013; Hillman et al., 2009). This is more in circumstances in which the property is not so concentrated, as well as top ownership no majority, so that it facilitates new participants in the ownership structures, searching other options for value creation.

In the same way, we could say that this ownership no concentrated or no majority will have an impact on the government leadership structures that the firm could maintain as an indirect effect from the prior firm performance. For these reasons, we mention the following hypothesis:

H2c: There is mediation by top ownership no majority, as service role from boards of directors, in the relationship of prior firm performance on Ibero-american governance leadership structure under post-crisis context.

Institutional Perspective and Board Roles on Leadership Structure of Boards

The prior and extensive reference studies used up in the developing of the literature review and theoretical framework are mainly from a micro level. This is because the micro level studies of this field are more for firms and their strategic behavior as analysis unit (Dalton & Dalton, 2011).

However, when we talk about studies with an institutional perspective, the scholars mainly has developed macro-level studies (Coase, 1998; North, 1986, 1990; Williamson, 2000). Although the choice of micro-level studies in institutional character have had another type of development (DiMaggio & Powell, 1983; Powell & DiMaggio, 1991; Selznick, 1996), the options that have been opened in the last decade to address multilevel studies have become more relevant (Briano-Turrent & Rodríguez-Ariza, 2016; Meijerink, 2011; Nakpodia & Adegbite, 2018; Scott, 1995).

In addition, due to the nature of the analysis unit and the dynamics in the data collection and analysis, the studies usually remained separate.

Thus, this perspective has a double approach. On the one hand, we tried to approach from micro level as the process in which the leadership structures institutionalize a culture, as psychological and organizational perspective (Powell & DiMaggio, 1991; Selznick, 1996). On the other hand, from the economical and sociological perspective, we consider the opportunity to understand that the institutionalization or institutional change is due to external factors, as normative, regulatory or cognitive, that assume the organizations (Aoki, 2010; Meijerink, 2011; North, 1990; Scott, 1995).

For instance, one of this institutional perspective that faced the multilevel vision (Aoki, 2010) refers to three types of organizational architecture, or system of associative cognition, that allow the development of governance structures, as hierarchical decomposition, information assimilation and information encapsulation.

The first case of organizational architecture that allows a governance structure based on hierarchical decomposition, an example is that the boards of directors are affected or interact better with the environment forces and then exert an effect on the agents. In order to set up a governance leadership structure that allows responding to this environment.

The second case of organizational architecture that allows a governance structure based on the information assimilation, an example is that both the boards of directors and agents are affected together with the environment forces. In order to configure an appropriate governance leadership structure that allows responding to the environment.

The third case of organizational architecture that allows a governance structure based on the information encapsulation, an example is that the boards of directors and the agents are affected with the environment forces in an

independent isolated way. In order to configure a governance leadership structure that allows responding to the environment independently from both sides.

While these organizational architecture types are due to the relationship that can develop between two groups in a governance leadership structure, such as the boards and top management, thus the first type resembles the control role, while the second to a strategic or service role.

Considering the above as cognitive institutional perspective, one of the global indicators that has increased its relevance in recent years due to its measurement continuity and the solid source is the Worldwide Governance Index (WGI). This set of global governance indicators has allowed understanding how macro institutional variables such as Voice and Accountability, Political Stability and Absence of Violence/Terrorism, Government Effectiveness, Regulatory Quality, Rule of Law, and Control of Corruption influence on the organizations according to their countries. For these reason, we mention the following hypotheses:

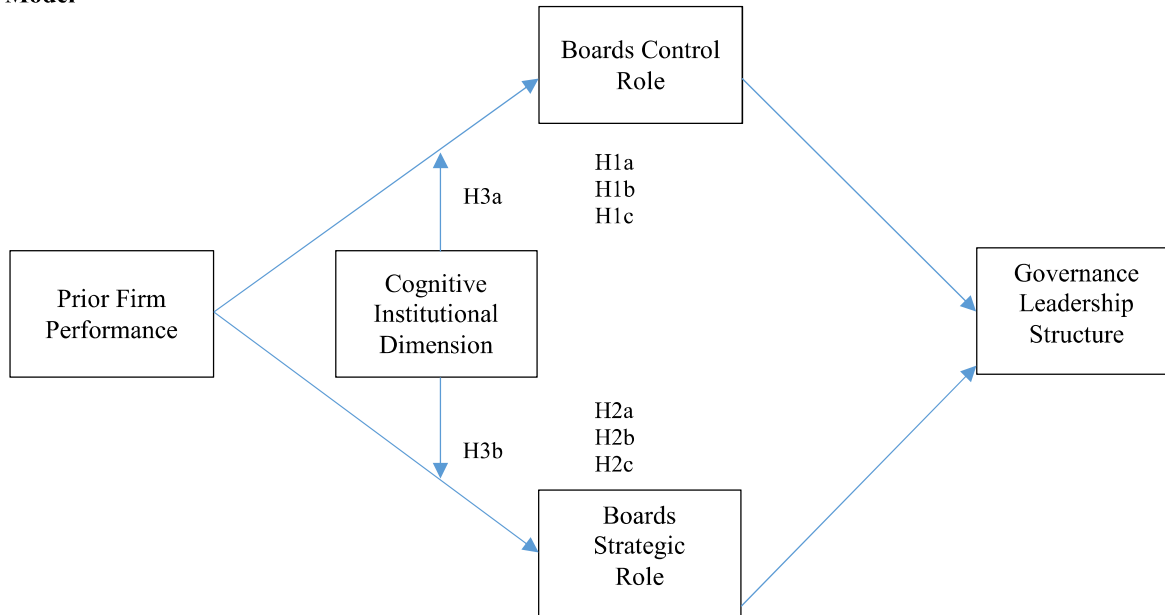
H3a: There exist moderation effects of the cognitive institutional factor on the relationship between prior firm performance and board control role in Ibero-american governance leadership structure under post-crisis context.

H3b: There exist moderation effects of the cognitive institutional factor on the relationship between prior firm performance and board strategic role in Ibero-american governance leadership structure under post-crisis context.

Methodology

The research design is a causal longitudinal non-experimental study. The model describes initially two mediation studies from the prior firm performances on governance leadership structure. These two mediation studies are in order to the control and service roles described above. Moreover, the cognitive institutional dimension enter as moderation effect in the first stage of both mediation relations.

Model



Sample

The sample is a panel data from 2009 to 2015. Initially, we considered the countries of Chile, Colombia, Peru and Mexico as Latin American Integrated Market - MILA group. Subsequently, we will included Spain to make the comparative study to extend the scope to Ibero-America.

The sample includes locally created firms listed on stock exchanges of their own countries. The data related to the information of boards of directors come from the annual reports that each firm gives to the securities exchange superintendence and to the stock exchange market of each country, as information of contrast. In addition, the data related to the financial-accounting and market information come from the Bloomberg Terminal, Eikon Thompson Reuters platforms and from the audited financial statements delivered by the securities exchange superintendence of each country.

