

THEORETICAL FOUNDATION OF DIVERSIFICATION DECISIONS: OPPORTUNISM OR FINANCIAL BENEFITS

Raffaele Staglianò*, Maurizio La Rocca**

Abstract

The impact of firm diversification on firm value has received considerable attention from economists. However, there is no consensus on the direction of this relationship. It may be that theoretical and empirical models do not capture several complexities of real-life setting, that affect the motivation to diversify. This article surveys recent studies that extend traditional frameworks to incorporate relevant aspect of corporate governance topics.

Keywords: agency costs, information asymmetry, corporate diversification, firm value.

* *University of Toulouse 1 Capitole (France). E-mail: stagliaraffy@yahoo.it*

** *University of Calabria (Italy). E-mail: m.larocca@unical.it*

1. Introduction

Diversification decision is a controversial topic. There is substantial empirical work that confirms the existence of a relationship between corporate diversification and firm value. However, there is no consensus on the direction of this relationship (Martin and Sayrak, 2003; Villalonga, 2003).

Previous studies relating firm value (often measured by Tobin's Q) to diversification found it to be value destroying giving rise to the term diversification discount (Lang and Stulz, 1994; Berger and Ofek, 1995; Denis et al., 1997, 2002)²⁴. Others address the issue by examining the effects of refocusing (Comment and Jarrell, 1995). In this case, evidence suggests that refocusing are positively related to shareholder wealth (Servaes, 1996; Berger and Ofek, 1999). Nevertheless, the diversification discounts have been shown to lessen, disappear, or become premiums in recent literature after correcting for measurement errors in Tobin's q (Whited, 2001), when considering factors that cause firms to diversify and the decision to diversify as endogenous (Campa and Kedia, 2002; Villalonga, 2004; Jandik and Makhija, 2005) and using alternative indicators other

than the excess value methodology (Marinelli, 2008; Tong, 2010).

Further explanation is offered by Schoar (2002). She shows that, plants in diversified firms are more productive than those in comparable single-segment firms, although conglomerates are traded at an average discount²⁵. Santalo and Becerra (2008) show that the effect of diversification on performance is not homogeneous across industries: diversified firms perform better in industries with a small number of non-diversified competitors. Controlling for different Economic freedom and development indexes, Moeller and Schlingemann (2005) and Ngo and Surendranath (2009), find that globally-diversified firms can create more value by carefully selecting locations for their foreign segments in countries that rate highly on key indices of economic freedom and legal better shareholder rights.

The foundation of the existent controversial results concerns the source of the discount (or premium) caused by diversification decisions. Financial studies offer two competing theoretical perspectives providing theoretical motivations for diversification²⁶: agency costs and information asymmetry arguments.

²⁴ Other studies provide evidence on the performance consequence of innovation by diversified firms (Francis and Smith, 1995; Cardinal and Opler 1995; Chen 2008). Chang et al (2009) analyse stock price responses to their R&D increase announcements considering diversified announcing firms and focused announcing firms and find that diversified announcing firms suffer significantly negative stock price responses to such announcements.

²⁵ Choe and Yin (2009) provide theory supporting Schoar's findings, and identify conditions under which there can be a diversification discount or a premium.

²⁶ Research work explaining why firms diversify, in the management, financial and economic literature, is synthesized by Montgomery (1994). See also Davies et al. (2001), Bottazzi and Secchi (2005), Gourlay and Seaton (2004), and Ng (2007).

The first perspective, based on the effect of risk reduction and private benefits explanations, considers diversification as a decision taken for opportunistic reasons (Jensen and Meckling 1976, Amibud and Lev 1981, Jensen 1986, Stulz 1990, Shleifer and Vishny 1989). This explanation is consistent with a negative effect of diversification on firm performance. Many authors (Lang and Stulz, 1994; Berger and Ofek, 1995; Comment and Jarrell, 1995; Denis et al., 1997; Servaes, 1996; Aggarwal and Samwick, 2003) showed that firm value is decreasing in diversification due to this motivation.

The second concerns the benefits of corporate diversification. It is argued that the extent of corporate diversification is related to the level of information asymmetry between managers and outside investors (Hadlock et al., 2001; Thomas 2002) and to the efficiency of the internal capital markets (Stein, 1997; Rajan et al., 2000).

