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The Effect of Incentive Structure Offered to Top Executives and Corporate Governance Culture on the Performance of Publicly Listed Companies in Saudi Arabia.

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هذه الدراسة تم تمويلها من هيئة السوق المالية

The Effect of Incentive Structure Offered to Top Executives and Corporate Governance Culture on the Performance of Publicly Listed Companies in Saudi Arabia.

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Abstract

The question as to what determines the performance of a business has always intrigued researchers and investors alike. There is a plethora of empirical and theoretical research that looks at different aspects of the factors which drive the performance of a business firm or a company. An important strand of the literature looks at the relationship between incentives offered to the company's top managers/executives and performance. This report provides an overview of the incentives offered to the top five executives in publicly listed companies in Saudi Arabia and investigates its impact on their performance as well as the role played by regulatory regimes. The majority of the companies offers short-term contracts, but the executives tend to stay longer than the duration of the standard contract. About a quarter of the companies believe that their top executives' salary is below their local competitors and about one in every ten companies believe that their top executive salary is better than their competitors, which is positively related to performance. Most of the companies offer incentive structures that focus on short term interest of the shareholders which is found to have a positive impact on performance. Around 15% of the firms offer long term bonuses in our sample. These companies, however, tend to consistently outperform companies which do not offer retention bonuses and the effect is more pronounced than the short-term incentives. Majority of the companies do not offer stockownership as part of the incentive scheme, but a good number has reported stockownership by top executives as a personal investment which has a positive impact on performance. Around two-thirds of the companies reported that they offer bonuses to non-executive employees with a complex set of criteria to award bonuses. Interestingly, this has a significant negative impact on performance which points toward problems underlying these incentives schemes, Saudi companies do not offer any stock-option as part of the incentive scheme which is getting popular these days around the world.

Introduction

The Saudi economy is currently going through a major transformation. The country is making serious efforts to attract investment from local as well as foreign investors to diversify its economy. On the one hand, it is opening up its stock market to the rest of the world and on the other hand, it is making a transition from private to public ownership. Whereas these are steps in the right direction, these efforts need to be complemented with research which promotes a greater understanding of deeper determinants of performance, including incentives offered to executives as well as the nature of a regulatory environment which attracts investors. In this research, we explore the relationship between compensation offered to executives and the performance of a company listed in the Saudi Stock Exchange as well as the role played by regulatory regimes. The objective is to identify incentive schemes which work best in the Saudi environment as well as explore the synergic impact of good corporate practices. We aim to explore empirical evidence to support the relationship between good corporate governance and positive firm performance in publicly traded companies in Saudi Arabia to encourage the adoption of transparent and clear governance principles and effective incentive structure.

Corporate governance is becoming more important than ever in the modern business world. Capital markets around the world are fraught with peril for investors, amplified by the separation of ownership and control observed in public corporations. The transformational evolution in the United States led a seismic shift in the late nineteenth century, on the economic and social fronts, giving rise to giant corporations, making the country a major economic power (Sicilia, 2001). Consequently, conflict of interest between shareholders and management grew as capitalism boomed. Economic expansions revolutionized financial markets around the globe, introducing new corporate structures to meet the fast-paced economic growth. Rapid reformation of capital markets has triggered the need for regulatory frameworks to align shareholders' interests with those of the management, especially after waves of financial crises washed over many countries. A public opinion survey conducted five years after the 2008 global financial crisis revealed slipping confidence in the Wall Street. In addition, major corporations and financial institutions received much of the blame for the market crash (Bowman & Rugg, 2013). Moreover, corporations' financing needs grow in complexity and continue to intertwine, which lead to a greater breadth and depth in global market structures, along with greater financial fragility. As a result, there is a greater need for corporations to adopt sound corporate governance practices to protect the rights of shareholders and maintain financial stability and sustainable profitability.

Determined to achieve the targets set in the 2030 vision, the Saudi economy is currently going through a major transition. The stock market is opening up to the rest of the world and, at the same time, a growing number of private companies are going public. The number of companies listed in the Saudi stock exchange, Tadawul, has increased in the last decade or so and the trend is expected to continue as the country is pushing for diversification away from oil to other sectors. Established in 2003, there are around 174 listed companies in Tadawul. The list is expected to grow significantly over time. Tadawul has the potential to play a critical role in raising capital to support the long-term growth objectives set out in the 2030 vision.

Good governance is the key for Saudi companies in this transition; particularly, when family-run businesses are to be integrated into the global market, and the country is moving toward attracting international investors for big projects as part of the 2030 Vision. For instance, the recent inclusion of Tadawul into FTSE Russell's emerging market index is expected to draw billions of dollars of fresh foreign portfolio investment to the Kingdom. It may not be possible to attract global investors without good corporate governance practices. That is because good governance provides assurance for long-term profitability and sustainability. It gives a positive signal to outside investors to earn their trust. Therefore, it is absolutely essential to develop sound corporate governance (CG) assessment tool to monitor and promote good governance among Saudi corporations and businesses.

The ultimate objective behind good corporate governance is to align the interest of different groups toward the best use of resources for an efficient outcome and sustainable profitability. Thus, the incentive structure plays a crucial role in accomplishing this objective. It is a well-known tool to overcome the principal-agent problem. The relationship between a shareholder and the CEO of a company is that of a principal and an agent in a principal-agent problem. Whereas the shareholder's objective is to get the manager to work in his best interest by maximizing his value (shareholder maximization objective), the CEO is a rent seeker who maximizes his own benefit (rent-maximization approach). As is well known, it is hard for the principal (shareholder) to monitor the agent (manager of the company) and he may not work in the best interest of the shareholder. In practice, there are typically two ways to mitigate this problem: (i) design an incentive scheme which induces the agent to work in the best interest of the principal, and (ii) resort to a regulatory/monitoring scheme which obliges the agent to work in the best effort of the principal. The latter manifests itself in best practices in the form of corporate governance rules as well as the reward and punishment regulations. It is, for example, critical to understand as to who designs the CEO incentive. If it is the CEO himself/herself,

he/she is more likely to design an incentive scheme which maximizes his/her rent. Alternatively, if it is not the CEO but the compensation scheme is mostly consistent with the rent-extraction objective as opposed to the shareholder value objective, the regulatory system has flaws which allow the CEOs to influence the CEO compensation. Addressing these sorts of gaps is critical to a sustainable performance of the companies listed on the stock market which has the potential to play an important role in contributing to the 2030 vision as this helps the private sector to grow at a sustainable pace.

The top executive's incentive scheme is a very important tool in modern corporate management in order to align the interest of shareholders and top executives. Therefore, we see a great value in exploring the relationship between good corporate governance and good incentive structure in respect to their impact on company's financial performance and sustainability. In this study, we use the CGI scores measured by Alfaisal University Corporate Governance Center in addition to publicly available data and survey data on the compensation schemes to explore the stated objectives.

Alfaisal University established a center for corporate governance, namely the Corporate Governance Center, two years ago to assess listed Saudi companies in terms of their compliance and culture of good governance principles. They define corporate governance in a comprehensive manner covering rules, structure, processes, practices, and reporting in regard to board of directors, shareholders' rights, public disclosure & transparency, and stakeholders' rights. The corporate governance index (CGI) is based solely on good CG principles set by the Saudi Capital Market Authority (CMA), Saudi Arabian Monetary Authority (SAMA), and the Organization for Economic Co-operation and Development (OECD).

We conduct a major survey to gather information about incentive structure and study their impact on company performance while controlling for governance principles and practices. In order to examine the impact of corporate governance practices and executives' compensation on the Saudi listed companies, it is ideal to identify different variables that might have an impact on the performance. We will provide a brief discussion of the literature on this subject before exploring our methodology, data, and findings. Our survey shows that the majority of the companies offer short-term contracts, but contracts are regularly extended as top executives stay longer than the duration of the standard contract. We find that the contract

duration and the length of the time top executives stay with a company has no impact on the performance of a company.

Most of the companies offer incentive structures that focus on short term interest of the shareholders. Around 15% of the firms offer long term bonuses in our sample. The short-term incentives have a positive impact on performance. These companies, however, tend to consistently outperform companies which do not offer retention bonuses. The majority of the companies do not offer stockownership as part of the incentive scheme, but a good number has reported stockownership by top executives as a personal investment. Around two-thirds of the companies reported that they offer bonuses to non-executive employees with a complex set of criteria to award bonuses. Interestingly, this has a significant negative impact on performance. We discuss this further in the text. Saudi companies do not offer any stock-option as part of the incentive scheme which is getting popular these days.

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About a quarter of the companies believe their top five executive's salary is below their local competitors and nearly one in every ten company believe that their top executive salary is better than their competitors. We find some evidence in favor of Akerlof's gift-exchange which means that top executives with higher salaries tend to perform better.

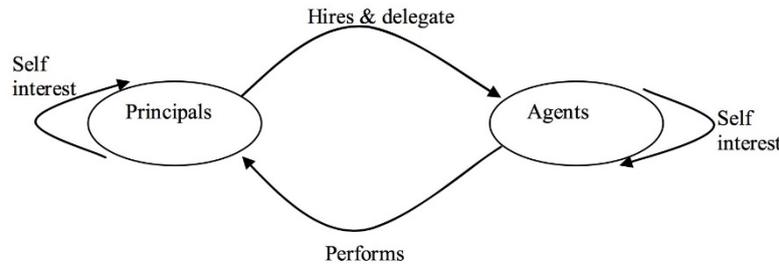
Theoretical Framework

Berle and Means' (1932) work on the modern corporations of the twentieth century and their evolution generated a great interest in the area, especially with the onset of the Great Depression in the United States. In the *Modern Corporation and Private Property*, the authors argue that as the influence and size of American corporations increased, they became more isolated from shareholders and society as a whole. The main revelation was the apparent separation of ownership and control exhibited by large American corporations and the scope and impact of this divide. Over time, decision-making shifted to managers and away from shareholders, who became more dispersed. Managerialism emerged as a hallmark of modern capitalism. A small group of insiders would control giant corporations, without bearing risks of equivalent proportions or possessing any claims on the property. Berle and Means contend that this separation has allowed managers to misuse the firm's resources for their own private gain.

Because their claims on the property are minimal, managers have the incentive and opportunity to seize control and pursue their own interest at the expense of the owners, especially when it is costly and time-consuming for shareholders to monitor management. These actions, according to the authors, lead to severe repercussions. When the interests of the managers are not aligned with those of the shareholders, divergent behavior is expected to manifest, as managers will not always act in the best interest of the shareholders, whose main objective is wealth maximization. Shareholders will bear the costs arising from such conflict.