Measurements

The dependent variable is the governance leadership structure represented by the CEO duality. This CEO duality has three dichotomy categories. The first category is the CEO with no duality, which means a Chair and Board of Directors without presence of CEO. The second category is the CEO as board member, which means a Chair without presence of CEO, but whether as member of Board of Directors. Finally, the CEO as board chair, which means the CEO as Chairman of Board.

| Dependent Variable | Code | Definition | Measure |
|------------------------------|--|--|--------------------------------|
| CEO duality | ceo_duality | Three categories of Governance Leadership Structure: 1 = ceo no-dual, 2 = ceo dual as board member, 3 = ceo dual as cbo. | categorical |
| CEO no-Dual | ceo_nodual | Likelihood to have a CEO non duality = 1, otherwise = 0 | dummy |
| CEO on BoD | ceo_bodmem | Likelihood to have a CEO as Board member = 1, otherwise = 0 | dummy |
| CEO as CBO | ceo_dual_cbo | Likelihood to have a CEO and CBO = 1, otherwise = 0 | dummy |
| Mediator Variables | Code | Definition | Measure |
| Board Size | bod_size ln_bod_size | Number of members on Board | ordinal ln ordinal |
| Board Independence | bod_numind bod_p_ind lnp_bod_ind | Number of independent members on Board | ordinal ratio ln ratio |
| Board Dependence | bod_numdep bod_p_dep ln_bod_dep | Number of dependent members on Board | ordinal ratio ln ordinal |
| CEO Turnover | ceo_turnover | Likelihood to have a CEO turnover = 1, otherwise = 0 | dummy |
| CEO Permanence | ceo_noturnover | Likelihood to have a CEO permanence (no turnover) = 1, otherwise = 0 | dummy |
| Family in the Shareholder | shld_fam | Likelihood to have family in the ownership structure = 1, otherwise = 0 | dummy |
| Top Owner <50% shares | top_owner_0_50 | Likelihood to have the top owner with less than 50% of the shares = 1, otherwise = 0 | dummy |
| Independent Variables | Code | Definition | Measure |
| ROA _{t-1} | roa_1 | (Net Income / Total Assets) of prior year | ratio |
| EBIT _{t-1} | ebit_1 ln_ebit_1 | Earning Before Interests and Taxes, of prior year | ratio ln ratio |
| Control Variables | Code | Definition | Measure |
| Country | country | Peru=1, Chile=2, Mexico=3, Colombia=4, Spain= 5 | categorical |
| Leverage | leverage | Total Debt / Total Equity ratio | ratio |
| Ln Assets | ln_assets | Firm size in order to log natural of the assets | ln ratio |
| Ln Age | ln_age | Firm age in order to log natural of the firm age | ln ratio |
| Moderate Variables | Code | Definition | Measure |
| WGI _{t-1} | WGI | Integral Factor of Worldwide Governance Index that reduce the following 6 variables | ratio |
| va _{t-1} | va_1 | Voice and Accountability | ratio |
| pv _{t-1} | pv_1 | Political Stability and Absence of Terrorism | ratio |
| ge _{t-1} | ge_1 | Government Effectiveness | ratio |
| rq _{t-1} | rq_1 | Regulatory Quality | ratio |
| rl _{t-1} | rl_1 | Rule of Law | ratio |
| cc _{t-1} | cc_1 | Control of Corruption | ratio |

For the independent variables, we use the prior firm performance, which included the variable return of assets (ROA), and the earning before the interest and taxes (EBIT).

For the mediation, we use the variables related to the governance internal mechanisms, used in prior studies, as the board independence, CEO turnover, and family ownership in order to agency perspective to demonstrate the control role. On the other hand, the board size, board dependence, CEO permanence, and top ownership no majority in order to resource dependence perspective to demonstrate the service-strategic role.

Finally, we used as moderation the macro level variables of the Worldwide Governance Index (WGI) to study the effects of the Institutional Perspective, as Voice and Accountability (va), Political Stability and Absence of Violence/Terrorism (pv), Government Effectiveness (ge), Regulatory Quality (rq), Rule of Law (rl), and Control of Corruption (cc). According to a correlation analysis between these variables, them was factorized in a integrate dimension called WGI.

Procedure

The procedure begins with a descriptive analysis. This analysis allows recognizing the patterns and seeing what data are quantitative or continuous, categorical and dummies. In the same way, we verified the distribution of quantitative independent variables with histograms and longitudinally. This step allows standardizing some variables at the natural logarithm level. The variables transformed to natural logarithms are the proportion of board independent members, board dependent members, board size, as well as the control variable of firm size represented by the total assets.

Furthermore, difference in means analyses are necessary to determinate what firm performance types, as well as independent variables, are significant to identify differences with key variables due to the leadership structure types. For the firm performance types, we identified that ROA and EBIT have significant levels to use in the next steps.

After describing the initial data, we proceeded to the correlation analysis. This analysis allows identifying the relationship between the variables, as well as identifying potential problems related to autocorrelation or homoscedasticity. The correlation analyzes are carried out to test all the variables related to the control role and service role.

Then, we performed prior panel data analyses, with pooled OLS, random, and fixed effects, to test possible endogeneity problems with the variables of the boards of directors and of the leadership structure as independent variables on the involved firm performance types. Thus, we developed four test models in two groups (for control role and service role), having two models for each group, with the dependent variables ROA, and EBIT respectively.

$$FirmPerformance_{it} [control\ role] = \alpha_i + \beta1leverage_{it} + \beta2ln_assets_{it} + \beta3ln_agey_{it} + \beta4FirmPerformance_{it-1} + \beta5ln_bod_ind_{it} + \beta6ceo_turnover_{it} + \beta7shld_fam_{it} + \beta8ceo_duality_{it} + \beta9(lnp_bod_ind \times ceo_duality)_{it} + \eta_i + \varepsilon_{it}$$

$$FirmPerformance_{it} [service\ role] = \alpha_i + \beta1leverage_{it} + \beta2ln_assets_{it} + \beta3ln_age_{it} + \beta4FirmPerformance_{it-1} + \beta5ln_bod_size_{it} + \beta6ln_bod_dep_{it} + \beta7ceo_noturnover_{it} + \beta8top_owner_0_50_{it} + \beta9ceo_duality_{it} + \beta10(ln_bod_dep \times ceo_duality)_{it} + \eta_i + \varepsilon_{it}$$

These initial models identified that both the ROA and the EBIT are the most stable variables of firm performance for our study. Furthermore, ROA presents a normalized distribution, while EBIT requires normalization, so it becomes a natural logarithm to continue with the models.

Then, the development of Logistic Regression Models for Binary Panel Data and Panel Data with Random Effects are the main parts of the study. These parts have the three types of CEO duality (CEO non-dual, CEO-board member, CEO-CBO) as dummy and categorical dependent variables, in order to test the two types of prior firm performance (ROA_{t-1}, EBIT_{t-1}), and according to the variables for control role and service role respectively. In addition, the model include the moderation variable of cognitive institutional perspective, as unique dimension of world governance index (WGI_{t-1}), to interact as macro-level variable with the prior firm performance as micro-level variable.

Although the Worldwide Governance Index presents six variables associated with the context of governance by country, when performing a correlation analysis between them, all had high significance levels. Thus, these factorized through principal components, reducing the six variables previously mentioned to one dimension.

These models permit to identify the direct effects on governance leadership structure. In addition, this allows reviewing compliance with the regression assumptions.

$$LeadershipStructure_{it} [control\ role] = \alpha_i + \beta1\ leverage_{it} + \beta2\ ln_assets_{it} + \beta3ln_age_{it} + \beta4country_{it} + \beta5FirmPerformance_{it-1} + \beta6\ lnp_bod_ind_{it} + \beta7\ ceo_turnover_{it} + \beta8\ shld_fam_{it} + \beta9WGI_{it-1} + \beta10(FirmPerformance \times WGI)_{it-1} + \eta_i + \varepsilon_{it}$$

$$LeadershipStructure_{it} [service\ role] = \alpha_i + \beta1leverage_{it} + \beta2ln_assets_{it} + \beta3ln_age_{it} + \beta4country_{it} + \beta5FirmPerformance_{it-1} + \beta6ln_bod_size_{it} + \beta7ln_bod_dep_{it} + \beta8ceo_noturnover_{it} + \beta9top_owner_0_50_{it} + \beta10WGI_{it-1} + \beta11(FirmPerformance \times WGI)_{it-1} + \eta_i + \varepsilon_{it}$$

After these analyzes, we proceed to the moderated mediation models to demonstrate the hypotheses raised in our study regarding the control role and the service role on the governance leadership structure with the moderation of the cognitive institutional dimension.

The mediation tests use the dependent variable, CEO Duality, of three categories. In addition, the independent variables of prior firm performance (ROA_{t-1} and $EBIT_{t-1}$) work together. Thus, the two developed models group the mediation variables in order to the roles of the boards of directors.