These are two competing arguments that, although both based on managerial discretion, consider diversification decisions differently as an output of opportunistic behaviours, or as a means to foster firms' efficiency. Hyland and Diltz (2002), Doukas and Kan (2008) attempt to jointly explain both agency costs and information asymmetry arguments. Hyland and Diltz (2002) find evidence to support agency costs explanation. They find that diversifying firms have more cash on hand, lower research and development investments, and large compensation compared to their specialized counterparts. Doukas and Kan (2008), studying changes in corporate diversification through acquisitions, find a negative relation between core cash flows and the decision to diversify in US market. They interpret this result as evidence of internal capital market efficiency because firms that experience higher core cash flows should have no incentive to diversify. This article contributes to the above debate by describing the differences in "classic approach" and reviewing a number of recent models and empirical studies to provide indications for future research and managerial implications. The paper contains predominantly working papers and newly published papers in order to capture the most recent research. In this essay, section 2 describes the two competing theories that seek to justify the value of diversification decisions. Section 3 addresses recent approaches to corporate diversification. The conclusion follows in section 4.

2. Why firms diversify

Table 1 reports the main firm-specific determinants of diversification, the expected sign and empirical evidences²⁷.

²⁷ In general, comparisons suffer from the fact that these studies used different measures of firm characteristics,

2.1 Agency explanations and corporate diversification

There are many possible agency motivations to diversify. First of all managers choose to diversify firms' activities based on risk reduction explanation. In this case, managers derive utility from reducing the idiosyncratic risk that they face. If managers have higher equity ownership in their firms, they face higher idiosyncratic risk from incentives and therefore diversify their firms more to lower that risk. Amibud and Lev (1981) and May (1995), find that as managers own more of the equity of their own firms they will be more likely to diversify. These authors interpret this positive relationship between diversification and managerial equity ownership as support for the risk reduction explanation. In contrast, Denis et al. (1997) find a negative relation between the level of diversification and managerial equity ownership. They interpret this as evidence that higher equity ownership, implying a greater fraction of the costs associated with value-reducing actions, outweigh the private benefits managers derive from diversifying. Nam et al (2006) extend previous empirical analysis considering the executive compensation contracts. They find that equity-based compensation on diversified firms, where the agency related problems are expected to be more severe, is much greater than for focused firms. They also find that the negative effect of diversification on value is significantly less for firms with high equity-based compensation for their CEOs.

Secondly, managers may pursue diversification to increase private benefits. According to the agency costs of free cash flow arguments, discretionary power pushes toward diversification as a result of opportunistic behaviours and inefficiency in the firm. Jensen's (1986) managerial discretion hypothesis provides an explanation of problems of overinvestment due to free cash flow²⁸. With excess free cash flow, after valuable investments are carried out, managers have greater discretion to increase firm size through diversification (over-diversification) because it increases manager compensation, power and control. Jensen (1986) concludes that managers of firms with abundant cash flow are more likely to undertake low-benefit or even value-destroying decisions in terms of diversification strategies, especially in industries distant from the core-business²⁹. Jiraporn et al. (2006), based on Jensen's

different diversification measures, different time periods and different methodologies of estimations.

²⁸ Private benefits may arise because, for example, diversified firm become more unique making managers more valuable to the firm. (Morck et al., 1990).

²⁹ Gibbs (1993) consider limited profitable investment opportunities, cash flow from operations, low financial

(1986) intuitions show that when shareholder rights (measured by governance index as suggested by Gompers et al. 2003) are limited, firms are more likely to diversify and in these cases firms suffer a deeper diversification discount. Harford (1999) considering firms that realise diversifying acquisitions, find that cash-rich firms are more likely to make value-destroying acquisitions than firms that are not cash-rich.

leverage and high levels of diversification as indicators of free cash flow.

Table 1. Determinants of diversification

Diversification determinants	Agency perspective		Diversification determinants	Efficient view perspective	
	Sign Expected	Authors		Sign Expected	Authors
Cash Flow	+	Gibbs (1993); Harford (1999); Hyland and Diltz (2002).	Cash Flow	-	Doukas and Kan (2008); Duckin (2010).
Debt	-	Hyland and Diltz (2002); Doukas and Kan (2008).	Debt	+	Comment and Jarrell (1995); Low and Chen (2004).
Equity based compensation	+/-	Amibud and Lev (1981) and May (1995); Khanna and Palepu (2000); Denis et al. (1997), Nam et al. (2006); Aggarwal and Samwick (2003); Scharfstein (1998).	Shareholder rights	+	Hadlock et al. (2001); Thomas (2002).
Shareholder rights	-	Jiraporn et al. (2006).			