The costs associated with the divide of ownership and control has been labeled by Jensen and Meckling (1976) as agency costs resulting from an agency problem between principals and agents. Although academics have previously noted the existence of such a problem, it was Jensen and Meckling who first developed a thorough framework to explore the agency costs associated with the principal-agent problem (Abdullah & Valentine, 2009). The principals are the owners of the company, who hire managers and directors as agents to run and operate the firm on their behalf. Under this contract, decision-making is delegated to the agent. Figure 1 illustrates the relationship between agent and principal.

Figure 1: The Agency Model



Agents are self-serving, with individualistic and opportunist tendencies. As a result, shareholders will incur losses, known as agency costs, arising from this divergence. Agency costs can be divided into 3 types: (1) monitoring costs, (2) bonding costs, and (3) residual loss (Jensen & Meckling, 1976).

It has long been thought that only shareholders' interests matter because they are the owners of capital, and hence corporations should focus solely on profit maximization. This approach was endorsed by Nobel Laureate Milton Friedman (1970). He asserted that businesses have no other obligations than to their shareholders, who desire to maximize their wealth. He maintained that business does not have social responsibilities towards the general public, as long as they abide by the law and are ethical. The shareholder theory of corporate governance became widely popular in the business world as the dominant view in business management.

Agency theory predicts two types of conflicts: Type I and Type II. Type I agency conflict captures the conflict of interests between managers and shareholders (Jensen and Meckling, 1976) while Type II captures the conflicts between controlling and non-controlling shareholders (Sheifer and Vishny 1997; La Porta et al. 1999). The controlling shareholders might collaborate with managers to pursue their own private benefits rather than promoting overall company performance.

Two leading solutions to agency conflicts are 'optimal contracting' and 'managerial power' approaches. According to optimal contracting theory, a good contract that aligns the interests of executives and shareholders help overcome the agency problem (Jensen and Murphy, 1990, 2010; Core et al., 2001). The success of the contract is determined by pay and performance sensitivity. On the other hand, managerial power theory suggests that powerful managers with a tie to the board might push for excessive compensation and incentives without strong link to company performance (Muslu, 2010; Morse et al., 2011). Thus, good governance could provide help to assure optimal contracting and prevent abuse of managerial power.

An alternate and more inclusive paradigm is the stakeholder theory of corporate governance. This theory emerged in 1984, popularized by R. Edward Freeman. This framework views corporations as having a higher purpose, one that is beyond generating returns on invested capital (Freeman, 1984). The activities of a business can affect and be affected by various stakeholders, other than shareholders. The theory incorporates additional stakeholders, such as customers, employees, and the community, whose interests should be taken into consideration. This updated framework goes above and beyond wealth creation and emphasizes the moral obligations of other stakeholders. To achieve long-term success, corporations must operate in a way that balances the interests of multiple stakeholder groups. This leads to a transition from shareholder primacy frameworks to a more holistic approach has in the business world (Laplume, Sonpar, & Litz, 2008).

This, however, is contingent upon a sustainable performance of the companies listed on Tadawul. This largely depends upon the behavior of top managers/CEOs and the regulatory environment of the country. It is widely believed that the top managers/CEO behavior is shaped by the incentive schemes in place as well as the powers vested on them by the regulatory system and rules of the game set and imposed by regulatory regimes. Poor incentive schemes may tend top managers to seek short term gains for the company at the expense of long-term sustainability or protecting their own self-interest at the expense of the shareholders. Optimal incentive schemes, on the other hand, promote the welfare of all stakeholders without compromising the best interest of the shareholders. We find evidence in favor of the stakeholder theory as our result shows that companies which care about rights of the stakeholders tend to perform better.

Literature Review and Hypotheses

Incentive Structure for Top Executives and Performance

Corporations are required to disclose the executive compensation details to the public as doing so direct the attention of the public to the performance of the managers at the helm. The attention then welcomes scrutiny and criticism, which encourage the employees to work diligently and perform better in all their responsibilities. Therefore, while the attention of the public turns to the executive, the subjects change their perspectives to their employer and responsibilities, thus executing strategies that improve corporate governance and overall performance through strategic management and strategies. However, giving very high bonuses

to executives without any cap leads to the fairness argument among various stakeholders. There are attempts to curb the executive pay or even remove the stock-based compensation option so that the executive can reduce the costs of management (Core, Holthausen, & Larcker, 1999). However, such attempts are likely to expose the organizations to less productive managers who will not go out of their way to introduce better corporate governance that would enhance profitability and good performance (Epps & Cereola, 2008). Like the public debate, the research provides mixed findings in terms of the value-added of executive incentives.

According to agency theory, executive pay and firm performance shall be strongly related because managers who are driven by self-interest are likely to do their best when their interests are aligned with the interests of shareholders through incentives linked to firm performance (Fama & Jensen, 1983). Overall, the literature does support this expectation. For instance, a multi-level meta-analysis of various countries provides evidence for the positive relationship between pay structure and performance (Van Essen, Heugeness, Otten, and Van Oosterhout (2012).

In the literature, the relationship between executive pay and company performance is generally measured through pay-performance sensitivity which is defined as the change in CEO wealth in relation to one-dollar change in the shareholder wealth (Jensen and Murphy, 1990b). Pay performance sensitivity has been well studied for developed countries with overwhelming evidence for a positive relationship. Most of those studies rely on the data from USA and UK (Jensen and Murphy, 1990; Hubbard and Palia, 1995). However, the relationship is not robust for emerging markets. Indeed, some researchers even argue that optimal contracting for developed countries might not be optimum in developing countries (Ball et al., 2000). The argument is that in developing countries, families of founders or controlling shareholders are likely to intervene in selecting executives based on favoritism or nepotism rather than performance and qualification. Thus, company executives working with connected board members might abuse their power to build up their wealth at the cost of shareholders (Ghosh, 2006; Luo, 2015). Countries with governance structure are likely to have higher pay-performance sensitivity compared to those with weak governance, higher family ownership, and strong political influence (Luo, 2015).

Studies, using the data from emerging markets, provide weaker evidence for the positive impact of executive incentives on company performance. For instance, a study (Bonsu, 2016) explore the listed companies in six emerging countries found no relationship between CEO cash

compensation and performance. Though the same study reported the positive impact of other incentives as performance boosters for certain companies.

Core, Holthausen, and Larcker (1997) note the importance of executive pay in order to assure that managers (the agent) handle resources in the optimum manners on behalf of the shareholders (the principal). They point to higher salaries and share-based bonuses for the top executives in recent decades. They particularly highlight the importance of share-based compensation rather than a fixed salary for CEOs to assure higher performance and profitability. Jensen and Murphy (1990) found that despite the common practices of giving high bonuses to top executives in modern times, the sheer presence of incentives is not sufficient to produce the desired outcomes. The types of incentives and particularly their connections to the company's performance make a big difference. For instance, companies could offer different incentives such as cash, stock options, and inside stock ownership, or mixed package of various incentives. The more they are connected to the company performance, the more likely they are to take exert effort in serving the shareholders' interest. The same study finds that the ineffectiveness of most CEO bonuses is due to their weak connections to the company performance.

Indeed, other studies reveal a strong connection between making executives to be shareholders and their performance. For instance, Joh Wook (2003), using 5,829 Korean firms subject to outside auditing during 1993-1997, found out that providing ownership options to the controlling shareholders resulted in better performance in comparison with firms that have lower levels of such ownership. The study pointed to the transferring resources from one subsidiary to another as a contributing factor to the low profitability in the case of low ownership concentration. Likewise, Albassam (2014) confirms similar findings for the 80 listed companies using the data from 2014 to 2010. Both studies conclude that the more shares executives hold, the more they care about the company's performance as maximizing the company's profit maximizes their own profits as well.

Some studies reported no or even negative relationship between ownership concentration. For instance, using the data from highly concentrated ownership, the relatively large government stake in listed firms of the GCC region, Abdallah & Ismail (2017) finds that performance deteriorates when the level of ownership concentration increases by up to 10%. Yet, this inverse relationship does not resume when the ownership concentration exceeds 20%. The study

concludes that the positive impact of good governance is experienced in the case of dispersed ownership rather than a concentrated one.

The effect remuneration packages can have on the profitability and valuation of a firm differ in the literature. For instance, using panel data for the 1992-2005 period of the Australian bank executives, Doucouliagos, Haman, & Askary (2007), found no evidence of short-term impact of executive pay on the firm's performance, yet there is an association of executives pays and financial performance when testing the data for 2 years or more. Similarly, using the data from 2008-2012, Fallatah (2015) found a significant positive relationship between the firm's performance when measured by ROE and ROA and the executives' pay, that is, this relationship is dominating the Saudi market when it comes to determining remuneration packages. However, Nahar Abdullah (2006) found when examining the Malaysian market that the profitability of a firm, when measured by return on assets (ROA), does not associate with executive pay. Although it does associate with the growth of the firm and its size.

H1: There is a positive relationship between the executive's incentives and performance

We explore, different aspect of this relationship and try to answer questions such as; does the level of base wage play any role?; does a short-term incentive structure deliver as good results as long-term incentive structures?; and more basically are there any performance-based incentive schemes or features which are counterproductive?

Corporate Governance and Financial Performance:

Some studies explore the overall impact of good governance in terms of compliance with certain principles and following best practices while others examine the relationship between a particular component of corporate governance and financial performance. We will briefly cover both types of studies in this section.

According to Pillai & Al-Malkawi (2018), there is a relatively high level of immaturity when it comes to CG practices in general in the GCC. One strong factor is the absence of jury authorities, which makes it seem less mandatory to comply with the CG codes in the GCC countries as well as keeping the CG themes standardizes. Pillai & Al-Malkawi (2018) explored the impact of corporate governance on the firm performance in the GCC countries using a firm-level panel data set of 349 financial and non-financial listed companies for the period 2005–

2012. Their study found a positive impact of good governance on financial performance in the areas of audit type, the board size, corporate social responsibility.

For his doctoral thesis, Albassam (2014) studied the relationship between good governance and company performance using panel data of 80 Saudi listed firms from 2004 to 2010 with a total of 560 firm-year observations that were collected manually from the sampled firms' annual reports. The study found that good governance proxied by the compliance with the CG principles issued by Saudi Capital Market Authority are positively related to return on assets (ROA) while having have no significant relationship with firm value based on Tobin's Q value. Similarly, the variables for CEO duality, the proportion of independent directors, board sub-committees and director ownership were positively related to ROA while the board size was negatively associated with ROA. Similarly, as discussed before, Abdallah & Ismail (2017) also confirmed that having a good corporate governance system has a positive impact on the company's performance. The findings of these studies clearly indicate that weak corporate governance systems and low involvement of its practices lead to keeping poorly managed organizations in the market and which result in a high level of inefficiency and wasted resources. Those adverse impacts cause non-performing loans, weaken the financial industry and eventually affect the whole market (Joh & Wook, 2003).