The mediation analyzes show, which are the significant mediator variables and determine each role foreseen in the study. With this identification, we proceed to do the moderation analysis of the macro-level variables factorized into a single dimension of the Worldwide Governance Index.

Results

According to the results of CEO duality in this study, the last priority remains to have the CEO separate from any governance leadership structure. This kind of situation is more notorious in two specific country, Chile and Colombia, because normatively they do not allow any kind of duality on firms listed in stock exchange markets.

However, with the rest of countries across the years, after the financial crisis of 2008, the CEO duality is more representative when the CEO is a board member, than when he is the chair of the board. For this reason, it was necessary for the study to consider that middle category.

Moreover, the variations across these categories, in general, have not been strong, considering that, they have remained almost stable over the last few years. Slightly the CEO no dual increased and reduced the other two categories.

In addition, one of the aspects that has had a significant variation over time is the CEO turnover. In fact, the CEO turnover is an interesting predictor of CEO duality as control role. Despite it does not increase immediately after the financial crisis, it peaks in 2013. However, these changes with respect to the proportion of total number of companies observed were not they surpass 15% of the observations.

Furthermore, an internal mechanism of corporate governance employs in this study is the ownership structure. One of the variables used in the study as control role was the presence of family as shareholders. Although, it is very widespread that most of ownerships in Ibero-American firms are family, in many cases is hidden in stock exchange markets. According to the descriptive analysis, around than 45% of the observations are family property. However, this is a subject to consider. Due mainly to capital structuring by part of companies that create other companies outside the country to include them as top shareholder through global investment banks or holding company, hiding the presence of family as majority shareholder. Given this aspect, the presence of family as a shareholder has a role of control rather than service. Likewise, in almost all cases in which the family is a shareholder, almost all have a presence with more than 50% of the shareholding concentration.

Complementarily, there is a particular interest in determining the presence of principal shareholders with less than 50% of shares, since in a large proportion their presence is not familiar. This helps to understand another relevant aspect as a service role and resource dependence in the firms.

On the other hand, another internal mechanism of corporate governance is the board of directors. There are principally three variable used, the board independence, the board size and the board dependence. Their standardization to natural logarithm allowed the analysis according to the roles. While for the control role, the Board independence has a negative mean, for the service role both the Board size as well as the Board dependence take positive mean.

Regarding the firm performance variables, the return on assets presents a normal behavior across the time. The minimum and maximum ratios do not present outliers, thus the average and standard deviation have a normal trend. In the case of the earnings before interest and taxes, its behavior was asymmetric, having a marked deviation, so it was necessary to convert it to natural logarithm. After the conversion, the EBIT (ln) presented a normal trend distribution, significantly reducing the biases.

Finally, as moderation variables that represent an institutional cognitive perspective, the study used the worldwide governance index based on external factors. Each variable had standardized behavior and highly correlated between them due to the same index. So that its nature allowed reduce them into a principal component to be able to explain if there exist moderating effect between prior firm performance and the control or service roles.

Direct Effects as prior steps

For purposes of not having multicollinearity problems, we passed VIF tests for each model in order to see to what extent they are within acceptable ranges to be able to run the regressions. One of the first direct effects analyzes is the regressions of panel data with random effects for each firm performance. The results show that there is no endogeneity on the part of variables to using in subsequent models.

Moreover, the results show that control variables, leverage and ln assets, has direct effects on firm performance. In addition, in none of the cases the CEO duality and CEO turnover (and CEO permanence) have direct effects on firm performance, as well as the variables associated with the control role. Only the CEO duality in the CEO-CBO category has a significant effect on EBIT when it interacts with the independence of the board.

In the case of the service role, the board size has effects on ROE and EBIT, while the board dependence has effects on ROA and ROE. In addition, only the top owner as non-majority has significant effect on EBIT. Furthermore, in the three cases of service role, only with ROE the constant is not significant.

Direct Effects of Control and Service Roles on CEO duality from 2009 to 2015

| Dependent Variable: CEO Duality | | | | |
|---------------------------------|-----------------------------|-----------------------------|-----------------------------|-----------------------------|
| | Control Role | | Service Role | |
| | (1) prior ROA | (2) prior EBIT | (3) prior ROA | (4) prior EBIT |
| leverage | 0.00102* (1.73) | 0.000933 (1.41) | 0.00174* (1.71) | 0.00256 (1.17) |
| ln_assets | -0.0181 (-0.73) | -0.0203 (-0.76) | -0.0280 (-1.38) | -0.0411* (-1.77) |
| country | 0.291*** (7.57) | 0.291*** (7.54) | 0.302*** (8.22) | 0.309*** (8.14) |
| roa_1 | 0.0474 (0.25) | | 0.169 (1.34) | |
| lnp_bod_ind | -0.0345 (-0.92) | -0.0444 (-1.10) | | |
| ceo_turnover | -0.0780** (-2.17) | -0.0504 (-1.40) | | |
| shld_fam | 0.220*** (2.59) | 0.233*** (2.70) | | |
| WGI | -0.214*** (-5.29) | -0.349*** (-5.02) | -0.257*** (-6.91) | -0.370*** (-6.10) |
| c.WGI#c.roa_1 | -0.0946 (-0.58) | | -0.190* (-1.84) | |
| ln_ebit_1 | | 0.00928 (0.57) | | 0.0129 (0.91) |
| c.WGI#c.ln_ebit_1 | | 0.0270** (2.10) | | 0.0213* (1.85) |
| ln_bod_size | | | -0.0216 (-0.21) | -0.0416 (-0.40) |
| ln_bod_dep | | | 0.0954 (1.60) | 0.105* (1.67) |
| ceo_noturnover | | | 0.0903*** (2.65) | 0.0735** (2.12) |
| top_owner_0_50 | | | 0.0501 (1.04) | 0.0667 (1.30) |
| _cons | 0.940*** (5.60) | 0.890*** (5.49) | 0.880*** (5.10) | 0.939*** (5.36) |
| N | 1712 | 1567 | 2044 | 1863 |
| r2_w | 0.014 | 0.011 | 0.018 | 0.017 |
| r2_b | 0.334 | 0.348 | 0.329 | 0.334 |
| r2_o | 0.286 | 0.289 | 0.283 | 0.273 |
| Mean VIF | 1.30 | 1.92 | 1.55 | 2.11 |

* p<0.1, ** p<0.05, *** p<0.01. t statistics in parentheses.
Mean VIF > 4 multicollinearity problems are potentially severe.

The obtained results discarded the models associated to the ROE, because on the one hand they would not have an orientation defined by presenting non-significant constants. In addition, in the role of service role it presents both the size and the dependence of the board with significant values, being the model that would present greater endogeneity for our study.

Subsequently, the next models of direct effects on CEO duality, as dummies, allowed testing the direct effects of the independent and mediating variables of our study. For this modeling, we used the logit data panel to demonstrate how the probability of having a defined structure of leadership in relation to the other variables.

The first table includes six models in two groups, according to both board roles, for each category of CEO duality, taking the ROA t-1 as the main independent variable.

In all six cases, the ROA t-1 has no significant direct effects on the CEO duality. Likewise, the board independence and CEO turnover, as board control role, are not significant on CEO as board member. However, in the models of CEO non-dual and CEO-CBO, the variables board independence, CEO turnover and family as shareholder show significant direct effects. On the other hand, in the models of service role, the board dependence has no significant direct effect on duality CEO, in any category. However, the board dependence has significant direct effects on CEO non-dual and CEO as board member. In the case of CEO no turnover, this presents significant direct effects on CEO non-dual and CEO-CBO. Finally, in the case of the top owner as non-majority, this variable has a significant direct effect on CEO as board member.

The second table includes the other six models in two groups, according to both board roles, for each category of CEO duality, taking the ln EBIT t-1 as the main independent variable.