The agency costs of free cash flow perspective (Jensen 1986) pointed out the disciplining role of debt on managerial behaviour, in that it reduces managerial discretion. Empire-building preferences will cause managers to spend available financial funds excessively on unprofitable investment projects. In this case, assuming that debt can be considered a rule-based governance structure and equity as a discretionary governance device³⁰, debt exerts pressure in favour of efficient behaviours because the manager of a highly levered firm will have less cash available for diversification (Jensen 1986). Moreover, debt acts as a disciplinary mechanism and firms with more debt are more likely to be monitored by their debt holders. It follows that monitored firms are less likely to diversify as a consequence of opportunistic behaviours. Thus, the Jensen perspective supports the positive role of debt in reducing the ability of a manager to realize detrimental diversification strategies, especially unrelated ones (Morck et al. 1990).

Aggarwal and Samwick (2003) present a model that incorporates both types of agency explanations. In their model, the levels of incentives (ownership and stock options) are not exogenous but are a result of optimal contracting. The optimal contract depends on several exogenous parameters on risk reduction and private benefit motives for diversification. In line with May (1995), they find a positive relationship between

diversification and incentives but theoretically this finding cannot be explained by the risk reduction motive. In their model, managers who have a greater need for risk reduction (i.e., those with high risk aversion) are the ones who will have lower incentives. These are also the managers who will diversify more to offset their risk exposure. This leads to conclusion that the positive relation constitutes support for the private benefits motive.

2.2 Efficient view of corporate diversification

An important source of financial wedge may be asymmetric information and the cost of contracting between companies and potential providers of external financing (Stein 1997, Kaplan and Zingales 1997). Several studies predicts a negative relationship between corporate diversification and information asymmetry. Hadlock et al. (2001) argue that corporate diversification reduces asymmetric information that causes negative market reaction to seasoned equity offering. Thomas (2002) finds that compared to diversified firms, focused firms have larger forecast errors and witness significantly larger three-day abnormal returns (considered as the market's reaction to insiders' informational advantage over outsiders about the operations of their firms) around earnings announcements. Atallah et al. (2009), distinguish between industrial diversification and geographic diversification. They find that only geographic diversification and not industrial diversification is related negatively to information asymmetry.

According to the internal capital markets hypothesis, corporate diversification is expected to result in efficiency gains arising from the development of internal capital markets. When the external capital market fails to allocate resources in an

³⁰ Debt financing requires a firm to make interest and principal payments according to a schedule stipulated in the contract; in the event of default, debt holders may exercise their pre-emptive claims against the firm's assets (Shleifer and Vishny 1992). At the same time, the shareholders bear a residual-claimant status with regard to earnings and to assets liquidation. Their relations with the firms last for the lifetime of the business.

efficient manner, managers may attempt to create an internal capital market in order to solve problems of asymmetric information (Stein 1997, Khanna and Palepu 1997 and 2000; Peyer and Shivdasani 2001). Transaction costs and asymmetric information costs in the external capital market raise the magnitude of financial constraints. On the contrary, the internal capital markets of diversified firms enable them to fund profitable projects that the external capital market would not be able to finance (Stein, 1997). Firms that are able to generate higher cash flow are also able to have easier access to credit, cheaper cost of capital and more available finance, especially with the diffusion of the rating culture. Firms with low financial performance (low cash flow), operating in an inefficient external capital market, try to realize an internal capital market able to combine the cash flows of many divisions through diversification. As a consequence, firms with higher capacity to generate cash flow are less interested in the benefits of an internal capital market through diversification. In this paper, a negative link between cash flow and diversification is assumed, and this effect is particularly relevant with regard to unrelated diversification.

While Scharfstein (1998), Scharfstein and Stein (2000) and Rajan et al (2000) theoretically and empirically find that diversification leads to inefficient fund allocations across divisions, Duckin (2010) find that diversification in investment opportunity is positively related to efficient transfers across divisions, and that firms hold less cash when transfers are abundant. Moreover, diversified acquisitions (acquisition with lower correlation between the investment opportunities of the acquirer and the target) are followed by greater reductions in cash holdings.

Jiraporn et al (2008b) considering several proxies for earnings management find that this last is not mitigated by geographic diversification whereas industrial diversification (and the combination of both industrial and geographic diversification) helps alleviate earnings management. Authors explain this result with the efficiency of internal capital market hypothesis. The accruals (a proxy for the degree of earnings management) in different divisions in the diversified firm are less than perfectly correlated and tend to cancel out, making it difficult for managers to manage earnings considerably in either direction.

The internal capital market can provide benefits with the intent of maintaining control over firms' financial needs (Lewellen 1971, Kim and McConnell 1977). An important benefit associated with the decision to diversify is the reduction in the firm's operating risk because of mutual financial support among the different business units (coinsurance effect). The use of debt requires the firm to make interest and principal payments according to a schedule stipulated in the contract.