Al-Hussain (2009) explored the efficiency of corporate governance and bank performance in the data from Saudi banks. The study found a strong positive relationship between implementing an efficient corporate system and the bank performance measured by ROA with the exception of government ownership. However, the relationship was weak when they used the stock return to measure the performance of the banks.

Studies explore the relationship between various components of corporate governance and financial performance. For instance, Al-Matari, Al-Swidi, & Fadzil (2012) examined the impact of the audit committee size on financial performance. They reported a positive relationship. Their study also revealed a positive relationship between the independence of the audit committee and higher performance. However, not all studies agree with that finding. For instance, Ghabayen (2012) using the data from 102 listed companies in the Tadawul in the year 2011, concluded that audit committee size, audit committee composition and board size had no impact on firm performance while board composition had a significant negative impact.

Many studies explored the impact of board structure, size, and performance on the financial performance of a company. For instance, a study (Al-Matari et al., 2012) examined the board characteristics and financial performance for 136 nonfinancial Kuwaiti companies using the data for the fiscal year 2009. The study a positive impact of CEO duality and audit committee size on ROA while a negative impact of the CEO tenure and leverage on the firm performance. Additionally, the study tested the impact of board size and found to be statistically insignificant.

Another factor affecting corporate governance is diversity. Better governance requires diverse points of view to explore opportunities and predict risks through different perspectives. Though the literature does not show a direct impact of gender diversity as a determinant of effective governance, it provides evidence for added value in various forms of diversity. With only a few exceptions, females are underrepresented around the world in terms of board membership (Hill, Lunn, Morrison, Mueller, & Robertson, 2015). In Saudi Arabia, the problem is more severe. The vision 2030 is, however, making steady progress for female inclusion at every level.

Abdallah & Ismail (2017) found evidence that ties the impact of good corporate governance with the performance, especially when the government is one of the major shareholders. This might be due to the advantages they get from political connections and favoritism. Indeed, the government might directly or indirectly subsidize those companies. For instance, a Malaysian study (Ab Razak, Ahmad, & Aliahmed, 2011) using data from 210 firms over a ten-year period starting in 1995 finds a significant impact of government ownership on the firm performance even after controlling for company size, non-duality, leverage, and growth. On the other hand, a Vietnamese study, using a panel dataset of Vietnamese firms in the period 2004-2012, shows that state ownership has a negative impact on the profitability and labor productivity of a firm.

For instance, a study in the UK (Akbar, Poletti-Hughes, El-Faitouri, & Shah, 2016) examined the impact of governance compliance on the company performance using a sample of 435 non-financial publicly listed firms over the period 1999-2009. They developed a Governance Index that would help them determine the impact of compliance on corporate governance and performance. They considered good governance as a way of balancing interests of shareholders and various stakeholders including suppliers, customers, management, and financiers. In the balancing aspect, researchers noted that the UK Combined Code on Corporate Governance of 2003 aimed at reducing agency costs while at the same time improving corporate performance.

An agency cost is the result of inefficient actions of an agent acting on behalf of a principal. Executive incentives are expected to reduce agency costs.

Management personnel is required to adhere to the code of governance in order to provide the necessary leadership to the agency and maximize performance as a result. When governance performs better, share values will likely increase, investors become more interested in investing with the organization, the prices, therefore, are likely to increase which will increase wealth for the shareholders. Therefore, companies that adopt the corporate governance code are highly likely to enhance their performance and profits altogether.

However, if companies choose corporate governance endogenously, they are likely to attain the level of compliance in an ideal manner. Such a case does not have any relationship between equipose levels of governance as well as levels of corporate performance. In particular, improved compliance in corporate governance practices is likely to develop redistribution of liabilities amongst the stakeholders and managers of the agency, while at the same time decimating performance. Therefore, when organizations become compliant, they are likely to discipline managers, control the stakeholders in a more effective manner, thus reducing the costs for the minority stakeholders. For instance, managers are required to adhere to the lean management techniques to reduce costs of operation and management at their respective agencies, thus increasing profitability and brand value. For long, many investors have preferred investing in a more profitable organization as they are sure to reap profits from the investment. Therefore, compliance with various codes that enhances corporate governance ensures efficiency as far as monitoring managerial activities are concerned. The monitoring encourages the managers to concentrate on value-maximizing projects and avoid expropriation of resources. It also protects the shareholders from the expropriation of resources from the majority shareholders. The function further reduces the chances of insolvency as a function of corporate governance as it improves access to external funding at (Aman & Nguyen, 2013).

A limited number of studies explore the relationship between governance and performance (Cornett at al., 2008; Conyon and He, 2011, 2012). They generally confirm that good governance plays an important role mediating between pay and performance. For instance, a study using large South African dataset found out that positive, but small relationship between pay and performance (Nitm, at al., 2016). However, the study controlled for governance, it revealed substantially higher pay-performance sensitivity for the firms with better corporate

governance. Our study is perhaps a first of its kind exploring the relationship between governance, pay, and performance using comprehensive measures of governance.

In short, the literature provides compelling evidence for the importance of good governance in regard to its impact on the company's financial performance. Several studies using the data before 2017 CMA regulations reveal such evidence for the Saudi companies. Given the fact that the country issued much higher standards in 2017, we hypothesize that the new CG regulations shall result in higher efficiency in corporate governance along with higher financial performance.

H2: There is a positive relationship between compliance with corporate governance principles and firm financial performance

We use a comprehensive corporate governance index which is based on four sub-indices capturing different characteristics of the board of directors, public disclosure and transparency, shareholders rights, and stakeholder rights. We test whether corporate governance and its four constituents has any impact on performance of a company.

Research Methodology

Compensation paid to top managers in general and CEOs, in particular, is considered as an important determinant of the performance of a firm. This is one of the most celebrated concepts in economics which has motivated a large number of theoretical and empirical research under the tag of the principal-agent problem. Whereas the theoretical literature has designed a mechanism design approach, empirical literature focuses on testing the validity of the relationship between performance and the compensation packages offered to top managers and CEOs. The two approaches complement each other in finding incentive structures that could improve the performance. The empirical analysis typically involves regression analysis which uses performance as a dependent and compensation packages as independent variables together with some exogenous control variables.

$$\text{Performance} = f(\text{Compensation, controls}) + \text{error}$$

Performance variables typically include accounting-based performance variables such as ROE and ROA as well as market-based performance variables such as Tobin's Q and volatility of these variables. "Compensation" represents a vector of compensation variables which captures the nature of the short term and long-term incentives offered to top executives such as base

salary, performance-based pay (e.g stocks, options, bonus structure), pension, severance and perks. “Controls” are control variables which, among other variables, include corporate governance rules and regulatory and institutional environment, macroeconomic events as well as other variables that might have an impact on the performance variables such as firm size and leverage.

These regressions are used to answer a variety of policy questions. For example, the analysis is used to answer questions like whether a particular type of pay structure incentivizes maximization of personal benefits (as predicted by the rent extraction theory) or induces the agent to maximize the shareholders’ value (shareholders value maximization theory). Similarly, it is used to compare the effectiveness of competing for incentive structures and try to test whether, for example, CEOs with options-based incentives perform better or worse than stock-based incentives and whether it is the total compensation or compensation structure which drives performance. Moreover, the model can also be used to explore whether a particular compensation structure gives the CEO/Top managers the incentive to reduce risk or resort to excessive risk.

Depending upon the nature of the data, the model could be estimated using panel data estimation techniques if there are sufficient time and cross-sectional observations. The literature typically uses panel data analysis.

A parallel strand of literature looks at the impact of corporate governance rules and the regulatory and institutional environment. They either use CEO or firm-specific characteristics as regression such as the power of a CEO (whether a CEO is chairman of the board as well, for example), the role of institutional investors, reputation and busyness of the CEO etc.; or regulatory requirements like the existence of independent directors, disclosure about the type of compensation, reporting and auditing requirements etc.

We will primarily use the above framework to study the relationship between a firm’s performance and the top managers' compensation structures which could be used to guide regulatory reforms.

Data Analysis and Findings

An Overview of incentives offered to top executives in Saudi Arabia:

We conducted a survey of the type of incentives offered to top executives in listed companies in Saudi Arabia. The survey was administered by Saudi Arabia’s Capital Market Authority (CMA) who collected this data from companies listed on Tadawul. We received 60 responses for the survey which is around 30% of the listed companies. The survey questionnaire is attached as appendix A.

The survey questions focus on the standard wage profile of executives including base-salary and short-term and long-term aspects of pay for performance. The idea is to analyze the extent to which the compensation scheme in vogue align the short term and long-term best interest of the shareholders and top five executives. The discussion below summarizes the results of the survey.

The standard duration of a contract: The majority of the contracts offered to the top five executives in Saudi Arabia are either short term, 1 to 2 years, or have no standard duration. This accounts for more than 80% of the top executives (Figure 2). From the principal-agent problem point of view, in the absence of any other incentives, short term contracts induce the agent to focus on short term performance measures which may compromise the long-term interest of the shareholders.

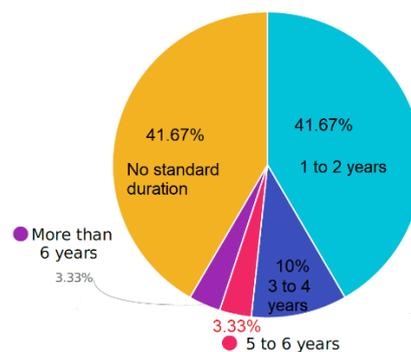


Figure 2: Standard duration of the contract

Tenure of the top five executives: The survey also asked companies to report on the duration for which each of the top five executives stayed at their job in the current company. On average, nearly half of the top five executives stay in their company for five years or less. Comparing Figure 3 with the standard length of the contract in Figure 2, even though most of the contracts are short term in nature, they seem to be regularly extended for the top five executives. The

majority of the executives spend more than three years in their job with the same company. Around one in every five top executives stay for more than 16 years in the company.