For the models with the control role, mainly the family as shareholder presents significant direct effects on all categories of CEO duality. Moreover, the board independence has significant direct effects on the non-dual CEO and the CEO-CBO, and CEO turnover only has a significant direct effect on CEO-CBO. For models with the service role, the Board size does not have significant direct effects on any category of CEO duality.

However, the board dependence has significant direct effects on CEO non-dual and CEO as board member. Moreover, the CEO no turnover, has significant direct effects on CEO no dual and CEO-CBO. Finally, the top owner as non-majority has significant direct effect on CEO as board member.

These both models of direct effects allow understanding the potential effects of the variables that represent the control and service roles for the study.

From the results obtained, all the variables of control role exert a significant direct effect on CEO-CBO. While in other models of CEO duality, the direct effects are mixed.

After these tests individually, the following models included the indirect effects to study the mediations using the dependent variable CEO duality in an integral way, as well as the independent variables ROA t-1 and ln EBIT t-1 together.

Direct Effects on CEO duality (CEO no-Dual, CEO as Board member, CEO as Chairman) from 2009 to 2015

| | Control Role (with prior ROA) | | Service Role (with prior ROA) | | Control Role (with prior EBIT) | | Service Role (with prior EBIT) | | | | | |
|--------------------|----------------------------------|-----------------------------|----------------------------------|------------------------------|-----------------------------------|-----------------------------|-----------------------------------|----------------------------|----------------------------|------------------------------|-----------------------------|-----------------------------|
| | CEOOnoDual (1) | CEOCBO (2) | CEOOnoDual (3) | CEOCBO (4) | CEOOnoDual (5) | CEOCBO (6) | CEOOnoDual (7) | CEOCBO (8) | CEOOnoDual (9) | CEOCBO (10) | CEOOnoDual (11) | CEOCBO (12) |
| leverage | 0.0349 (1.46) | 0.0144 (0.53) | 0.0434 (0.60) | 0.0239 (1.26) | 0.0176 (0.71) | 0.0878 (1.36) | 0.0602 (1.62) | 0.0100 (0.30) | 0.0357 (0.44) | 0.0404 (1.46) | 0.0151 (0.43) | 0.0900 (1.30) |
| ln_assets | -0.203 (-0.74) | 0.476* (1.81) | -0.462* (-1.82) | -0.0365 (-0.16) | 0.317 (1.02) | -0.573** (-2.41) | -0.0462 (-0.14) | 0.373 (1.05) | -0.395 (-1.25) | 0.267 (0.90) | 0.197 (0.65) | -0.632** (-2.19) |
| country | -5.448*** (-11.31) | 1.291*** (3.04) | 2.435*** (5.84) | -5.347*** (-13.18) | 1.298** (2.46) | 2.550*** (6.11) | -4.680*** (-11.66) | 1.389** (2.51) | 2.521*** (4.96) | -5.483*** (-13.13) | 1.079*** (2.60) | 2.646*** (6.81) |
| roa_1 | 1.069 (0.32) | 0.336 (0.11) | -0.444 (-0.17) | -1.018 (-0.36) | 1.878 (0.70) | 0.404 (0.17) | | | | | | |
| lnp_bod_ind | 1.207** (2.15) | -1.006** (-2.12) | 0.585 (0.99) | | | | 1.089* (1.92) | -1.041** (-2.00) | 0.390 (0.63) | | | |
| ceo_turnover (d) | 1.212*** (2.81) | -0.176 (-0.48) | -0.985** (-2.08) | | | | 0.732 (1.64) | -0.0622 (-0.16) | -0.566 (-1.16) | | | |
| shld_fan(d) | -3.613*** (-3.91) | 1.443* (1.65) | 1.507* (1.79) | | | | -3.560*** (-4.22) | 1.517 (1.64) | 1.854* (1.91) | | | |
| WGI | 5.381*** (11.29) | -3.099*** (-5.87) | -0.961** (-2.06) | 5.746*** (11.39) | -3.093*** (-6.36) | -1.530*** (-3.26) | 6.106*** (4.92) | -2.830** (-2.56) | -4.864** (-2.10) | 6.495*** (5.81) | -2.817*** (-2.86) | -4.630*** (-3.43) |
| c.WGI#c.roa_1 | 3.226 (0.88) | -0.980 (-0.29) | -1.602 (-0.54) | 3.320 (1.08) | -0.715 (-0.24) | -3.046 (-1.13) | | | | | | |
| ln_bod_size | | 0.426 (0.39) | | 0.426 (0.39) | -0.244 (-0.25) | 0.958 (0.95) | | | | 0.222 (0.20) | 0.437 (0.42) | 0.433 (0.43) |
| ln_bod_dep | | -1.612*** (-2.59) | | -1.409*** (-3.51) | 1.216** (2.42) | -0.0781 (-0.13) | | | | -1.630** (-2.52) | 1.211** (2.26) | 0.0412 (0.07) |
| ceo_noturnover (d) | | -1.409*** (-3.51) | | -1.566** (-2.40) | 0.0790 (0.23) | 1.194*** (2.74) | | | | -1.062** (-2.50) | -0.0218 (-0.06) | 0.865* (1.95) |
| top_owner_0_50 (d) | | -1.566** (-2.40) | | | 0.492 (0.89) | 0.174 (0.34) | | | | -1.656** (-2.55) | 0.362 (0.65) | 0.459 (0.87) |
| ln_ebit_1 | | | | | | | -0.254 (-1.01) | 0.0351 (0.17) | 0.138 (0.57) | -0.339 (-1.37) | 0.123 (0.63) | 0.204 (0.92) |
| c.WGI#c.ln_ebit_1 | | | | | | | -0.228 (-1.08) | -0.0868 (-0.44) | 0.709** (2.27) | -0.0688 (-0.34) | -0.0547 (-0.30) | 0.577** (2.52) |
| N | 1712 | 1712 | 1712 | 2044 | 2044 | 2044 | 1567 | 1567 | 1567 | 1863 | 1863 | 1863 |
| chi2 | 336.4 | 50.75 | 55.11 | 327.1 | 77.35 | 63.59 | 279.9 | 71.27 | 35.19 | 422.2 | 52.27 | 61.29 |
| ll | -392.9 | -437.0 | -335.8 | -451.4 | -516.6 | -396.5 | -360.9 | -403.4 | -311.7 | -416.1 | -478.9 | -371.8 |
| p | 4.87e-67 | 7.80e-08 | 1.16e-08 | 2.83e-64 | 1.66e-12 | 7.53e-10 | 4.82e-55 | 8.57e-12 | 0.0000552 | 1.79e-84 | 0.00000102 | 2.06e-09 |
| df_m | 9 | 9 | 9 | 10 | 10 | 10 | 9 | 9 | 9 | 10 | 10 | 10 |
| sigma_u | 9.928 | 7.111 | 6.028 | 9.695 | 6.898 | 6.267 | 9.061 | 7.685 | 5.746 | 10.20 | 6.968 | 5.858 |
| rho | 0.968 | 0.939 | 0.917 | 0.966 | 0.935 | 0.923 | 0.961 | 0.947 | 0.909 | 0.969 | 0.937 | 0.913 |

Marginal effects; t statistics in parentheses. (d) for discrete change of dummy variable from 0 to 1. * p<0.1, ** p<0.05, *** p<0.01

Moderated mediation of Cognitive Institutional Perspective through Control and Service Roles

After the prior analyzes, we followed with the mediation models to test the indirect effect of the control and service roles between the firm performance and the CEO duality.

From the results, the model as control role shows that mediation is partial because there are significant levels of direct effects between the firm performances on CEO duality.

The first mediator variable, board independence, exerts a significant indirect effect in the relationship of ROA t-1 and EBIT t-1 on CEO duality, therefore the H1a is fully supported.