As a consequence, the firm will prefer to become diversified because the diversification makes it more comfortable in being able to face all the payment deadlines, essentially based on the reduction in operating risk which occurs when a firm runs businesses with cash flows which are less than perfectly correlated³¹. Consistently with the coinsurance effect, a firm, especially if financially constrained, can increase its debt capacity by diversifying its business, thus reducing the magnitude of its financial constraint through this extra debt capacity. This effect is more important for firms that develop unrelated diversification strategies because the lack of correlation between businesses is greater (Kim and McConnell 1977). Consistent with Kim and McConnell (1977) and Bergh (1997) this is one of the most important value-increasing sources associated with unrelated diversification. Firms that follow unrelated diversification can support more debt and benefit from the fiscal advantages related to debt financing (Bergh 1997)³². However, Comment and Jarrell (1995) find little evidence that diversified firms use substantially more debt than focused firms. Low and Chen (2004) show that product diversification is positively related to leverage. Diversification allows firms to reduce their risks, thus enabling firms to hold higher debt levels.

3. Recent approach on corporate diversification

Recent empirical studies have extended the analysis on the role of internal corporate governance mechanisms considering, for example, the role of board composition (Gillan, 2006). Jiraporn et al (2008a) examine the impact of multiple directorships on the value of diversification. They find that firms where directors are busier suffer a deeper diversification discount. Authors explain that directors who serve on multiple boards are too busy to adequately monitor management. Poor managerial oversight may exacerbate agency conflicts, thus facilitating diversification decisions that destroy firm value.

Chen et al. (2009) examine the board's influence on product and geographic diversification. Considering the proportion of independent directors, the proportion of institutional representatives and the proportion of busy directors, they do not find

³¹ High-levered firms have a higher capacity to meet scheduled debt payment by diversifying their businesses. Through diversification, creditors of high-levered firms can rely on the combined fortunes of all the diversified firm's operating units and on the reduction in variance of future cash flows.

³² The tax liability of the diversified firm may be less than the cumulated tax liabilities of the different (single) business units.

evidence for agency theory predictions. Their results are consistent with managerial hegemony and resource dependency theories (Kosnik, 1987; Fich and Shivdasani, 2006). Kim et al (2009), according to agency theory, find a positive relation between CEO duality (CEO has a legitimate power in both the top management team and board) and unrelated diversification. Authors argue that CEO duality creates a context conducive to allowing CEOs to engage in opportunistic behaviours (unrelated diversifications). Cuervo and Reyes (2007), analyzing the substitution effect between ownership concentration and board of director on firm value, argue that board of director have a positive effect on firm value in diversified firms.

Families represent an important class of large shareholders who potentially have unique incentive structures and a strong voice in the firm's decision making. Family firms consider the company as a family asset to combine with their personal wealth, as an undiversified holding (Casson 1999; Claessens et al. 2002). As a consequence, family firms can search for risk reduction strategies through diversification to make up for their lack of personal diversification, against minority shareholders. Tsai et al (2009), considering Taiwanese firms, find that that family CEO firms have greater incentive to reduce firm-specific risk, by implementing diversification, than do non-family CEO firms in order to maintain family prestige and wealth. They also find that diversified firms have lower performance-turnover sensitivities than focused firms. Authors interpret this result as evidence that governance is weak in family firms. Conversely, Gomez-Mejia et al (2010), find that family firms diversify less both domestically and internationally than non-family firms.

Classic research has focused on the causes and consequences of industrial diversification. In recent years, the relation between firm value and geographic diversification has become an important empirical issue in corporate finance. Denis et al. (2002) and Kim and Mathur (2008) find that the valuation effects of both geographic and industrial diversification are negative. They attribute the global diversification discount to the same factor as for industrial diversification, namely the agency perspective. Doukas and Pantzalis (2003) and Low and Chen (2004) examines the agency conflicts between shareholders and bondholders of multinational and non-multinational firms. They argue that multinational corporations are susceptible to higher agency costs of debt than domestic corporations because geographic diversity renders active monitoring more difficult and expensive in comparison to domestic firms.

Recent empirical studies have also analyzed the impact of diversification decisions in the context of emerging markets. Also in this case, the diversification-performance link is still an open

empirical question. Fauver et al. (2003) report that while in developed economies, there exists a significant diversification discount, in the lower income economies with segmented markets, there is no diversification discount. Lins and Servaes (2002) report that in seven Asian emerging markets, diversified firms trade at a discount and that entrenched insiders use the diversified firm structure to expropriate wealth from minority shareholders. Also Singh et al. (2007) find that agency conflict may explain the negative link between performance and the degree of diversification.