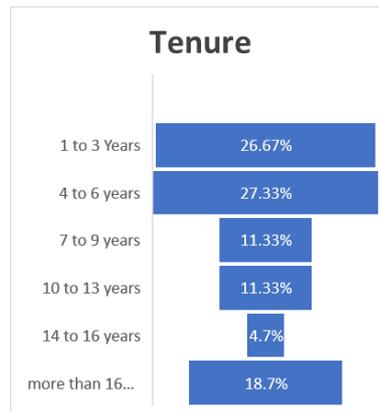


Figure 3: Average duration of the top five executive’s tenure at the job.

Age distribution of the top five executives: As clear from Figure 4, the top five executives' age range is quite diversified. Most top five executives are in the age range of 36 to 55 with a small number above the age of 55. The average age range is 46 to 50, which is also the mode of the data. The average age of the CEO is, however, in the 51 to 55 age range which is consistent with the age range of CEOs in the US (Peyer et al. 2007).

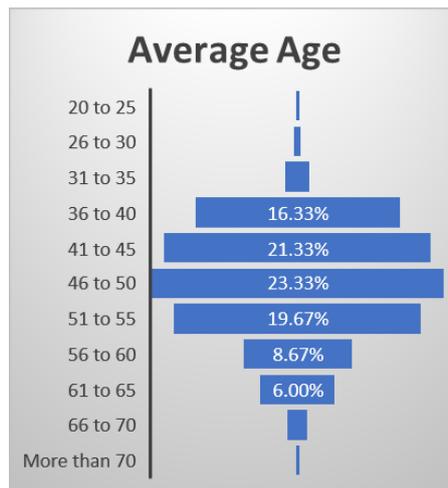


Figure 4: Average age of the top five executives.

Base salary relative to local competitors: Base salary is typically believed to be unrelated to performance as it is not explicitly linked with any performance measure. If this is true, an increase in the base salary is expected not to have any impact on performance. Akerlof’s (1987) gift-exchange experiments, followed by a plethora of research, however, indicate that this is not true for a variety of reasons. Two of the most important reasons often cited in the literature

are efficiency wage and reciprocity. Efficiency wage refers to a wage above the market value, which in our context would be a base salary more than the local competitors. Efficiency wage increases the opportunity cost of losing one's job, which induces the agent to work harder to avoid losing the premium he or she is receiving over and above his or her competitors. Another way to interpret the numbers in Figure 4 is that, for an executive with a current package as good as their competitors, there is a 60% chance that the top executive will be able to receive as good a base salary as his current job; a 28% chance that the executive will receive a relatively lower base salary; and a 10% chance that he or she will receive a relatively better salary than his/her current job. The reciprocity argument invokes behavioral biases which argues that the agent reciprocates generous, above market, salary with higher effort¹. This is because they value generosity². As clear from Figure 4, 60% of the respondent companies believe that their pay is as good as their competitors and 28.5% believe it is below their competitors. One in every ten companies, however, believe that their top executives' base salary is better than their competitors.

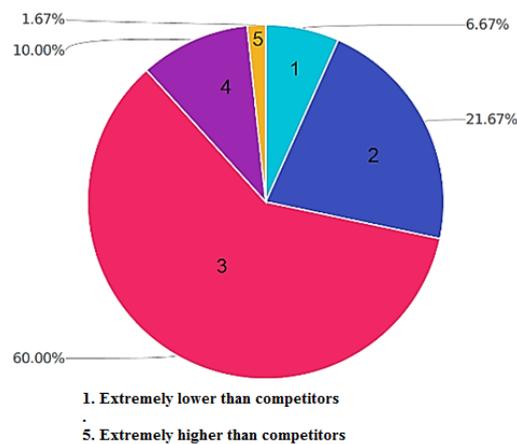


Figure 5: Base salary of top five executives relative to competitors

Performance-based compensation: It is commonly believed that the top executives of a company play an essential role in driving the performance of a firm. They are, however, more likely to put extra effort only if their pay is linked with the performance of the firm. Most compensation packages, therefore, offer some sort of performance bonuses to the top executives. The basis of the performance depends on the firm's mission and performance

¹ See Charness and Kuhn (2011) for a review of the related literature.

² See for example Khan (2019) and Englmaier and Leider (2012) for theoretical discussion on gift-exchange and Khan (2015) for empirical evidence.

matrix. Around two-thirds of the companies in our sample offer bonuses, 70% of which are based on profit directly and others on some more general KPI's including profits. Most firms tend to be interested in maximizing profit and offer the agents a share in the accounting profit.

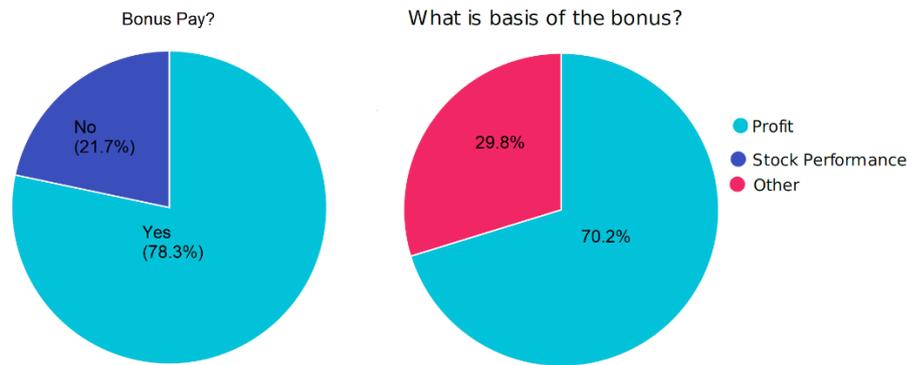


Figure 6: Bonus pay for the top five executives

Figure 6, however, reveals that most of these bonuses are short term in nature. Only 15% of these firms offer long term bonuses. This means that the current performance-based compensation in Saudi Arabia is mostly consistent with improving the short-run performance of the company. This may come at the cost of compromising the long-term interest of the firms.

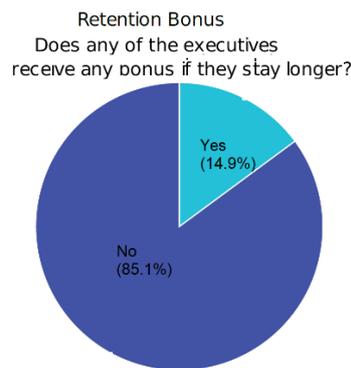


Figure 7: Retention Bonus.

Stock-based incentives: Figure 8 reveals that more than 50% of the top executives have some level of stock ownership. Around 82% of the ownership stake is less than 5%. This could serve as a long-term incentive if it is part of the compensation scheme and linked to the long-term value of the stock. A great majority of this is, however, a personal investment that reduces its long-term benefits and may expose the company to compromise its long-term interest. An ownership stake, in any case, creates ownership interest in the business and is likely to have an impact on performance. Moreover, none of the companies offer stock-option as compensation,

i.e. a right, but not an obligation, to purchase shares in the future at some pre-specified exercise price which is seen as a tool to align the best interest of the shareholders and company’s top executives in the long-run.

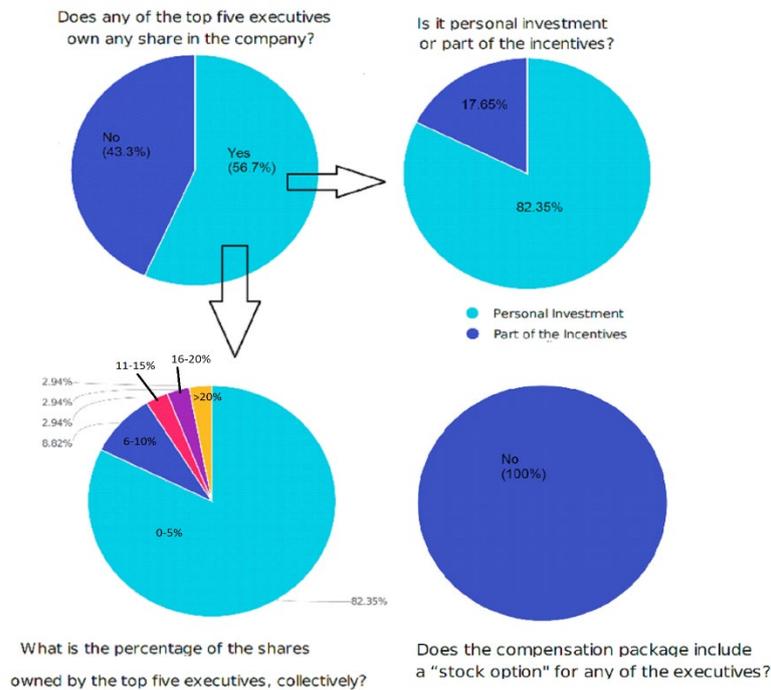


Figure 8: Stock-ownership and stock-options by top five executives

The top executives’ compensation packages have come across some harsh criticism and popular press sees it as CEOs going away with a big chunk of money. Alex Edmonds in his upcoming book “Grow the Pie: How Great Companies Deliver Both Purpose and Profit”, however, argues that they grow the size of the pie and it is fair to receive a share for adding value. Moreover, the “exorbitant” pay is paid from the value added by the top executives which also increases the payoff of the shareholders as well as other stakeholders.

Bonuses for non-Executive Employees: Whereas it is true that the top executives help grow the size of the pie, non-executive employees also play an important role. The type of compensation package offered to them is also an important factor, which affects the company’s performance. Our survey shows that nearly two-thirds of the companies offer some performance-based compensation. The basis of the bonus, however, is not as straightforward as that offered to the top executives. Most companies reported a generic KPI or achieving certain targets type

Do you have any performance based bonus for non-executive employees?

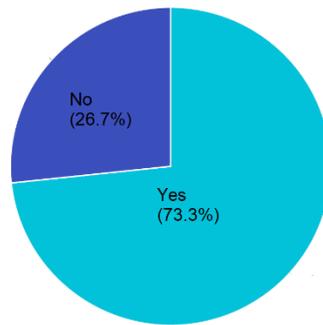


Figure 9: Performance-based bonuses for non-executives.

Alfaisal CGI Description

The Alfaisal CGI is a scientific performance measure (index) developed by a team from CGC at the College of Business at Alfaisal University in collaboration with consultants from Harvard University and Kobirate Co.³ with funding support from SAGIA and strong endorsements from the CMA, SAMA and the Ministry of Commerce and Investment. The objective of the index is to monitor and promote good governance practices among corporations doing business in Saudi Arabia. The CGI is based solely on good CG principles set by the CMA, SAMA, and OECD and uses all publicly available information on the companies traded in Tadawul, such as their annual financial statements, bylaws, General Assembly Meeting minutes, and press releases. As shown in the graph below, they perceive corporate governance in a comprehensive manner covering rules, rights, structures, processes, and accountability for shareholders, board of directors, management, employees, customers, and society at large.