This result shows that if the firm performance does not directly affect the leadership structure assumed by the organization, it does have an indirect effect through the independence of the board of directors. However, mediation has two stages, while the prior ROA has an inverse effect on the board control role based on its proportionality of independence; this board independence has a positive effect on the CEO duality.

The interpretation is that the ROA improvement could reduce the need for board independence and as control role; therefore, this would allow the increase of CEO duality as governance leadership structure, as a board member or in the best case, board chair. The results are under a post-crisis context, so it could be an acceptable characteristic for a situation of apparent calm and consolidation of the countries analyzed.

In the case of CEO turnover, as mediator variable, there is no significant indirect effects, neither with the relationship ROA t-1 on the CEO duality nor with ln EBIT t-1 on the CEO duality. Therefore, the H1b is not supported.

This result shows that the CEO turnover has no influence as indirect effect between the prior firm performances on the CEO duality. However, directly the CEO turnover if it generates a negative effect on the CEO duality, so it would be possible to contemplate the possibility of studying later if the CEO turnover significantly reduces the options of CEO duality in the countries studied.

For the last mediator variable, family as shareholder, the finding shows significant indirect effects with ln EBIT t-1 on CEO duality. So the H1c is partially supported.

This result shows that any of the two types of firm performance indirectly affect the CEO duality through the presence of family as shareholder. However, an issue to highlight is that the increase in prior EBIT rather encourages the increase in the presence of family as shareholder. Thus, the results talked more about the earnings obtained by the exercise carried out, which could be associated with the family involvement and therefore its increased presence. Possibly, this presence of family as shareholder has a positive effect on the CEO duality, considering the family participation as CEO and board member or as CEO and chair of the board to have more control in the governance leadership structure.

Indirect effects of prior Firm Performance on CEO duality through Control Role

Number of obs = 1,884 Log pseudolikelihood = -4480.4456

| | Coef. | Robust Std. Err. | z | P> z | [95% Conf. Interval] | |
|---------------------------|---------------|------------------|----------------|--------------|----------------------|---------------|
| ceo_duality <- | | | | | | |
| H1a: lnp_bod_ind | 0.294 | 0.039 | 7.573 | 0.000 | 0.218 | 0.370 |
| H1b: ceo_turnover | -0.156 | 0.055 | -2.859 | 0.004 | -0.263 | -0.049 |
| H1c: shld_fam | 0.352 | 0.040 | 8.892 | 0.000 | 0.274 | 0.429 |
| roa_1 | -0.686 | 0.336 | -2.038 | 0.042 | -1.345 | -0.026 |
| ln_ebit_1 | 0.070 | 0.010 | 6.905 | 0.000 | 0.050 | 0.089 |
| WGI | -0.414 | 0.052 | -7.997 | 0.000 | -0.515 | -0.312 |
| WGIxROA_1 | -0.597 | 0.326 | -1.832 | 0.067 | -1.237 | 0.042 |
| WGIxLnEBIT_1 | 0.079 | 0.010 | 8.096 | 0.000 | 0.060 | 0.098 |
| _cons | 1.542 | 0.082 | 18.893 | 0.000 | 1.382 | 1.702 |
| lnp_bod_ind <- | | | | | | |
| roa_1 | -1.006 | 0.211 | -4.777 | 0.000 | -1.419 | -0.594 |
| ln_ebit_1 | 0.072 | 0.007 | 10.551 | 0.000 | 0.058 | 0.085 |
| WGI | -0.350 | 0.038 | -9.312 | 0.000 | -0.423 | -0.276 |
| WGIxROA_1 | -0.022 | 0.213 | -0.101 | 0.919 | -0.439 | 0.396 |
| H3a: WGIxLnEBIT_1 | 0.021 | 0.007 | 2.950 | 0.003 | 0.007 | 0.035 |
| _cons | -1.422 | 0.037 | -38.577 | 0.000 | -1.495 | -1.350 |
| ceo_turnover <- | | | | | | |
| roa_1 | -0.038 | 0.080 | -0.474 | 0.635 | -0.194 | 0.119 |
| ln_ebit_1 | -0.006 | 0.004 | -1.488 | 0.137 | -0.014 | 0.002 |
| WGI | 0.001 | 0.024 | 0.026 | 0.980 | -0.046 | 0.047 |
| WGIxROA_1 | -0.076 | 0.079 | -0.962 | 0.336 | -0.230 | 0.079 |
| WGIxLnEBIT_1 | 0.001 | 0.004 | 0.133 | 0.894 | -0.008 | 0.009 |
| _cons | 0.141 | 0.022 | 6.353 | 0.000 | 0.098 | 0.185 |
| shld_fam <- | | | | | | |
| roa_1 | -0.587 | 0.116 | -5.045 | 0.000 | -0.816 | -0.359 |
| ln_ebit_1 | 0.027 | 0.005 | 4.946 | 0.000 | 0.016 | 0.037 |
| WGI | -0.020 | 0.027 | -0.741 | 0.458 | -0.072 | 0.033 |
| WGIxROA_1 | 0.134 | 0.102 | 1.319 | 0.187 | -0.065 | 0.333 |
| H3a: WGIxLnEBIT_1 | -0.010 | 0.005 | -1.830 | 0.067 | -0.021 | 0.001 |
| _cons | 0.203 | 0.027 | 7.624 | 0.000 | 0.151 | 0.255 |
| var(e.ceo_duality) | 0.493 | 0.016 | | | 0.463 | 0.525 |
| var(e.lnp_bod_ind) | 0.254 | 0.008 | | | 0.238 | 0.270 |
| var(e.ceo_turnover) | 0.098 | 0.006 | | | 0.088 | 0.110 |
| var(e.shld_fam) | 0.200 | 0.004 | | | 0.192 | 0.209 |

On the other hand, the model as service role shows that mediation is partial because there are significant levels of direct effects between the firm performances on CEO duality. The first mediator variable, board dependence, exerts a significant indirect effect in the relationship of ln EBIT t-1 on CEO duality, whereas in the ROA t-1 on CEO duality there is not, therefore H2a is partially supported.

This result shows that the board dependence, as service role, allows an indirect effect between the prior firm performance and the CEO duality. However, as in the explanation of the previous model, it is necessary to review the stages. On the one hand, the previous EBIT exerts a positive effect on the increasing of board dependence, but then that increase in board dependence reduce the CEO duality, causing CEO to cease to be board chair or member thereof. Thus, this trend means from a perspective in which the service and strategic role represented by greater dependence on the council is easy to interact with non-dual CEOs, since they have less power in a governance leadership structure, allowing more clarity in the role of service and strategic support.

