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The market for corporate control and the cost of debt ☆

Jiaping Qiu [a], Fan Yu [b,*]

[a] DeGroote School of Business, McMaster University, Hamilton, Ontario, Canada L8S 4M4
[b] Robert Day School of Economics and Finance, Claremont McKenna College, Claremont, CA 91711, USA

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ABSTRACT

How do bondholders view the existence of an open market for corporate control? Between 1985 and 1991, 30 states in the U.S. enacted business combination (BC) laws, raising the cost of corporate takeovers. Relying on these exogenous events, we estimate the influence of the market for corporate control on the cost of debt. We identify different channels through which an open market for corporate control can benefit or harm bondholders: a reduction in managerial slack or the "quiet life," resulting in higher profitability and firm value; a coinsurance effect, in which firms become less risky after being acquired; and an increasing leverage effect, in which bondholder wealth is expropriated through leverage-increasing takeovers. Consistent with the first two mechanisms, we find that the cost of debt rose after the passage of the BC laws; moreover, it rose sharply for firms in non-competitive industries, and for firms rated speculative-grade. In contrast, there is virtually no effect for firms in competitive industries, or firms rated investment-grade.

1. Introduction

The market for corporate control, often referred to as the takeover market, can be an effective governance mechanism to discipline managers and reduce agency costs within a firm (e.g., Jensen and Ruback, 1983; Shleifer and Vishny, 1997). However, significant barriers, in the form of antitakeover provisions in a firm's charter and state-level antitakeover laws, can dampen the effectiveness of this important external mechanism of corporate governance. Recently, Gompers, Ishii, and Metrick (2003) show that firms with a greater number of antitakeover provisions in their charters are associated with lower equity returns, suggesting that a weaker market for corporate control could hurt shareholders. This raises an interesting question as to how bondholders—an important group of claimholders in the capital structure—view an open market for corporate control. We make several contributions to this literature. First, we use regulatory events, namely, the passage of second-generation antitakeover laws during 1985–1991 in different states, to identify the relation between the market for corporate control and the cost of debt. This approach avoids the endogeneity problem associated with firm-level governance metrics. Moreover, we recognize that the takeover market—even though it can reduce the moral hazard problem for managers—can often amplify the divergence between shareholder and bondholder interests. Therefore, we identify multiple mechanisms through which the threat of takeovers can influence the cost of debt, and we attempt to disentangle each of these effects from the data.

First, we consider the influence of the takeover market on managerial preferences, which can affect firm value and the welfare of both shareholders and bondholders. The market for corporate control can be viewed as a

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* Corresponding author.
E-mail address: fyu@cmc.edu (F. Yu).

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market in which managers compete for the privilege to manage a firm's resources (Fama, 1980; Jensen and Ruback, 1983). An active takeover market could raise managerial career concerns and reduce managerial slack. In particular, Bertrand and Mullainathan (2003) find that, after the passage of second-generation antitakeover laws, workers' wages rise, firm size and capital expenditures remain unchanged, while profitability and productivity decline. They argue that this is consistent with a quiet life preference, in which managers, when shielded from takeovers, are reluctant to perform cognitively difficult tasks such as closing old plants, starting new ones, or bargaining with suppliers and labor unions. Giroud and Mueller (2008) argue that managerial slack cannot survive in a competitive market and that industry competition can mitigate and even eliminate the managerial preference for the quiet life. By examining the interaction between the passage of antitakeover laws and industry competition, they find that a weakened market for corporate control results in higher input costs, wages, and overhead costs, but only so in non-competitive industries. We therefore label this as the quiet life effect, in which an open market for corporate control reduces managerial slack, increases profitability and firm value, and yields a lower cost of debt; further, the magnitude of the effect is modulated by industry competitiveness.[1]