The Alfaisal CGI is a composite index based on the weighted score of corporate governance within four categories; BOD (the board of directors), PDT (Public Disclosure and Transparency), SHR (Shareholders' Rights), and STR (Stakeholders' Rights) Each category is evaluated over 100 points using evidence-based CG practices. The cumulative CG score also ranges between 0 and 100. The CG score reveals the compliance of companies to good CG principles (stated above). The final CG score is the weighted average of four categories over 100 points. The board of directors (BOD) has the highest weight with 35% followed by Public Disclosure and Transparency (PDT) (30%), Shareholders' Rights (SHR) (25%), and Stakeholders' Rights (STR) (10%).

³ Kobirate International Credit Rating and Corporate Governance Service Inc.

The data include the CG assessment of all listed companies for the fiscal year of 2017 and 2018 when new CMA principles were applied for the first time. The CG scoring were conducted within three modules: a base module for all non-financial companies, a banking module for the banking sector, and the insurance module for the insurance sector. The scoring for each module consists of over 200 traits (variables) within the four categories of corporate governance.

CGI, Incentives and Performance:

In this section, we investigate the relationship between corporate governance, incentives and performance of a firm. In general, we estimate different versions of the following model.

$$\text{Perf} = f(\text{Comp}, \text{CGI}, \text{controls}) + \text{errors}$$

“Perf” refers to performance variables. We use ROE (return on equity) as a base case as it measures the return on equity which directly relates to the best interest of the shareholders. We use ROA (return of assets) as an alternative measure for robustness.

“Comp” represents a vector of the compensation variables summarizing the incentive package. We use the following variables.

- “BW” as the base-wage offered to the top five executives as compared to local competitors as reported in Figure 5.
- “LoC” as the Average Length of a Contract offered to the top five executives as in Figure 1.
- “Ten” as tenure which is the average number of years the top five executives stay in their current job as in Figure 2.
- “Age” as the average age of the top five executives in a company as in Figure 3.
- “BPFE” as the performance-based Bonus-Pay for executives as in Figure 6.
- “RB” as the existence of retention bonuses, offered when the executive stays longer with the organization as in Figure 7.
- “Shares” as the stock-ownership by the top-five executives as in Figure 8.
- “BFNE” as any bonuses offered to non-executive employees as in Figure 9.

“CG” represents the corporate governance variable(s). We use Alfaisal University’s CG index and four of its constituents as discussed previously; BOD (Board of Directors), PDT (Public Disclosure and Transparency), SHR (Shareholders’ rights), and STR (Stakeholders’ rights).

“Control” variables include time dummies to isolate cyclical variations caused by macroeconomic events, size of the firm, and leverage. We classify firms size as either small, medium or large size. Leverage is calculated as the total liabilities relative as a proportion of the shareholders’ equity. Our sample includes financial and non-financial firms. We also use Fin-dummy as one of the control variables. The dummy takes a value of 1 for financial firms and 0 otherwise.

Data Description:

The data on compensation was collected using the survey administered by CMA in 2019. This part of the data is described and discussed in detail above. The data on corporate governance was provided by Alfaisal University. The CG index we used is for the fiscal year 2017-18. The data on performance variables is collected from Tadawul. We use three years of performance data 2016 to 2018. Our full sample includes 60 companies (180 observations), listed on the Saudi stock exchange which responded to the incentives survey. Alfaisal university CGI reports CGI scores for 55 of these companies. Our sample size therefore reduces to 55 (165 observations) whenever we add the CG variables in our regression analysis.

Table 1.1 provides a summary of the key performance and control variables. The table reports the mean, median, standard deviation and minimum and maximum values for each variable by size. We divide size in three different levels: small, medium and large on the basis of total assets. A company is classified as small firm when total assets of the company is less than SAR1.5 billion; as a large firm when total assets is above SAR 2.6 billion and medium if it is in the between. Two trends are quite obvious from the descriptive statistics. First, performance variables tend to have a strong inverted U-shaped relationship with size of the firm as the mean and median of ROA and ROE for the medium size firms is higher than the small and large size firms. This implies that we should use size and its squared value as control variables in our regression analysis. Second, there is a good deal of variations within each firm size which means there are factors other than size which could explain these variations including leverage and incentives. Leverage also varies with size and within size and should be uses as a control variable. The corporate governance variables scores also has decent variations, within size in particular. The composite CGI score is highly correlated with its four constituents as expected⁴,

⁴ The correlation coefficient between CGI and BOD, SHR, PDT and STR is 0.93, 0.84, 0.64 and 0.80 respectively.

but within constituent correlation is relatively weak ranging from 0.39 to 0.71. BOD have the highest correlation with the other three constituents ranging from 0.48 to 0.71.

Table 1.1: Descriptive statistics for key performance and control variables by firm size.

<i>Size</i>		<i>ROA%</i>	<i>ROE%</i>	<i>Leverage</i>	<i>CGI</i>	<i>BOD</i>	<i>SHR</i>	<i>PDT</i>	<i>STR</i>
Small	Mean	2.8	5.4	0.89	66.3	69.2	72.0	72.6	23.6
	Median	2.7	5.0	0.42	68.4	75.0	72.9	73.0	15.9
	Min	-24.9	-43.4	0.02	54.3	49.0	54.6	55.3	0.0
	Max	40.0	112.4	24.0	77.6	86.0	82.0	85.1	83.7
	Stdev.	10.3	22.2	2.81	7.5	11.2	5.9	7.3	21.0

Medium	Mean	6.1	12.3	0.74	64.3	65.8	70.2	72.3	20.6
	Median	5.4	14.3	0.65	62.2	64.4	70.0	72.9	13.3
	Min	-4.6	-13.1	0.04	56.1	52.0	64.5	60.1	0.0
	Max	21.2	30.6	2.01	80.3	84.6	77.2	85.3	64.1
	Stdev.	5.0	9.7	0.56	7.0	9.1	4.6	7.6	18.9

Large	Mean	3.4	7.0	2.60	69.1	70.4	74.9	75.3	31.1
	Median	2.0	9.9	1.61	66.7	71.1	74.9	73.1	30.6
	Min	-9.7	-77.8	0.05	51.9	52.6	44.2	58.0	0.0
	Max	28.4	42.9	8.40	87.3	89.8	90.0	92.3	79.8
	Stdev.	6.9	16.2	2.50	10.0	12.8	8.7	9.0	21.2

Total	Mean	3.7	7.4	1.55	67.1	69.1	72.9	73.7	26.2
	Median	2.8	9.5	0.67	66.7	68.5	73.2	73.1	26.0
	Min	-24.9	-77.8	0.02	51.9	49.0	44.2	55.3	0.0
	Max	40.0	112.4	24.0	87.3	89.8	90.0	92.3	83.7
	Stdev.	8.2	18.0	2.53	8.7	11.6	7.2	8.2	21.0

Notes: The number of small, medium and large companies in our sample is 24, 12 and 24 respectively.

Our sample comprises of 17 sectors including 19 firms from financial sector 41 firms from non-financial sector. The financial sector has 8 banks and 11 insurance companies. The non-financial sector includes 14 Materials, 5 Food and Beverages, 3 each from Capital Goods, Consumer Durables & Apparel, and Transportation and 13 “others” with 10 industries having one or two companies including utilities, retailing, energy etc. Tables 1.2A and 1.2B provides descriptive statistics of these sectors on performance, governance, incentives and control variables. The financial sector enjoys a relatively higher return on equity but a relatively less return on assets. On average, both sectors score equally on the corporate governance indices, with median financial firms doing very well on the stakeholders’ rights front relative to the non-financial firms. As expected, financial firms, banks are highly leverage and relatively bigger in size. These two measures also vary across the non-financial sectors. Controlling for

these factors in our analysis therefore plays an important role getting a reliable relationship between incentives and performance variables.

Table 1.2A. Mean (Median) of selected variables by sectors.

	Count	ROE	ROA	BOD	PTD	SHR	STR	CGI	Leverage	Size
Financial Sectors	19	8.5 (12.1)	2.7 (2.1)	69.4 (75.6)	75.2 (73.6)	72.7 (75)	27.6 (31.3)	67.8 (68.3)	2.6 (0.7)	2.2 (3)
NF Sectors	41	6.9 (6)	4.2 (3.6)	68.9 (64.2)	72.9 (70.5)	73 (72)	25.4 (12)	66.7 (61.7)	1.1 (0.7)	1.9 (2)
Banks	8	12.5 (11.8)	1.9 (1.7)	67.5 (61.7)	73.8 (73.4)	71.7 (75)	32.2 (32.5)	66.9 (65.7)	5.8 (5.7)	3 (3)
Insurance	11	5.6 (14)	3.2 (4.5)	70.9 (75.6)	76.2 (73.6)	73.4 (73.8)	24.4 (27.5)	68.5 (68.5)	0.3 (0.1)	1.5 (1)
Capital Goods	3	-5.7 (-1.5)	-1.3 (-1.1)	73.2 (80.1)	73.5 (79.9)	73.2 (72.6)	18.1 (10.7)	67.8 (70.7)	1.2 (0.8)	1.7 (1)
Consumer Durables & Apparel	3	1.9 (0.1)	-0.3 (0.1)	81.2 (82.1)	85.4 (85.3)	80.3 (85.4)	37.2 (30.6)	77.8 (78.7)	1.1 (0.3)	2.3 (3)
Food & Beverages	5	-12.8 (-3.6)	-7.4 (-2.9)	61.1 (61.4)	64.9 (65.4)	67.8 (69.1)	22.9 (10.7)	60.1 (57.2)	0.8 (0.5)	1 (1)
Materials	14	7.8 (7.3)	5.5 (4.5)	69.5 (65.2)	72.2 (69.3)	73.5 (72)	28.9 (15.3)	67.3 (64.2)	0.7 (0.4)	2.1 (2)
Transportation	3	9.6 (8)	6.2 (3.4)	73.8 (78.5)	78.2 (75.6)	73.9 (74.9)	37.2 (43.9)	71.5 (73.3)	0.9 (0.8)	2.3 (3)
Others	13	17 (14.2)	9.1 (8.5)	65.1 (56.3)	72 (67.8)	72.2 (69.1)	16.4 (8)	64.1 (58.8)	1.5 (0.8)	2 (2)

The financial sector, on average, pay efficiency wage relative to the non-financial sector and are more likely to offer retention bonuses than non-financial firms. The average age of the top five executive in the financial sector is also higher than the non-financial sector. Differences across bonuses for executives and non-executives are however not too different at the sector level. There are however differences within the sector. Banks, for example, regularly offer incentives to executives and non-executives, where only 70% of the insurance companies in our sample offer bonuses to the top five executives and non-executives. There are similar variations in the non-financial sector. Finally, top executives in the non-financial firms are more likely to hold their companies' shares as a personal investment than in the financial sector. On average, 90% of the top five executives invest in their company's shares, whereas only 50% of the top executives in the financial firms invest in their companies' shares. In particular, 100% of the top five executives 100% in banks in our sample hold shares, whereas only 10% of the insurance companies top five executives hold shares of their company.