Indirect effects of prior Firm Performance on CEO duality through Service Role

Number of obs = 1,884 Log pseudolikelihood = -5570.2842

| | Coef. | Robust Std. Err. | z | P> z | [95% Conf. Interval] | |
|--|---------------|------------------|---------------|--------------|----------------------|---------------|
| ceo_duality <- | | | | | | |
| ln_bod_size | 0.783 | 0.065 | 12.061 | 0.000 | 0.656 | 0.911 |
| H2a: ln_bod_dep | -0.143 | 0.049 | -2.899 | 0.004 | -0.239 | -0.046 |
| H2b: ceo_noturnover | 0.146 | 0.048 | 3.043 | 0.002 | 0.052 | 0.241 |
| H2c: top_owner_0_50 | -0.027 | 0.034 | -0.801 | 0.423 | -0.093 | 0.039 |
| roa_1 | 0.377 | 0.222 | 1.701 | 0.089 | -0.057 | 0.812 |
| ln_ebit_1 | 0.023 | 0.010 | 2.253 | 0.024 | 0.003 | 0.043 |
| WGI | -0.505 | 0.039 | -12.858 | 0.000 | -0.581 | -0.428 |
| WGIxROA_1 | -0.868 | 0.173 | -5.004 | 0.000 | -1.208 | -0.528 |
| WGIxLnEBIT_1 | 0.080 | 0.008 | 9.739 | 0.000 | 0.064 | 0.096 |
| _cons | -0.103 | 0.104 | -0.991 | 0.321 | -0.307 | 0.101 |
| ln_bod_size <- | | | | | | |
| roa_1 | -1.264 | 0.118 | -10.738 | 0.000 | -1.495 | -1.034 |
| ln_ebit_1 | 0.103 | 0.004 | 24.168 | 0.000 | 0.095 | 0.111 |
| WGI | 0.042 | 0.020 | 2.089 | 0.037 | 0.003 | 0.082 |
| WGIxROA_1 | 0.149 | 0.103 | 1.448 | 0.148 | -0.053 | 0.350 |
| WGIxLnEBIT_1 | -0.010 | 0.004 | -2.254 | 0.024 | -0.018 | -0.001 |
| _cons | 1.746 | 0.021 | 81.799 | 0.000 | 1.704 | 1.788 |
| ln_bod_dep <- | | | | | | |
| roa_1 | -0.146 | 0.128 | -1.142 | 0.254 | -0.397 | 0.105 |
| ln_ebit_1 | 0.050 | 0.006 | 8.224 | 0.000 | 0.038 | 0.061 |
| WGI | 0.188 | 0.029 | 6.499 | 0.000 | 0.131 | 0.244 |
| WGIxROA_1 | -0.320 | 0.111 | -2.888 | 0.004 | -0.538 | -0.103 |
| H3b: WGIxLnEBIT_1 | -0.012 | 0.006 | -2.114 | 0.034 | -0.024 | -0.001 |
| _cons | 1.491 | 0.030 | 49.143 | 0.000 | 1.431 | 1.550 |
| ceo_noturnover <- | | | | | | |
| roa_1 | 0.038 | 0.080 | 0.474 | 0.635 | -0.119 | 0.194 |
| ln_ebit_1 | 0.006 | 0.004 | 1.488 | 0.137 | -0.002 | 0.014 |
| WGI | -0.001 | 0.024 | -0.026 | 0.980 | -0.047 | 0.046 |
| WGIxROA_1 | 0.076 | 0.079 | 0.962 | 0.336 | -0.079 | 0.230 |
| WGIxLnEBIT_1 | -0.001 | 0.004 | -0.133 | 0.894 | -0.009 | 0.008 |
| _cons | 0.859 | 0.022 | 38.571 | 0.000 | 0.815 | 0.902 |
| top_owner_0_50 <- | | | | | | |
| roa_1 | -0.820 | 0.117 | -6.979 | 0.000 | -1.050 | -0.589 |
| ln_ebit_1 | 0.005 | 0.006 | 0.908 | 0.364 | -0.006 | 0.017 |
| WGI | 0.138 | 0.033 | 4.163 | 0.000 | 0.073 | 0.203 |
| WGIxROA_1 | -0.158 | 0.110 | -1.427 | 0.153 | -0.374 | 0.059 |
| WGIxLnEBIT_1 | 0.000 | 0.006 | 0.059 | 0.953 | -0.012 | 0.013 |
| _cons | 0.480 | 0.031 | 15.298 | 0.000 | 0.418 | 0.541 |
| var(e.ceo_duality) 0.485 0.014 0.459 0.513 | | | | | | |
| var(e.ln_bod_size) 0.117 0.004 0.110 0.125 | | | | | | |
| var(e.ln_bod_dep) 0.204 0.008 0.188 0.222 | | | | | | |
| var(e.ceo_noturnover) 0.098 0.006 0.088 0.110 | | | | | | |
| var(e.top_owner_0_50) 0.225 0.003 0.219 0.232 | | | | | | |

In the case of CEO permanence, as mediator variable, there is no significant effects, neither with the relationship ROA t-1 on CEO duality nor with ln EBIT t-1 on CEO duality. Therefore, the H2b is not supported. As in the case of the CEO turnover, as a control role, in the case of the CEO permanence, it does not exercise any significant mediation between the prior firm performance and the CEO duality. However, the CEO non-turnover has a positive direct effect on the CEO duality. Which shows that CEO permanence could potentially determine a trust effect reflected in the possibility to be a board member or board chair, if the country regulations allow it (since in the cases of Chile and Colombia not be allowed).

For the last mediator variable, top owner as non-majority, the finding shows not significant indirect effects with both ROA t-1 and ln EBIT t-1 on CEO duality. So the H2c is not supported.

This would imply a lack of ownership structures in participation with a vision of dependence on resources, involving more principals that could support in the development of new strategies or services in coordination with the agents of the organization.

After the mediation tests, the next test is the moderation effects of the cognitive institutional perspective represented by the integral factor of Worldwide Governance Index.

For the moderation test, we use the results with significance levels in the mediation tests. In order to this, we probe the moderation in the model of board independence between ROA t-1 and CEO duality and in the model of board dependence between ln EBIT t-1 and CEO duality.

According to the results obtained, in the case of the moderation of the cognitive institutional factor towards the mediation of the control role, represented by the independence of the directory, the evidence shows that there are no significant levels of moderating effect in said relationship, so that H3a is supported.

On the other hand, in the case of the moderation of the cognitive institutional factor on the mediation of the service role, represented by the dependency of the directory, the evidence shows that if there are significant levels of negative moderating effect in that relation, so that the H3b is supported.

This last result shows that the cognitive institutional factor interacting with the ln EBIT t-1 reduces the impact of the service role represented by the dependence of the council. This would mean that the context plays a relevant role to the prior firm performance obtained to maintain the board dependence without critical increases thereof. This would allow to maintain a certain CEO duality without resorting critically to the separation of positions in the governance leadership structure.

Discussion

The results are based on the 2093 observations compiled from 2009 to 2015 regarding the companies that list in the stock markets of the countries of Chile, Colombia, Peru, Mexico and Spain.

For the previous tests carried out, other control variables were not considered, such as the industry, the years of the company, as well as its commercial condition. Likewise, in the case of independent variables, Tobin's Q was not used because of the lack of data in several observations for its construction. In the same way, this influenced the use of other control variables such as the market-to-book or the book-to-market or the share return.

Regarding the procedures performed, although the full categories were used for the direct effects tests, tests with the aforementioned control variables could be performed, controlling the robustness and multicollinearity of the models. In the case of mediation models, the variables used as part of the control and service roles could be expanded. Which would allow a better overview of the variables that each role could represent to be evaluated.

On the side of moderation one of the limitations was the use of the complementary platform to the SPSS, since it only accepted continuous mediating variables, so that only the variables of independence, size and dependence of the directory could be effective. Because the other variables regarding the ownership structure, they were defined as dichotomous variables.

Due to the high degree of significant correlation of the macro level variables that defined the cognitive institutional perspective, these had to be reduced to a single dimension by factorization. For other studies, the variables could be identified that do not correlate with each other but with the other mediating or dependent variables of the model to perform tests in greater detail.

This research allows to see a new threshold in the study of the background of the CEO duality, using the combination of roles and the moderation of macro-level factors, allowing future multilevel studies.

Conclusions

The study gives a new gate of how the prior firm performance affects, as predictor, the governance leadership structure represented by CEO duality, but indirectly through variables of governance internal mechanism that may be related to the control role or the service role. From these studies, together with the previous tests, mediation is possible. Mediations as strategic and control roles are supported in this study. The first results of direct effects discard significant levels of the prior firm performance on the CEO duality. However, for the mediation model based on the control role, board independence as well as the presence of family as shareholder have significant levels of full mediation effects of the prior firm performance on the CEO duality.