In general, empirical studies regarding industrial diversification determinants are mostly based on a general decision to diversify in more than one business. However, there should be, at least theoretically, different motivations in the decision to diversify in new industries, due to the fact that these new activities can be related or not-related to the core business. Thus, sorting diversification phenomena into related and unrelated ones has an important effect, that can enhance our understanding of the reasons for diversification (Ramaswamy et al. 2004, Palich et al. 2000, Chatterjee and Wernerfelt 1991). Dundas and Richardson (1980) and Khanna and Palepu (1997 and 2000) argued that the direction of diversification is based on specific types of market failure. Imperfections in the product and technological markets lead to related diversified firms, while financial capital market failure and inefficiency in the financial system give rise to unrelated diversified firms. Therefore, taking into account related and unrelated diversification, different motivations to diversify can exist for management determination. Ramaswamy et al. (2004), Doukas, J. and Kan, O. (2008) and Aoki (2009), examine unrelated diversification, because expect to show stronger effect for unrelated decisions to diversify. Combining businesses that are not correlated, because the activities are different, distinct and without area of overlap, provides a natural context for conflict of interests among divisions, managers and investors. At the same time, in a context in which a firm decides to combine businesses whose cash flows are less than perfectly correlated, the benefits associated to an internal capital market are greater.

To sum-up, drawing on evidence from agency theory and efficiency view argument, several important findings emerge in recent literature. A number of corporate governance elements, as the board composition, the family business and the institutional contests, are relevant in examining corporate diversification. In addition, new evidences explain that the distinction between product and geographic diversification and between related and unrelated diversification is very crucial because these forms of diversification may have different impact on the firm value.

4. Conclusion

This article survey recent studies that extend traditional frameworks on the value of diversification and its determinants. The purpose of this article, and of the studies it surveys, is not to claim that diversification decisions is definitely efficient (or inefficient), but to highlight the two-sided nature of this topic and the need for further research to draw clearer conclusions.

There are two competing arguments that, although both based on managerial discretion, consider diversification decisions differently as an output of opportunistic behaviours, or as a means to foster efficiency in firms. Controversial results are based on the fact that these two counteracting effects are shaped by the direction of diversification decisions and by the context of analysis.

In general, the results regarding product diversification determinants are mostly based on a general decision to diversify in more than one business, without attention on the status of geographic diversification. Recent evidences explain that the distinction between product and geographic diversification and between related and unrelated diversification have an important effect, that can enhance our understanding of the reasons for diversification. Moreover, the type of relatedness in the diversification extent is affected by the contest where the firm is based. Taking into account related and unrelated diversification and the institutional environment in which firms operate, different motivations to diversify can exist for management determination.

Although studies were interested in the general (net) effect, controversial results can be due to the fact that the roles of these two opposing arguments are not mutually exclusive; both theory can work concurrently. Therefore, future studies need to analyse sub-groups of firms according to factors related to higher probability of opportunistic problems, or with regard to relevant financial constraint problems. This could be a direction to understand which factors allow more for opportunism in diversification decisions or for the search of financial benefits. By considering both the effects of these factors, a firm can work to optimize its diversification strategy and maximize its value.

Furthermore, considering that the motivations influencing managerial decisions regarding diversification status (decision to operate in only one business or in more the one business segment) and diversification extent (decision to change the intensity of the diversification) can be different, we wish to verify empirically the validity of the separation between managerial decisions regarding diversification status and diversification extent.