Table 1.2B. Mean (Median) of selected variables by sectors.

	ROE	ROA	Base wage	Bonus for Executives	Bonus for Non-Executives	Retention Bonus	Share ownership	Age of Executives
Financial Sectors	8.5 (12.1)	2.7 (2.1)	3.1 (3)	0.8 (1)	0.8 (1)	0.2 (0)	0.5 (0)	53.1 (52.7)
NF Sectors	6.9 (6)	4.2 (3.6)	2.7 (3)	0.8 (1)	0.7 (1)	0.1 (0)	0.9 (1)	50.7 (51.5)
Banks	12.5 (11.8)	1.9 (1.7)	3.1 (3)	1 (1)	1 (1)	0.3 (0)	1 (1)	56.8 (57.5)
Insurance	5.6 (14)	3.2 (4.5)	3 (3)	0.7 (1)	0.7 (1)	0.2 (0)	0.1 (0)	50.5 (51.5)
Capital Goods	-5.7 (-1.5)	-1.3 (-1.1)	2.3 (2)	1 (1)	1 (1)	0 (0)	0.7 (1)	49.5 (51.5)
Consumer Durables & Apparel	1.9 (0.1)	-0.3 (0.1)	2.7 (3)	0.7 (1)	0.7 (1)	0 (0)	0.3 (0)	51.9 (50.3)
Food & Beverages	-12.8 (-3.6)	-7.4 (-2.9)	2.2 (3)	0.4 (0)	0.6 (1)	0.2 (0)	0.6 (1)	51.3 (50.3)
Materials	7.8 (7.3)	5.5 (4.5)	2.6 (2.5)	0.9 (1)	0.6 (1)	0.1 (0)	1 (1)	51.5 (53.3)
Transportation	9.6 (8)	6.2 (3.4)	3 (3)	1 (1)	0.7 (1)	0 (0)	0.3 (0)	48.7 (49.1)
Others	17 (14.2)	9.1 (8.5)	3 (3)	0.7 (1)	0.7 (1)	0.1 (0)	1.2 (1)	50.1 (51.5)

Table 1.3. Correlation between variables of interest.

	ROE	ROA	CGI	BW	BFE	BFNE	Shares	RB	CoL	Ten	size	Lev.
ROE	1.00											
ROA	0.85	1.00										
CGI	0.24	0.25	1.00									
BW	0.19	0.23	0.25	1.00								
BFE	0.30	0.25	0.24	0.29	1.00							
BFNE	-0.02	-0.04	0.10	0.47	0.17	1.00						
Shares	0.15	0.16	-0.18	0.09	-0.03	0.03	1.00					
RB	0.26	0.17	0.16	0.11	0.20	0.23	-0.06	1.00				
CoL	0.01	0.02	0.05	0.12	-0.09	0.05	0.00	0.17	1.00			
Ten	0.26	0.23	0.18	0.08	0.11	0.09	0.39	0.07	-0.18	1.00		
Size	0.15	0.12	0.14	0.27	0.21	0.33	0.01	0.11	-0.05	0.18	1.00	
Lev.	0.07	-0.11	-0.01	0.19	0.06	0.12	0.16	0.12	-0.01	-0.01	0.32	1.00

Note: BW= Base wage; BFE=Bonus for Executives; BFNE=Bonus for non-Executives; Shares=Ownership of shares; LB= Long-term bonus; CoL=Contract length; TEN=job tenure; size=Firm size; and Lev=Leverage.

Results:

Several tables below present our estimates of the panel data regression. Table 1.3 reports the correlation matrix for different variables of interest. ROE and ROA have a very high correlation as expected. The correlations between most variables are very low or in the acceptable range which means multicollinearity is unlikely to be a problem. Both ROA and ROE are weakly positively correlated with the base-wage, bonuses paid to the top five executives, shares, retention bonuses, tenure and size of the firm. There is a weak positive correlation between bonuses offered to executive and non-executive employees and firm size and leverage as well.

Table 1.4 reports the results of panel data estimates for each of the variables in the compensation package and corporate governance vis-a-vis ROE and ROA as dependent variables in the presence of the control variables⁵. These simple regressions show that bonuses offered to the top five executives, ownership of shares and long-term bonuses offered to the top five executives have a statistically significant and positive impact on ROE and ROA which is consistent with *a priori* expectations. The base wage also has a weakly significant impact on ROA. This means that, at the outset, the short-term and long-term aspects of the compensation package plays an important role. The CGI score also has a positive and statistically significant relationship with ROE and ROA. Individually, BOD, PDT, and STR have a weakly significant impact on ROE and ROA as well. Shareholders' rights, however, have a significant impact on ROA only. It is interesting to note that the individual constituents of the CGI score have a weakly significant relationship with the performance variables, whereas CGI, which is a weighted average of the four constituents, has a statistically stronger relationship with performance. This means that, even though the constituents of the CG may not be individually important, they as a package contribute better. One of the other interesting points to note is the positive impact of stakeholders' rights on performance. At the outset, it doesn't make sense to expect a positive relationship between stakeholders' rights and performance. Our results, however, show that stakeholders' rights have a positive impact on performance. This means companies that take care of stakeholders' rights tend to perform better.

Table 1.4: Random Effects GLS estimates for incentives and CG vis-à-vis ROE and ROA

Dependent Variable	ROE		ROA
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⁵ Standard errors of all estimates are based on robust standard errors using the Stata VCE (robust) command with xtreg. It is appropriate to use the random effect model in this case as the fixed effects are explained through variations in incentives.

	Coefficient	R ²		Coefficient	R ²
Base Wage	6.82	13.7%		3.23*	15.6%
Bonus for Executives	11.81**	12.5%		4.72**	11.9%
Bonus for Non-Executives	-6.63	7.6%		-2.46	7.9%
Ownership of Shares	6.03**	14.9%		2.49**	14.6%
Long-Term Bonus	9.85**	8.3%		3.24	7.9%
Contract Length	0.91	5.7%		0.45	6.7%
Job Tenure	0.80	5.8%		0.28	6.6%
Age of Executives	0.09	5.4%		-0.09	6.7%
CGI Score	0.46**	17.1%		0.23**	15.7%
BoD Score	0.29*	15.5%		0.14*	13.6%
PDT score	0.45*	16.2%		0.23*	14.7%
SHR score	0.38	13.8%		0.26*	14.6%
STR score	0.15*	14.5%		0.062*	11.8%

Notes: * p<.1; ** p<.05; *** p<.01; # of companies= 60, # of observations=180; ^The number of companies for CGI regressions is 55 (165 observations); Control variables: Firm size, leverage, financial dummy (1 if financial firm, 0 otherwise), and time dummies.

The above results, although encouraging, may not hold when we take a more realistic scenario where different aspects of the compensation scheme are offered as a package rather than as standalone individual choices. It is, therefore, reasonable to test the nature of the relationship between these variables and performance as a package in the presence of relevant control variables. Tables 1.5 and 1.6 reports different versions of the model by gradually expanding the compensation package in column (1) to (5) and add corporate governance as one of the controls or explanatory variables using ROE and ROA as performance measures, respectively. Column (6) to (10) repeats the regressions in column (1) to (5) with CGI as a control variable which reduces our sample size to 55 companies or 165 observations. Our estimations show that results in reported in Table 1.2 hold in general.

Table 1.5: Radom Effects GLS estimates for incentives vis-à-vis ROE

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
CGI Score						0.42**	0.38**	0.33*	0.38**	0.31*
Base Wage	5.4	5.6	5.5	5.8*	5.98*	1.6	2.1	2.4	2.3	2.41
Bonus for Executives	8.7*	7.3	7.4*	9.4**	9.9**	8.2*	6.9	6.7	6.7*	7.7*
Bonus for Non-Executives	-10**	-11.5**	-11.5**	-11.4**	-11.5**	-7.2**	-8.9***	-9.0***	-8.9***	-8.9***
Ownership of Shares	5.04**	5.2***	5.25**	6.14***	5.82***	4.02**	4.06**	3.16*	4.2**	3.5**
Long-Term Bonus		10.8*	10.7*	15.9***	16.2***		10.3**	10.3**	11.0*	11.5**
Contract Length			0.28	-0.46	-0.17			-0.20	-0.54	-0.23
Job Tenure			-0.18		1.10			1.11		1.34
Age of Executives				-0.72*	-0.84**				-0.05	-0.19
Financial Dummy	3.6	2.6	2.7	3.6	3.7	6.4	5.4	5.2	5.4	5.4
# of Obs.	180	180	180	180	180	165	165	165	165	165
R2	28.6%	32.0%	32.0%	35.8%	36.3%	28.4%	32.7%	33.6%	32.8%	33.8%

Notes: * p<.1; ** p<.05; *** p<.01; Control variables: Firm size, leverage, and time dummies.

Table 1.6: Radom Effects GLS estimates for incentives vis-à-vis ROA

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
CGI Score						0.20*	0.18*	0.16*	0.17*	0.14
Base Wage	2.7*	2.8*	2.7*	2.9**	3.0**	2.2**	2.4**	2.5**	2.5**	2.5**
Bonus for Executives	3.2*	2.7	2.8	4.0**	4.3**	2.8	2.4	2.2	2.9	3.1*
Bonus for Non-Executives	-4.0*	-4.5*	-4.5*	-4.5**	-4.5**	-3.9**	-4.5**	-4.6**	-4.4**	-4.4**
Ownership of Shares	2.0**	2.07**	2.09**	2.67***	2.46***	1.56	1.60	1.27	2.11**	1.78*
Long-Term Bonus		3.6	3.5	6.8*	6.97*		3.59	3.69	5.06	5.30
Contract Length			0.18	-0.30	-0.11			-0.23	-0.43	-0.27
Job Tenure			-0.08		0.73			0.39		0.69
Age of Executives				-0.45***	-0.53***				-0.18	-0.26
Financial Dummy	-0.77	-1.11	-1.05	-0.44	-0.41	0.34	0.00	-0.12	0.13	0.15
# of Obs.	180	180	180	180	180	165	165	165	165	165
R ²	27.1%	29.0%	29.0%	36.2%	37.2%	27.5%	29.9%	30.4%	31.1%	32.2%

Notes: * p<.1; ** p<.05; *** p<.01; Control variables: Firm size, leverage, and time dummies.