The effect of an open market for corporate control, however, goes beyond aligning the interests of management and a firm's claimholders. In actual takeovers, the financial risk of both the acquirer and the target often changes significantly. For instance, when two firms with imperfectly correlated cash flows combine, bondholders may benefit from a reduction in total risk. In support of this hypothesis, Billett, King, and Mauer (2004) find that target bondholders earn an average excess return of 1.09% around takeover announcements; they also find a much bigger effect (4.30%) when the target firm is rated speculative-grade. For acquirer bondholders, however, the wealth effects are much smaller. The implication for bondholders in general, not necessarily those whose firms are currently acquiring or being acquired, is that an open market for corporate control leads to a lower cost of debt; in addition, the effect would be more pronounced for firms with higher credit risk. Following Billett, King, and Mauer (2004), we loosely label this as the coinsurance effect.

A more pessimistic view of takeovers, from a bondholder's perspective, is that hostile takeovers can exacerbate the expropriation of bondholder wealth. For example, management often responds to hostile takeovers by increasing leverage or paying out liquid assets; following a leveraged buyout, the amount of debt can also increase dramatically. Notably, Warga and Welch (1993) find that bondholders suffer average losses of 6–7% around announcements of leveraged buyouts (see also Asquith and Wizman, 1990). If bondholder are generally concerned with the effect of leverage-increasing takeovers, an open market for corporate control would give rise to a higher cost of debt. In particular, the effect would be stronger for firms with lower leverage, as they are more likely to be targeted by leverage-increasing takeovers (Chava, Livdan, and Purnanandam, 2008). We label this as the increasing leverage effect.

Combining all of these considerations, it is apparent that the effect of takeover threat on the cost of debt can be quite complex. How bondholders assess and aggregate the various costs and benefits of an open market for corporate control remains unclear, and whether any of the hypothesized effects would dominate is ultimately an empirical question. Therefore, we conduct an empirical analysis of the relation between the market for corporate control and credit spreads. Following Karpoff and Malatesta (1989), Garvey and Hanka (1999), Bertrand and Mullainathan (2003), Cheng, Nagar, and Rajan (2004), Giroud and Mueller (2008), Yun (2009), and others, we treat the passage of state-level antitakeover laws as exogenous shocks to the market for corporate control. Specifically, we focus on the passage of business combination (BC) laws, which created hurdles for certain transactions between the target firm and corporate raiders, such as mergers and asset sales. According to Bertrand and Mullainathan (2003), business combination laws are the most stringent among the second-generation antitakeover laws. Because they significantly weaken corporate takeovers as a disciplinary device, changes in business combination laws present a unique opportunity for us to study the relation between the market for corporate control and the cost of debt.[2]

We use the differences-in-differences approach to gauge the effect of the BC laws. Specifically, we compare the change in credit spread around the time a BC law was passed (say, year t) for firms affected by the law to the change in credit spread for firms unaffected by the law. Our sample consists of 3,996 firm years of observations from 1976 to 1995, and includes firms incorporated in 26 states that passed a BC law and 13 states which did not pass a BC law. Because these laws were enacted in different years for different states, our control group is not limited to firms incorporated in states in which no BC law was passed; rather, it also includes firms incorporated in states in which a BC law was passed either before or after year t. This ensures that there are no systematic differences between the treatment and control groups. Nevertheless, we include several well-documented determinants of credit spreads as control variables, such as credit rating, firm size, leverage, cash flow volatility, profitability, and sales growth. We also compute average credit spreads in a given year across all firms (excluding

[1] As an alternative to the quiet life preference, managers who enjoy the private benefit of control, but do not bear the full cost of their actions, may overinvest to "build empires." Li (2007) argues that through overinvestment, managers can increase the capital stock and the associated cash flows in order to avoid liquidation, benefitting bondholders. However, neither Bertrand and Mullainathan (2003) nor Giroud and Mueller (2008) find support for the empire-building models of managerial preference.

[2] We conduct a separate empirical analysis using other types of antitakeover state laws, such as control share acquisition laws and fair price laws. Our results show that they do not have a significant effect on the cost of debt. These results are available upon request.