References

1. Aggarwal, R. K. and Samwick, A. A. (2003), "Why do managers diversify their firms? Agency reconsidered", *Journal of Finance*, 58, pp.71–118.
2. Amihud, Y. and Lev, B. (1981), "Risk reduction as a managerial motive for conglomerate mergers", *Bell Journal of Economics*, 12: 605-617.
3. Aoki, H. (2009), "The decrease in diversification and corporate governance: evidence from Japanese firms", *Corporate Ownership & Control*, 6, pp.28-39.
4. Ataullah, A., Davidson I. and Le H. (2009), "Corporate Diversification, Information Asymmetry and Insiders' Trading", Working paper series (available at www.efmaefm.org/.../2009-milan/EFMA2009_0709_fullpaper.pdf).
5. Berger, P.G. and Ofek, E. (1995) "Diversification's effect on firm value", *Journal of Financial Economics*, 37, 1, pp. 39-65.
6. Berger, P.G. and Ofek E. (1999), "Causes and effects of corporate refocusing programs", *Review of Financial Studies*, 12, pp.311-345.
7. Bergh, D. (1997), "Predicting divestiture of unrelated acquisitions: An integrative model of ex-ante conditions", *Strategic Management Journal*, 18, pp.715-731.
8. Bottazzi, G. and Secchi, A. (2005), "Growth and Diversification Patterns of the Worldwide Pharmaceutical Industry", *Review of Industrial Organization*, 26, 2, pp.195-216.
9. Campa, J.M., Kedia, S. (2002), "Explaining the diversification discount", *Journal of Finance*, 57, 1731–1762.
10. Cardinal, L.B. and Opler T.C. (1995), "Corporate diversification and innovation efficiency: An empirical study", *Journal of Accounting and Economics*, 19, pp. 365-381.
11. Chang S.-C. , Wang C.-F., and Chen L.-Y. (2009), "Corporate Diversification and the Market Value of R&D Innovation", Working paper series (available at <http://ssrn.com/abstract=1460726>)
12. Chatterjee, S. and Wernerfelt, B. (1991), "The link between resources and type of diversification: theory and evidence", *Strategic Management Journal*, 12, pp. 33-48.
13. Chen, S.S. (2008), "Organizational form and the economic impact of corporate new product strategies", *Journal of Business Finance and Accounting*, 35(1/2), pp.71-101.
14. Claessens, S., Djankov, S., Fan, J. and Lang, L. (2000), "Disentangling the Incentive and Entrenchment Effects of Large Shareholdings", *Journal of Finance*, 57, 6, pp. 2741-2771.
15. Choe, C., and X.,Yin (2009), "Diversification discount, information rents, and internal capital markets", *The Quarterly Review of Economics and Finance*, 49, 178–196.
16. Comment, R., Jarrell G.A. (1995), "Corporate focus and stock returns", *Journal of Financial Economics*, 37, pp. 67– 87.
17. Cuervo, Á, and Reyes L. (2007), "The substitution effect between managerial control mechanisms and its effect on the creation of value in reference to firm diversification", *Corporate Ownership & Control*, 5, pp.382-396.