In the same way, for the model based on the service role, the board size with the board dependence, as well as the presence of top owner non-majority, present significant levels of partial mediation effects between the prior firm performances on CEO duality. Likewise, in the case of moderation only in the model based on the service role, the presence of moderation on the part of the cognitive institutional factor is evidenced

References

- Aguilera, R. V., Judge, W. Q., & Terjesen, S. A. (2018). Corporate governance deviance. *Academy of Management Review*, 43(1), 87–109. <https://doi.org/10.5465/amr.2014.0394>
- Aguilera, R. V., Kabbach de Castro, L. R., Lee, J. H., & You, J. (2012). Corporate Governance in Emerging Markets. In R. Whitley & G. Morgan (Eds.), *Capitalisms and Capitalism in the 21st Century* (p. 38). Oxford: Oxford University Press. <https://doi.org/10.1007/978-3-642-44955-0>
- Aoki, M. (2010). *Corporations in Evolving Diversity: Cognition, Governance, and Institutional Rules*. *Corporations in Evolving Diversity: Cognition, Governance, and Institutional Rules*. New York: Oxford University Press. <https://doi.org/10.1093/acprof:oso/9780199218530.001.0001>
- Arbeláez García, D., & Rosso, J. (2016). Seasonal effects on capital stock markets of the Pacific Alliance. *Estudios Gerenciales*, 32, 358–368. [https://doi.org/10.1016/S0123-5923\(13\)70015-9](https://doi.org/10.1016/S0123-5923(13)70015-9)
- Balsam, S., Puthenpurackal, J., & Upadhyay, A. (2016). The Determinants and Performance Impact of Outside Board Leadership. *Journal of Financial and Quantitative Analysis*, 51(4), 1325–1358. <https://doi.org/10.1017/S0022109016000570>
- Beatty, R. P., & Zajac, E. J. (1994). Top management incentives , monitoring , and risk bearing : a study of executive compensation , ownership , and board structure in initial public offerings. *Administrative Science Quarterly*, 39(2), 313–335. <https://doi.org/10.2307/2393238>
- Bergh, D. D., Aguinis, H., Heavey, C., Ketchen, D. J., Boyd, B. K., Su, P., ... Joo, H. (2016). Using Meta-Analytic Structural Equation Modeling to Advance Strategic Management Research: Guidelines and and Empirical Illustration via the Strategic Leadership-Performance Relationship. *Strategic Management Journal*, 37(3), 477–497. <https://doi.org/10.1002/smj.2338>
- Briano-Turrent, G. del C., & Poletti-Hughes, J. (2017). Corporate governance compliance of family and non-family listed firms in emerging markets: Evidence from Latin America. *Journal of Family Business Strategy*, 8(4), 237–247. <https://doi.org/10.1016/j.jfbs.2017.10.001>
- Briano-Turrent, G. del C., & Rodríguez-Ariza, L. (2016). Corporate governance ratings on listed companies: An institutional perspective in Latin America. *European Journal of Management and Business Economics*, 25(2), 63–75. <https://doi.org/10.1016/j.redeen.2016.01.001>
- Brickley, J. A. (2003). Empirical research on CEO turnover and firm-performance: A discussion. *Journal of Accounting and Economics*, 36(1–3 SPEC. ISS.), 227–233. <https://doi.org/10.1016/j.jacceco.2003.09.003>
- Brickley, J. A., Coles, J. L., & Jarrell, G. (1997). Leadership structure: Separating the CEO and Chairman of the Board. *Journal of Corporate Finance*, 3(3), 189–220. [https://doi.org/10.1016/S0929-1199\(96\)00013-2](https://doi.org/10.1016/S0929-1199(96)00013-2)
- Chong, A., & Lopez-de-Silanes, F. (2004). Privatization in Latin America: What Does the Evidence Say? *Economía*, 4(2), 37–111. <https://doi.org/10.1353/eco.2004.0013>
- Chong, A., & Lopez-de-Silanes, F. (2007). *Corporate Governance in Latin America* (Research Department No. 591). *Inter-American Development Bank*. New York. Retrieved from <http://services.iadb.org/wmsfiles/products/Publications/1158678.pdf>
- Coase, R. (1998). The New Institutional Economics. *The American Economic Review*, 88(2), 72–74. Retrieved from <http://www.jstor.org/stable/116895>
- Cueto, D. C. (2010). Corporate governance and ownership structure in emerging markets: Evidence from Latin America. *Banking and Capital Markets: New International Perspectives*, 341–372. https://doi.org/10.1142/9789814273619_0013
- Dacin, M. T., Goodstein, J., & Scott, W. R. (2002). Institutional Theory And Institutional Change: Introduction to The Special Research Forum. *Academy of Management Journal*, 45(1), 45–57.
- Daily, C. M. (1995). The Relationship Between Board Composition and Leadership Structure and Bankruptcy Reorganization Outcomes. *Journal of Management*, 21(6), 1041–1056. <https://doi.org/10.1177/014920639502100602>
- Daily, C. M., & Dalton, D. R. (1992). The Relationship between Governance Structure and Corporate Performance in Entrepreneurial Firms. *Journal of Business Venturing*, 7, 375–386. <https://doi.org/0883-9026/92>
- Daily, C. M., & Dalton, D. R. (1993). Board of Directors Leadership and Structure: Control and Performance Implications. *Entrepreneurship Theory and Practice*, 17, 65–81. [https://doi.org/10.1016/S0001-2092\(07\)68419-1](https://doi.org/10.1016/S0001-2092(07)68419-1)
- Daily, C. M., Dalton, D. R., & Cannella Jr., A. A. (2003). Corporate Governance: Decades of Dialogue and Data. *Academy of Management Review*, 28(3), 371–382. <https://doi.org/10.5465/AMR.2003.10196703>