Consistent with the efficiency wage and gift-exchange hypotheses, ROA, and to some extent, ROE, are positively affected by the level of the base wage relative to competitors. Other studies in the literature do not look at the impact of the base salary on performance. There is, however, a plethora of laboratory experiments and some field experiments which point toward the existence of a relationship between base wage and performance. A well-known objection to this evidence is that experiments are conducted in a controlled environment and it is not clear whether or not these results are valid in the real world (Laury and Taylor, 2008, Charness and Kuhn, 2011; Voors et al., 2012), as wording of the experiment and instruction list (Hoffman et al., 1999), identity of the experimenter, social distance, information asymmetry (Kagel et al., 1996) and design of the experiment seem to have an impact on outcomes (Camerer and Thaler, 1995). Khan (2015), however, found that the relationship holds in the real world as well. This result also lends support to the gift-exchange hypothesis from the real world.

As in Table 1.5, the base wage, bonuses offered to executives, ownership of shares by the top five executives and retention bonuses has a positive impact on performance. On average, a company that offers short term bonuses to its top executives enjoys around 6 to 10 percentage points higher return on equity and 2 to 4 percentage points higher return on assets. Similarly, companies that offer retention bonuses tend to perform better as well. On average, companies with long term bonuses tend to enjoy 10 to 15 percentage points higher return on equity and 6 to 7% higher return on asset. Overall, the impact of long-term incentives is more pronounced than the short-term incentives. There is also evidence that it affects return on assets. Ownership of shares creates a long-term interest in the company and has a positive impact on performance as well.

An additional insight we get from these more realistic regressions is that bonuses offered to non-executives and the average age of the top five executives now have a statistically significant but negative impact on performance, ROE as well as ROA. The negative impact of the average age of the top five executives on performance implies that companies might gain marginally by employing relatively younger top executives.

The most interesting and surprising result is that bonuses offered to non-executive employees have a significantly negative impact on ROE and ROA. On average, companies that offer bonuses to its nonexecutive employees reduce ROE by 7 to 10 percentage points and ROA by 4 to 4.5 percentage points. As pointed out earlier, most companies report that they offer incentives to non-executive employees, but when asked for details of the bonus, there was no simple answer. Bonuses are counterproductive when the criteria to achieve bonuses is perceived as too stringent or structured such that it raises fairness concerns (such as historically not seen as rewarding as the effort exerted by employees or lack transparency leading to information asymmetry about the allocation of bonuses or spite). Whereas it is difficult to pass any judgement as to what is the source of this negative effect, there is a cascade of laboratory experiments which show that workers may take costly actions to reciprocate, what they perceive as, unfair action with a counter response to punish unfair intentions or unfair types. See for example Greenberg (1990), Blount (1995), Kagel et al. (1996), Offerman (1999), Schminke, Cropanzano, and Rupp (2002), and Falk et al. (2003, 2008). The negative reciprocity is stronger when procedural justice in the organization is low (Skarlicki and Folger 1997)⁶. Similarly, the level of monitoring is seen as a signal of distrust (Frey 1993; Dickinson and Villeval (2008)) and results in workers behaving in a counterproductive manner. See Krueger and Mas (2004) and Mas (2006, 2008) for retribution with real firms and workers.

Corporate governance also has a positive impact on return on equity, with and without incentives. The two may complement each other at times. Good governance results in good compensation schemes that align the best interest of stakeholders. This interaction can be captured by introducing an interaction term with the incentive parameters. Doing so, however, overloads the model with parameters which, given our sample size, is not appropriate.

⁶ See Charness and Kuhn (2011) for a review of these and many other relevant studies.

We use size as well as its squared values as controls. Both these variables are consistently significant throughout our results and point towards the existence of a consistently inverted u-shaped relationship, implying that a firm’s performance increases as the size of the firm grows, but gains from size could be negative after some point. Leverage is found to have a negative impact on both of the performance variables.

All our regressions include a dummy variable for financial firms, which takes a value of 1 if the firm is a financial firm (a bank or an insurance company) and 0 otherwise. The dummy variable is consistently statistically insignificant. This is primarily because we control for leverage which captures the difference between financial and non-financial firms as financial companies, banks in particular, are highly leveraged as compared to the non-financial companies.

Robustness Check:

Our analysis above shows that incentives and corporate governance have a statistically significant impact on a company’s performance measured by ROE and ROA. As mentioned earlier our sample includes firms from 17 sectors including 8 banks, 11 insurance companies, 14 Materials, 5 Food and Beverages, 3 each from Capital Goods, Consumer Durables & Apparel, and Transportation and 13 “others” with 10 industries having one or two companies including utilities, retailing, energy etc. Ideally, we could include sector dummies and interact them with the incentive variables to control for sector specific variation. However, given the sample size, it is not feasible to get any meaningful result from this exercise. Moreover, variations in industry-specific profitability might affect the performance variables which might erroneously be associated with variations in the incentives scheme, we checked the robustness of our results by replacing ROE and ROA with deviations of these measures from industry or sector-specific median of the performance variables. These results are reported in Tables 2.1 to 2.3. Our previous results are mostly robust to this modification which confirms the reliability of our results. The relationship between wage base wage and ROE disappears and weakens with the ROA. Similarly, the bonus for non-executives continues to have a negative impact on ROE but has no impact on ROA.

Table 2.1: Random Effects GLS estimates for incentives and CG vis-à-vis deviation of ROE and ROA from sector medians.

Dependent variable	ROE-Sector median			ROA-sector median	
	Coefficient	R ²		Coefficient	R ²

Base Wage	5.28	9.4%		2.34*	8.4%
Bonus for Executives	11.4**	11.5%		4.59***	8.9%
Bonus for Non-Executives	-4.53	4.7%		-1.12	1.9%
Ownership of Shares	4.89*	10.9%		1.88**	8.1%
Long-Term Bonus	10.8***	7.7%		3.85	4.5%
Contract Length	-0.11	3.4%		-0.20	1.5%
Job Tenure	1.29	4.7%		0.57	2.9%
Age of Executives	0.21	3.9%		-0.006	1.4%
CGI Score	0.44**	10.7%		0.21**	10.2%
BoD Score	0.29*	9.1%		0.13**	7.9%
PDT score	0.398**	8.9%		0.19*	7.9%
SHR score	0.30	6.1%		0.20*	6.9%
STR score	0.16**	9.4%		0.07**	7.8%

Notes: * p<.1; ** p<.05; *** p<.01; # of companies= 60, # of observations=180; ^The number of companies for CGI regressions is 55 (165 observations); Control variables: Firm size, leverage, financial dummy (1 if financial firm, 0 otherwise), and time dummies.

Table 2.2: Random Effects GLS estimates for incentives vis-à-vis ROE as a deviation from sector median.

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
CGI Score						0.42**	0.38**	0.32*	0.38**	0.30*
Base Wage	3.7	3.8	3.99	4.2	4.4	-1.2	-0.7	-0.14	-0.30	-0.14
Bonus for Executives	9.2**	7.8*	7.6*	9.2**	9.7**	8.4*	7.2	6.6	6.5	7.1*
Bonus for Non-Executives	-7.2	-8.6*	-8.5*	-8.5*	-8.5*	-3.1	-4.8	-4.97	-4.9	-4.9
Ownership of Shares	4.1**	4.3**	4.2*	5.1***	4.6**	3.1*	3.1*	1.8	2.9*	2.1
Long-Term Bonus		11.1**	11.3***	15.6***	15.9***		10.1***	10.4***	10.7**	11.4***
Contract Length			-0.56	-1.3	-0.94			-0.82	-1.24	-0.85
Job Tenure			0.29		1.38			1.55		1.72
Age of Executives				-0.55	-0.71**				0.04	-0.15
Financial Dummy	-3.67	-4.71	-4.94	-4.20	-4.14	-1.34	-2.30	-2.78	-2.64	-2.62
# of Obs.	180	180	180	180	180	165	165	165	165	165
R ²	22.4%	26.7%	26.9%	29.6%	30.7%	19.1%	24.1%	26.8%	24.9%	26.9%

Notes: * p<.1; ** p<.05; *** p<.01; Control variables: Firm size, leverage, and time dummies.

Table 2.3: Random Effects GLS estimates for incentives vis-à-vis ROA as a deviation from sector median.

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
CGI Score						0.19**	0.17**	0.15*	0.17**	0.13*
Base Wage	1.7	1.7	1.8	2.0*	2.1*	0.49	0.66	0.99	0.9	0.99
Bonus for Executives	3.6**	3.1*	2.9*	3.9**	4.2**	3.1*	2.7	2.3	2.8	3.1*
Bonus for Non-Executives	-2.2	-2.7	-2.7	-2.6	-2.7	-1.4	-2.0	-2.1	-1.9	-1.9
Ownership of Shares	1.53*	1.58**	1.5	2.1***	1.8**	1.1	1.1	0.61	1.5	1.1
Long-Term Bonus		3.8	3.9	6.6**	6.8**		3.5	3.8*	4.95*	5.3*
Contract Length			-0.38	-0.84	-0.62			-0.65	-0.89	-0.69
Job Tenure			0.18		0.85			0.62		0.90
Age of Executives				-0.35**	-0.44***				-0.14	-0.23
Financial Dummy	-0.66	-1.01	-1.17	-0.69	-0.65	2.33	2.52	2.45	3.62	1.76
# of Obs.	180	180	180	180	180	165	165	165	165	165
R ²	18.5%	21.4%	22.0%	28.0%	30.2%	16.9%	19.9%	23.0%	22.5%	25.1%

Notes: * p<.1; ** p<.05; *** p<.01; Control variables: Firm size, leverage, and time dummies.

Conclusions

This study looked at the impact of incentives and corporate governance on the performance of companies listed in the Saudi stock exchange. The majority of the companies either do not have a standard contract length or offer a contract with less than two years duration. Most top executives, however, spend more than three years in their positions and, on average, one in every five top executives stays longer than 16 years in the company. Our regression analysis shows that the length of the contract and job tenure does not play any significant role in the performance of firms listed at Tadawul.