18. Davies, S., Rondi, L. and Sembenelli, A. (2001), "Are multinationality and diversification complementary or substitute strategies? An empirical analysis on European leading firms", *International Journal of Industrial Organization*, 19, pp.1315-1346.
19. Denis, D., Denis, D. and Sarin A. (1997), "Agency problems, equity ownership, and corporate diversification", *Journal of Finance*, 52, pp.135-160.
20. Denis, D.J., Denis, D.K. and Yost K. (2002), "Global diversification, industrial diversification, and firm value", *Journal of Finance*, 57, pp.1951-1979.
21. Doukas, J. and Pantzalis C. (2003), "Geographic diversification and agency costs of debt of multinational firms", *Journal of Corporate Finance*, 9, pp.59-92.
22. Doukas, J. and Kan, O. (2004) 'Excessive Cash Flows and Diversification Discount', *Financial Management*, 33, 2, pp. 71-88.
23. Doukas, J. and Kan, O. (2008) "Investment decisions and internal capital markets: evidence from acquisitions", *Journal of Banking & Finance*, 32, 8, pp. 1484-1498.
24. Duchin R., "Cash holdings and corporate diversification", *Journal of Finance*, forthcoming.
25. Dundas, K. and Richardson, P. (1980) 'Corporate strategy and the concept of market failure', *Strategic Management Journal*, 1(2): 177-188.
26. Fauver, L., Houston, J. and Naranjo, A. (2003), "Capital Market Development, International Integration, Legal Systems, and the Value of Corporate Diversification: A Cross-Country Analysis", *Journal of Financial and Quantitative Analysis*, 38, pp.135-157.
27. Fich, E. M. and Shivdasani, A. (2006), "Are busy boards effective monitors?", *Journal of Finance*, 61: 689-724.
28. Francis, J. and Smith, A. (1995), "Agency costs and innovation: Some empirical evidence", *Journal of Accounting & Economics*, 19, pp.383-409.
29. Gomez-Mejia, Luis R.; Makri, M. and Larraza, K.M. (2010), "Diversification Decisions in Family-Controlled Firms", *Journal of Management Studies*, 47, pp.223-252.
30. Gibbs P.A.(1993), "Determinants of corporate restructuring: the relative importance of corporate governance, takeover threat, and free cash flow", *Strategic Management Journal*, 14, pp.58-68.
31. Gompers, P., Ishii, J., and Matrick, A. (2003), "Corporate governance and equity prices", *Quarterly Journal of Economics*, 118, pp.107-155
32. Gourlay, A. and Seaton, J. (2004) "The determinants of firm diversification in UK quoted companies", *Applied Economics*, 36: 2059-2071.
33. Hadlock, C., Ryngaer, M. and Shawn, T. (2001), "Corporate structure and equity offerings: Are there benefits to diversification?", *Journal of Business*, 74: 613-635.
34. Harford J.(1999), "Corporate Cash Reserves and Acquisitions", *Journal of Finance*, 6, pp. 1969-97.
35. Hyland, D. and Diltz, J. (2002), "Why Firms Diversify: An Empirical Examination", *Financial Management*, 31(1): 51-81.
36. Jandik T., and A K. Makhija (2005), "Can Diversification Create Value? Evidence from the Electric Utility Industry", *Financial Management*, Vol. 34, 1, pp.61-93.
37. Jiraporn, P., Y. S. Kim, W. N. Davidson, and Singh M. (2006), "Corporate governance, shareholder rights and firm diversification: An empirical analysis", *Journal of Banking & Finance*, 30, pp. 947-963.
38. Jiraporn, P., Y. S. Kim, and Davidson III W. N. (2008a), "Multiple directorships and corporate diversification", *Journal of Empirical Finance*, 15, 418-435.
39. Jiraporn, P., Y. S. Kim, and Mathur I. (2008b), "Does corporate diversification exacerbate or mitigate earnings management?: An empirical analysis", *International Review of Financial Analysis*, 17, 1087-1109.
40. Jensen, M. and Meckling, W. (1976), "Theory of the firm: managerial behavior, agency costs and capital structure", *Journal of Financial Economics*, 3, pp. 305-360.
41. Jensen, M. (1986), "Agency costs of free cash flow, corporate finance, and takeovers", *American Economic Review*, 76, pp. 323-9.
42. Kaplan, S. and Zingales, L. (1997), "Do investment-cash flow sensitivities provide useful measures of financing constraints?", *Quarterly Journal of Economics*, 112, pp. 169-215.
43. Khanna, T. and Palepu, K. (1997), "Why focused strategies may be wrong for emerging markets", *Harvard Business Review*, 75: 3-10.
44. Khanna, T. and Palepu, K. (2000), "Is group affiliation profitable in emerging markets? An analysis of diversified Indian business groups", *Journal of Finance*, 55: 867-891.
45. Kim, E. and McConnell, J. (1977), "Corporate mergers and the coinsurance of corporate debt", *Journal of Finance*, 32, pp. 349-365.
46. Kim, K.-H., Hussam, A., Shammari, A., Kim, B., Lee S.-H (2009), "CEO duality leadership and corporate diversification behaviour", *Journal of Business Research*, 62, pp. 1173-1180.
47. Kim, Y. S., and I. Mathur (2008), "The impact of geographic diversification on firm performance", *International Review of Financial Analysis*, 17, pp.747-766
48. Kosnik, R. D. (1987), "Greenmail: A study of board performance in corporate governance", *Administrative Science Quarterly*, 32, pp. 163- 85.
49. Lamont, O. (1997), "Cashflow and investment: Evidence from internal capital markets", *Journal of Finance*, 52: 83-109.
50. Lang, L. and Stulz, R. (1994), "Tobin's q, corporate diversification and firm performance", *Journal of Political Economy*, 102, pp.1248-1280.
51. Lewellen, W. (1971), "A Pure Financial Rationale for the Conglomerate Merger activity", *Journal of Finance*, 26, 2, 795-802.
52. Lewellen, W., Loderer, C. and Rosenfeld, A. (1989), "Mergers, executive risk reduction, and stockholder wealth", *Journal of Financial and Quantitative Analysis*, 24: 459-472.
53. Lins K, Servaes H. (2002), "Is corporate diversification beneficial in emerging markets?", *Financial Management*, 31, pp.5-31.
54. Low, P. Y. and K. Chen, H. (2004), "Diversification and capital structure: Some international evidence", *Review of Quantitative Finance and Accounting*, 23, pp. 55-71.