- Daily, C. M., Dalton, D. R., & Rajagopalan, N. (2003). Governance through Ownership: Centuries of Practice, Decades of Research. *Academy of Management Journal*, 46(2), 151–158. <https://doi.org/10.2307/30040611>
- Dalton, D. R., Daily, C. M., Ellstrand, A. E., & Johnson, J. L. (1998). Meta-Analytic Reviews of Board Composition, Leadership Structure, and Financial Performance. *Strategic Management Journal*, 19(3), 269–290. <https://doi.org/0143-2095/98/030269-22>
- Dalton, D. R., & Dalton, C. M. (2011). Integration of Micro and Macro Studies in Governance Research: CEO Duality, Board Composition, and Financial Performance. *Journal of Management*, 37(2), 404–411. <https://doi.org/10.1177/0149206310373399>
- Dastis, A. (2017). España y la Alianza del Pacífico. *El Pais*, pp. 1–3. Retrieved from https://elpais.com/elpais/2017/09/19/opinion/1505847484_936918.html
- Davidson III, W. N., Worrell, D. L., & Nemec, C. (1998). CEO Duality , Succession-Planning and Agency Theory: Research Agenda. *Strategic Management Journal*, 19(9), 905–908. <https://doi.org/0143-2095/98/090905-04>
- DiMaggio, P. J., & Powell, W. W. (1983). The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields. *American Sociological Review*, 48(2), 147–160.
- Drees, J. M., & Heugens, P. P. M. A. R. (2013). Synthesizing and Extending Resource Dependence Theory: A Meta-Analysis. *Journal of Management*, 39(6), 1666–1698. <https://doi.org/10.1177/0149206312471391>
- Eisenhardt, K. M. (1989). Agency Theory: and Assessment Review. *Academy of Management Review*, 14(1), 57–74. Retrieved from <http://www.jstor.org/stable/258191>
- Fama, E. F. (1980). Agency Problems and the Theory of the Firm. *Journal of Political Economy*, 88(2), 288–307. Retrieved from <http://www.jstor.org/stable/1837292>
- Finkelstein, S., & D’Aveni, R. A. (1994). CEO Duality as a Double-Edged Sword: How Boards of Directors Balance Entrenchment Avoidance and Unity of Command. *Academy of Management Journal*, 37(5), 1079–1108. Retrieved from <http://www.jstor.org/stable/256667>
- Galve-Górriz, C., & Hernández-Trasobares, A. (2015). Institutional framework, concentration of ownership and results of large family corporations in Latin America and Spain. *Corporate Governance: The International Journal of Business in Society*, 15(4), 409–426. <https://doi.org/10.1108/CG-12-2014-0144>
- Goyal, V. K., & Park, C. W. (2002). Board leadership and CEO turnover. *Journal of Corporate Finance*, 8, 49–66. [https://doi.org/10.1016/S0929-1199\(01\)00028-1](https://doi.org/10.1016/S0929-1199(01)00028-1)
- Harrison, J. R., Torres, D. L., & Kukalis, S. (1988). The Changing of the Guard: Turnover and Structural Change in Top Management Positions. *Administrative Science Quarterly*, 33(2), 211–232. <https://doi.org/10.2307/2393056>
- Hillman, A. J., Cannella Jr., A. A., & Paetzold, R. L. (2000). The resource dependence role of corporate directors: strategic adaptation of board composition in response to environmental change. *Journal of Management Studies*, 37(March), 235–256. <https://doi.org/DOI: 10.1111/1467-6486.00179>
- Hillman, A. J., & Thomas, D. (2003). Boards of Directors and Firm Performance: Integrating Agency and Resource Dependence Perspectives. *Academy of Management Review*, 28(3), 383–396. <https://doi.org/10.5465/AMR.2003.10196729>
- Hillman, A. J., Withers, M. C., & Collins, B. J. (2009). Resource dependence theory: A review. *Journal of Management*, 35(6), 1404–1427. <https://doi.org/10.1177/0149206309343469>
- Intintoli, V. J., Zhang, A., & Davidson, W. N. (2014). The impact of CEO turnover on firm performance around interim successions. *Journal of Management and Governance*, 18(2), 541–587. <https://doi.org/10.1007/s10997-012-9253-2>
- Iyengar, R. J., & Zampelli, E. M. (2009). Self-selection, endogeneity, and the relationship between ceo duality and firm performance. *Strategic Management Journal*, 30(10), 1092–1112. <https://doi.org/10.1002/smj.776>
- Jensen, M. C., & Meckling, W. H. (1976). Theory of the Firm: Managerial Behavior, Agency Costs and Ownership Structure. *Journal of Financial Economics*, 3(4), 305–360. [https://doi.org/http://dx.doi.org/10.1016/0304-405X\(76\)90026-X](https://doi.org/http://dx.doi.org/10.1016/0304-405X(76)90026-X)
- Johnson, J. L., Daily, C. M., & Ellstrand, A. E. (1996). Boards of Directors: A Review and Research Agenda. *Journal of Management*, 22(3), 409–438. <https://doi.org/10.1177/014920639602200303>
- Kabbach de Castro, L. R., Crespi-Cladera, R., & Aguilera, R. V. (2013). Corporate Ownership in Latin American Firms: A Comparative Analysis of Dual-Class Shares. In *Academy of Management Proceedings* (Vol. 1, pp. 1–60). Academy of Management. <https://doi.org/10.5465/AMBPP.2013.11130abstract>
- Krause, R., & Semadeni, M. (2013). Apprentice, Departure, and Demotion: An Examination of the Three Types of CEO-Board Chair Separation. *Academy of Management Journal*, 56(3), 805–826. <https://doi.org/10.5465/amj.2011.0121>

- Krause, R., Semadeni, M., & Cannella, A. A. (2014). *CEO Duality: A Review and Research Agenda*. *Journal of Management* (Vol. 40). <https://doi.org/10.1177/0149206313503013>
- Lagos Cortés, D., & Botero, I. C. (2016). Corporate governance in family businesses from Latin America, Spain and Portugal. *Academia Revista Latinoamericana de Administración*, 29(3), 231–254. <https://doi.org/10.1108/ARLA-03-2016-0064>
- Linck, J. S., Netter, J. M., & Yang, T. (2008). The determinants of board structure. *Journal of Financial Economics*, 87(2), 308–328. <https://doi.org/10.1016/j.jfineco.2007.03.004>
- Lynall, M. D., Golden, B. R., & Hillman, A. J. (2003). Board Composition from Adolescence to Maturity: A Multitheoretic View. *Academy of Management Review*, 28(3), 416–431. Retrieved from <http://www.jstor.org/stable/30040730>
- Meijerink, G. W. (2011). New institutional economics: Douglass North and Masahiko Aoki. In Sietze Vellema (Ed.), *Transformation and sustainability in agriculture* (pp. 21–33). <https://doi.org/10.3920/978-90-8686-717-2>
- Nakpodia, F., & Adegbite, E. (2018). Corporate governance and elites. *Accounting Forum*, 42(1), 17–31. <https://doi.org/10.1016/j.accfor.2017.11.002>
- North, D. C. (1986). The New Institutional Economics. *Journal of Institutional and Theoretical Economics*, 142(1), 230–237. Retrieved from <http://www.jstor.org/stable/40726723>
- North, D. C. (1990). *Institutions, Institutional Change and Economic Performance* (1st ed.). Cambridge: Cambridge University Press.
- Parrino, R. (1997). CEO turnover and outside succession a cross-sectional analysis. *Journal of Financial Economics*, 46(2), 165–197. [https://doi.org/10.1016/S0304-405X\(97\)00028-7](https://doi.org/10.1016/S0304-405X(97)00028-7)
- Pelayo-Maciél, J., & Sánchez-Gutierrez, J. (2013). The Institutional Context of Corporate Governance Structure that Generates Collaborative Practices and Distinctive Competencies in Human Resources : A Study of Mexico and Colombia. *Competition Forum*, 11(2), 102–110. Retrieved from <https://www.questia.com/library/journal/1P3-3919166481/the-institutional-context-of-corporate-governance>
- Pfeffer, J., & Salancik, G. R. (1978). *The external control of organizations: A resource dependence approach*. NY: Harper and Row Publishers. <https://doi.org/10.2307/2392573>
- Powell, W. W., & DiMaggio, P. J. (1991). *The New Institutionalism in Organizational Analysis*. Chicago, Illinois: University of Chicago Press.
- Sáenz González, J., & García-Meca, E. (2014). Does Corporate Governance Influence Earnings Management in Latin American Markets? *Journal of Business Ethics*, 121(3), 419–440. <https://doi.org/10.1007/s10551-013-1700-8>
- Scott, W. R. (1995). *Institutions and Organizations*. London: Sage Publications. <https://doi.org/10.1109/MPER.2002.4312460>
- Selznick, P. (1948). Foundations of the Theory of Organization. *American Sociological Review*, 13(1), 25–35.
- Selznick, P. (1996). Institutionalism “Old” and “New.” *Administrative Science Quarterly*, 41(2), 270–277. <https://doi.org/10.2307/2393719>
- Shapiro, S. P. (2005). Agency Theory. *Annual Review of Sociology*, 31(1), 263–284. <https://doi.org/10.1146/annurev.soc.31.041304.122159>
- Shleifer, A., & Vishny, R. W. (1997). A Survey of Corporate Governance. *The Journal of Finance*, 52(2), 737–783. Retrieved from <http://www.jstor.org/stable/2329497>
- Tuggle, C. S., Sirmon, D. G., Reutzel, C. R., & Bierman, L. (2010). Commanding Board of Director Attention: Investigating How Organizational Performance and CEO Duality affect Board Members’ Attention to Monitoring. *Strategic Management Journal*, 31(9), 946–968. <https://doi.org/10.1002/smj.847>
- Wiersema, M. F., & Moliterno, T. P. (2015). CEO Turnover in the New Era: A Dialogue with the Financial Community. *Ecology and Strategy*, 23, 137–173. <https://doi.org/http://dx.doi.org/10.1108/MRR-09-2015-0216>
- Williamson, O. E. (2000). The New Institutional Economics: Taking Stock, Looking Ahead. *Journal of Economic Literature*, XXXVIII(September), 595–613.
- Zahra, S. A., & Pearce II, J. A. (1989). Boards of Directors and Corporate Financial Performance: A Review and Integrative Model. *Journal of Management*, 15(2), 291–334. <https://doi.org/10.1177/014920638901500208>