About a quarter of the companies believe that their top five executive's salary is below their local competitors, and around one in every ten company believe that their top executive salary is better than their competitors. We find some evidence in favor of a positive relationship between the base-wage and firm's performance, which is consistent with the well-known gift-exchange and efficiency wage hypothesis. Companies whose top executives are perceived to be better paid than their local competitors tend to have some signs of better performance. This supports the idea that it is fair to pay certain top executives higher than their competitors as they tend to deliver better results.

Around two out of every three companies offer bonuses to their top five executives. These bonuses are, however based on short term performance, mostly based on accounting profit. Most companies do not offer stock-ownership as part of incentives, which again has a short-term focus. Around 56% of the top executives own their company's shares, 82% of which are a personal investment and not part of the incentives scheme. Both of these have a statistically significant and positive impact on performance. Offering stock-ownership, therefore, has the potential to aligns the best interest of the top executives and shareholders as it positively affects performance. Around 15% of the firms offer long term bonuses in our sample. These companies, however, tend to consistently outperform companies which do not offer retention bonuses. The impact of long-term bonuses on performance is relatively more pronounced than the impact of short-term bonuses.

The majority of the top five executives are in the age range of 36 to 55, with the average age range being 51-55 which is consistent with the US market. An increase in age has a slightly negative impact on ROE and RO. This means that companies may marginally benefit from employing relatively younger top executives.

Around two-thirds of the companies reported that they offer bonuses to non-executive employees with a complex set of criteria to award bonuses. Our regression analysis, however, shows these bonuses have a significant negative impact on performance. Precisely, on average, companies which offer bonuses to their employees end up with 7 to 10 percentage point less return on equity and around 4 to 4.5 percentage points lower returns on assets. This points towards problems in the execution and criteria used for the award of these bonuses. This is an important result that requires further investigation. At the outset, it seems like the criteria used to award these bonuses is not as straight forward as those offered to top executives. It will be useful to investigate this further as bonuses could be counterproductive when the criteria to achieve such bonuses is too stringent or structured such that it raises fairness concerns (such as historically not seen as rewarding as the effort exerted by employees or lack transparency leading to information asymmetry about the allocation of bonuses or spite). Since this is mainly related to corporate governance practices, it is likely that a simply nudging approach to resolve the issue might be useful.

As pointed out earlier, Saudi companies do not offer stock options as part of the incentive schemes. Stock options are believed to be a good tool to align the best interest of the primary stakeholders in the long-term and should be considered in the future.

Whereas incentives play an essential role to induce the agent to work in the best interest of the principal, regulatory environment and a company's culture also play an important role. We capture this by using Alfaisal University's comprehensive corporate governance index. We find that corporate governance a positive and statistically and economically significant impact on return on equity, with and without incentives. We also find evidence in favor of the stakeholder theory as companies who perform better on the stakeholder score tend to perform better.

In conclusion, the existing structure of incentives are mostly suitable to align the short-term interest of the parties. A small number of companies offer long term bonuses which has a significant positive impact on the company's performance. The introduction of long-term bonuses would therefore improve the performance of companies. There is also scope for introducing stock-based incentives as a well as the inclusion of stock-based option in the incentives scheme. Promoting a good governance culture would also improve performance. The bonuses offered to non-executives however show a consistent negative impact on performance which is worth investigating further. Finally, it is important for the policy makers

such as CMA to continue supporting more research like this one to produce clear evidence for the value creation of incentive structure and good governance and disseminating the research findings among stakeholders through various channels.

In short, a review of the incentives schemes in vogue indicates that the existing remuneration fixing procedure followed by companies largely serves the short-term interest of the top management. There is therefore scope for reviewing the company's remuneration policies to make sure it links the performance-based part of the incentives with long-term performance of the company. Promoting transparency in terms of disclosure of the remuneration policy and making sure the remuneration committee works independently with a clear mandate to align the long-term best interest of the stakeholders. Whereas as it is not recommended for regulations to be too prescriptive, it might be useful to consider stock-options or similar schemes.

The CMA [2017 Regulations on Corporate Governance](#) (amended by the Board of CMA in May 2019 Number 3-57-2019) has taken steps in the right direction by issuing detailed regulations promoting transparency through regular disclosure and independence of the Remuneration committee. These regulations originally mandated the disclosure of remuneration for top five executives which is consistent with our recommendation here. The implementation of the relevant principle were postponed to the beginning of 2020. Starting from January 1, 2020, companies are required to provide detail report on the fixed and variable components of compensation package for top five paid executives including CEO and CFO. The disclosure requirement is expected to improve incentive structure. Indeed, empirical evidence from other countries (Magnan and et al. , 2004; Ozkan and et al., 2012; Kim & Shin, 2017) revealed that disclosure requirement result in better pay performance sensitivity which is defined as the degree of change in the wealth of shareholders and executives. The sensitivity of performance related pay is expected to mitigate principal-agent problem and encourage executives to work in the best interest of shareholders. The effectiveness of this regulation can be assessed after few years by replication of the current study.

There is also room for further research to better understand the effectiveness of the incentive schemes. For example, a share in profit offered by most companies could result in earning management or delay in recognition of non-performing loans which amplifies profits but expose companies to higher risk in the future.

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Appendix: Incentives Survey

1. Please provide the name of your company: (نرجو ذكر أسم الشركة)											
2. What is the standard duration of the contract for the top five executives? (ماهي المدة الاعتيادية لعقود كبار التنفيذيين الخمسة في الشركة؟)											
<ul style="list-style-type: none"> • 1 year to 2 years • 3 years to 4 years • 5 years to 6 years • More than 6 years • There is no standard 											
Duration of the contract.											
3. For how long has the top five executives been with the company? (منذ متى كان كبار التنفيذيين الخمسة يعملون في الشركة؟)											
	1 to 3 years	4 to 6 years	7 to 9 years	10 to 13 years	14 to 16 years	more than 16 years					
Executive 1											
Executive 2											
Executive 3											
Executive 4											
Executive 5											
Age Range:											
4. What is the age range of the top five executives? (ماهي الفئة العمرية لكبار التنفيذيين الخمسة؟)											
	20 to 25	26 to 30	31 to 35	36 to 40	41 to 45	46 to 50	51 to 55	56 to 60	61 to 65	66 to 70	More than 70
Executive 1											
Executive 2											
Executive 3											

Executive 4											
Executive 5											

Base Salary:

5. How would you rate your top five executive's base salary in relative to your competitors in Saudi Arabia?

(كيف تقيم الرواتب الأساسية لكبار التنفيذيين الخمسة بالمقارنة مع الشركات المنافسة في السعودية؟)

1	Extremely lower than competitors (أقل من المنافسين بكثير)
2	
3	
4	
5	Extremely higher than competitors (أعلى من المنافسين بكثير)

Bonus Pay:

6A. Is there any bonus pay for the top five executives?

(هل هناك اي مكافآت لكبار التنفيذيين الخمسة؟)

- Yes
- No

6B. What is basis of the bonus?

(ما هو اساس هذ المكافآت؟)

- Profit (الربحية)
- Stock Performance (أداء السهم)
- Other (أخرى)

Retention Bonus

7A. Does any of the executives receive any bonus if they stay longer?

(هل هناك احد من كبار التنفيذيين الخمسة يأخذ مكافأة لبقاءه لمدة أطول؟)

- Yes
- No

7B. Please provide details of the retention bonus, if any:

(نرجو ذكر تفاصيل عن هذا النوع من المكافآت، ان وجدت)
Stock ownership:
8A. Does any of the top five executives own any share in the company? (هل هناك أحد من كبار التنفيذيين الخمسة يملك أسهم في الشركة؟)
<ul style="list-style-type: none"> • Yes • No
8B. Is it personal investment or part of the incentives? (هل هو استثمار شخصي أم هو جزء من مكافآت التحفيز؟)
<ul style="list-style-type: none"> • Personal Investment (استثمار شخصي) • Part of the Incentives (جزء من مكافآت التحفيز)
8C. What is the percentage of the shares owned by the top five executives, collectively? (ماهي نسبة تملك كبار التنفيذيين الخمسة لأسهم الشركة، بشكل إجمالي؟)
<ul style="list-style-type: none"> • 0% - 5% • 6% - 10% • 11% - 15% • 16% - 20% • Above 20%
8D. Does any of the following restrictions apply to the ownership of shares? (You can check more than one choice) (هل ينطبق أحد القيود ادناه على تملك التنفيذيين لأسهم الشركة؟)
<ul style="list-style-type: none"> • Non-transferable: cannot be sold or given away (لا يمكن نقلها او بيعها) • Vesting provision: Executive must stay with the company for a qualifying period (يجب على التنفيذي (البقاء في الشركة لمدة محددة • Actual shares are not issued but the executive receive capital gain at the end without sharing in losses (لا يتم الإصدار الفعلي للأسهم ويتم مكافأة التنفيذي من خلال الربح الرأسمالي فقط) • Actual shares are not issued but the executive receive a capital gain or incur a loss at the end (لا يتم الإصدار الفعلي للأسهم ويتم مكافأة التنفيذي من خلال الربح أو الخسارة الرأسمالية) • The executive is not allowed to short-sell the stock (لا يمكن للتفيذي بيع الأسهم على المكشوف) • Any other restriction? Please provide details (أي قيود أخرى؟) <p>_____</p> <p>_____</p>
Stock Option:

<p>9A. Does the compensation package include a "stock option" for any of the executives? i.e., a right, but not the obligation, to purchase shares in the future at some pre-specified exercise price (هل تشمل حزمة التعويضات على خيار شراء الأسهم لأي من كبار التنفيذيين الخمسة؟)</p>
<ul style="list-style-type: none"> • Yes • No
<p>9B. How many of the top five executives receive the stock option? (كم عدد كبار التنفيذيين الخمسة الذين يحصلون على خيار شراء الأسهم؟)</p>
<p>9C. When can it be exercised? (متى يمكن تنفيذ الخيار؟)</p>
<p>Any other incentives?</p>
<p>10A. Is there any other incentive (compensations methods) not mentioned above for the top five executives? (هل هناك اي حوافز اخرى لكبار التنفيذيين الخمسة لم يتم ذكرها سابقاً؟)</p>
<ul style="list-style-type: none"> • Yes • No
<p>10B. Please provide details of the other executive incentives, if any: (نرجو ذكر تفاصيل هذه الحوافز الأخرى، إن وجدت)</p>
<p>Performance based bonuses for non-executives.</p>
<p>11A. Do you have any performance-based bonus for non-executive employees? (هل لديكم تحفيزات لغير التنفيذيين تعتمد على الأداء بشكل عام؟)</p>
<p>11B. Please specify the nature of the bonus for non-executive employees: (نرجو ذكر تفاصيل هذا النوع من التحفيزات)</p>