55. Marinelli F. (2008), "Persistence of Outstanding Performance and Shareholder Value among Diversified Firms: The Impact of Past Performance, Efficient Internal Capital Market, and Relatedness of Business Segments", Working paper series (available at <http://ssrn.com/abstract=1269366>)
56. Markides, C. and Williamson, P. (1994), "Related diversification, core competences and corporate performance", *Strategic Management Journal*, 15, pp.149-165.
57. Martin, J.D. and A. Sayrak (2003), "Corporate diversification and shareholder value a survey of recent literature", *Journal of Corporate Finance*, 9, pp. 37-57.
58. May, D. O. (1995) "Do managerial motives influence firm risk reduction strategies?", *Journal of Finance*, 50, pp.1291-1308.
59. Montgomery, C. (1994) 'Corporate diversification', *Journal of Economic Perspectives*, 8(3): 163-178.
60. Morck, R., Shleifer, A. and Vishny, R. (1990), "Do managerial objectives drive bad acquisitions?", *Journal of Finance*, 45, pp. 31-48.
61. Moeller, S. and F., Schlingemann (2005), "Global diversification and bidder gains: A comparison between cross-border and domestic acquisitions", *Journal of Banking and Finance*, 29, pp.533-564.
62. Nam, J., C. Tang, J. H. Thornton Jr, and, Wynne K. (2006), "The effect of agency costs on the value of single-segment and multi-segment firms", *Journal of Corporate Finance*, 12, pp. 761- 782.
63. Nayyar, P. (1992), "On the measurement of corporate diversification strategy: Evidence from large U.S. service firms", *Strategic Management Journal*, 13,3, pp. 219-235.
64. Ng D. W. (2007), "A Modern Resource Based Approach to Unrelated Diversification", *Journal of Management Studies*, 44, Issue 8, pp.1481-1502.
65. Ngo, T. and J. Surendranath (2009), "The effect of foreign segment's location on the geographic diversification discount", Working paper series (available at <http://www.fma.org/Reno/RenoProgram.htm>)
66. Palich, L., Cardinal, L. and Miller, C. (2000), "Curvilinearity in the diversification-performance linkage: an examination over three decades of research", *Strategic Management Journal*, 21, pp.155-174.
67. Peyer, U. and Shivdasani, A. (2001), "Leverage and internal capital markets: evidence from leveraged recapitalizations", *Journal of Financial Economics*, 59, 3, pp. 477-515.
68. Rajan, R., Servaes, H. and Zingales, L. (2000), "The cost of diversity: The diversification discount and inefficient investment", *Journal of Finance*, 60, pp.35-80.
69. Ramaswamy, K., Li, M. and Petitt, P. (2004), "Who drives unrelated diversification? A study of Indian manufacturing firms", *Asia Pacific Journal of Management*, 21, pp.403-423.
70. Santalo J. and M. Becerra (2008), "Competition from specialized firms and the diversification performance linkage", *The Journal of Finance*, 63, pp. 852 - 883.
71. Scharfstein, D.S., (1998), "The dark side of internal markets II: Evidence from diversified conglomerates", Working paper series (available at <http://ssrn.com/abstract=226103>)
72. Scharfstein, D., and J., Stein (2000), "The dark side of internal capital markets: Divisional rent seeking and inefficient investment", *The Journal of Finance*, 55, pp. 2537-2567.
73. Schoar, A. (2002), "Effects of corporate diversification on productivity", *The Journal of Finance*, 57, 2379-2403.
74. Servaes, H. (1996), "The value of diversification during the conglomerate merger wave", *The Journal of Finance*, 51, pp.1201-1226.
75. Shleifer, A. and Vishny, R. (1989), "Management entrenchment", *Journal of Financial Economics*, 25, 1, pp. 123-139.
76. Singh M., A. Nejadmalayeri, and I. Mathur (2007), "Performance impact of business group affiliation: An analysis of the diversification-performance link in a developing economy", *Journal of Business Research*, 60, pp. 339-347
77. Stein, J. (1997), "Internal capital markets and competition for corporate resources", *Journal of Finance*, 52, 1, pp. 111-133.
78. Stulz, R. (1990), "Managerial discretion and optimal financing policies", *Journal of Financial Economics*, 26, 1, pp. 3-27.
79. Thomas, S. (2002), "Firm diversification and asymmetric information: evidence from analysts' forecasts and earnings announcements", *Journal of Financial Economics*, Vol. 64, pp. 373- 396.
80. Tong Z., "Firm diversification and the value of corporate cash holdings", *Journal of Corporate Finance*, forthcoming.
81. Tsai, W.-H., Y.-C., Kuo and J.-H. Hung (2009), "Corporate diversification and CEO turnover in family businesses: self-entrenchment or risk reduction?", *Small Business Economics*, 32, pp.57-76.
82. Villalonga, B. (2003), "Research roundtable discussion: The diversification discount", Working paper series (available at SSRN: <http://ssrn.com/abstract=402220>).
83. Villalonga, B. (2004), "Diversification discount or premium? New evidence from BITS establishment level data", *Journal of Finance*, 59, pp.475-502.
84. Wernerfelt, B. (1984), "A resource-based view of the firm", *Strategic Management Journal*, 5: 171-180.
85. Whited, T. M. (2001), "Is it Inefficient Investment that Causes the Diversification Discount?", *The Journal of Finance*, 56, pp.1667-1691.