August 15, 1989

economic commentary

Federal Reserve Bank of Cleveland

LBOs and Conflicts of Interest

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Leveraged-buyouts (LBOs) have had a major impact on our financial system, and have particularly affected traditional corporate relationships between stockholders, bondholders, and employees. It is unclear if LBOs improve economic performance. The growth of LBOs, however, has sparked an evolutionary response that is restructuring the corporation as an institution.

Leveraged-buyouts (LBOs) seem to be firmly entrenched in our financial system and have been growing in volume: in 1988, over 300 LBOs were announced, amounting to over $98 billion; in 1980 LBOs amounted to less than $1 billion.[1] LBOs also appear to be having a significant impact on stock-market movements; the 1988 stock-market rebound after the crash of 1987, for example, coincided with the spurt of LBOs.

There are deep disagreements among economists about the overall costs and benefits of LBOs. Some claim that the stock-price increases associated with LBOs correctly foretell future increases in a firm's productivity and profitability. If this claim is true, then society as a whole may benefit from LBOs. Critics, however, note that rising stock prices directly benefit only shareholders and do not necessarily make society as a whole better off. They claim that stock prices rise only because stockholders use LBOs to redistribute wealth from managers, bondholders, employees, and taxpayers. If this is true, then some people are hurt by LBOs.

Current proposals to change the tax code or to impose regulatory restrictions on LBOs are based on the presumption that the productivity gains from LBOs are overstated or that LBOs primarily benefit one party at the expense of another. Another concern is that LBOs have led to a dangerous increase in the overall level of debt in the economy as a whole.

In this *Economic Commentary*, we discuss how LBOs may benefit some in a corporation at the expense of others. We view the corporation as a set of contracts that tie together the interests of stockholders, managers, bondholders, and employees, and that reduce the conflicts that naturally arise among these groups.

We discuss how the use of LBOs involves replacing existing contracts and possibly redistributing corporate wealth. We also discuss the economic events that have encouraged the use of LBOs and indicate the possible response of our financial system. First, a brief description of the structure and relationships that exist in the modern corporation will help establish a context in which to discuss the effects of LBOs.

■ Conflicts of Interest in the Modern Corporation

The modern corporation is a nexus of contracts between the conflicting interests of stockholders and stakeholders (creditors, managers, and employees). Economists usually view stockholders as running the corporation (indirectly) in order to increase the market value of their stock (equity). Some actions taken by managers on behalf of stockholders increase the market value of equity by improving efficiency, that is, by producing more output with a given amount of input. Other actions redistribute wealth from stakeholders.[2]

The modern corporation has survived largely due to its efficiencies, some of which are associated with the use of

ISSN 0428-1276

common stock.[3] Since common stock is widely held and easily traded, investors can diversify their investment and thus reduce their risk.

The separation of the ownership of common stock from other roles in the corporation is also beneficial. Managers and employees, for example, make investments in the firm in the form of learned skills. However, such investments cannot be traded as easily as common stock.

Consequently, managers and employees may be less willing to increase their personal exposure to the firm's risk by also buying its stock. If they do purchase their company's stock, they may require a higher rate of return than the average investor. Thus, it may be wise to separate common stock ownership from the roles performed by managers and employees. However, as we discuss below, there are also disadvantages to this separation.

In spite of the various efficiencies of the modern corporation, conflicts arise in *principal-agent* relationships, in which *principals* (for example, stockholders) engage *agents* (managers) to take action on the principals' behalf. A major corporate principal-agent conflict involves the separation of ownership and control. Managers may not have the same goals as stockholders, and may avoid making changes that could jeopardize the investments they have made in their jobs.

The conflict between stockholders and stakeholders centers on the limited liability of stockholders. Stockholders receive the profits, which are the income from earnings, minus payments required to labor, creditors, and taxes. If the corporation's earnings do not cover required payments and the business fails, the stockholders have limited liability and do not have to pay the difference between income and required payments. Stakeholders can only hope to recoup their losses through bankruptcy proceedings.

Stockholders therefore may benefit from strategies that increase the variability (risk) of corporate earnings. On the other hand, stakeholders wish to avoid risk because they suffer if earnings are insufficient and do not benefit from the "high" earnings that may result from successful risky business strategies.

As indicated above, employees and managers invest in firm-specific skills, that is, they accumulate human capital in the form of education and training. While such personal investments may be necessary in order to improve productivity, conflicts arise once such investments have been made. It is difficult for employees and managers, for example, to protect themselves by diversifying the risk associated with these firm-specific investments—if a firm goes out of business, they lose their investment. In addition, there may be no guarantee that full compensation will ultimately be received for their learned skills and accumulated experience.

If unresolved, the conflicts between stockholders and stakeholders are costly. Stockholders would expect managers to take advantage of on-the-job perquisites and would lower compensation accordingly. Managers, in turn, would have no incentive to invest in accumulating the skills that would improve their efficiency at a particular job. Bondholders and employees would anticipate the self-serving actions of stockholders and most likely would not provide enough debt or human capital for the firm's efficient operation.

Contracts can reduce the cost of these stockholder-stakeholder conflicts. Bondholders, in particular, use contracts to try to restrict the actions of stockholders. Stockholders agree to such restrictions if the benefits to them, in terms of lower borrowing costs, exceed the costs of the restrictions.

The best set of contracts between stockholders and bondholders will increase both the values of debt and equity. Similarly, all parties gain if contracts induce investment in human capital by managers and employees. These investments lead to increases in productivity wages, salaries, and market values.

Bond indentures, which are formal agreements between issuers of bonds and bondholders, are the best example of contracts that seem to be written so as to reduce agency costs (the loss in firm value due to conflicts within the corporation). Bond indentures commonly include limitations on issuing debt since additional debt increases the probability of bankrupcty and creates conflicts among bondholders. Issuance of senior debt (debt that has to be paid first in bankruptcy proceedings) is severely limited by convenants negotiated by the initial senior debtholders. Issuance of junior debt is also limited since it may be paid first, either because it matures first, or because the courts may deviate from strict adherence to priority.[4]

Stockholders wish to control managers' incentives to consume, via perquisites, part of the return that could be paid as dividends or that could be reinvested. To do this, managerial compensation is tied to firm performance. However, if compensation is tied to firm solvency, managers will avoid risk, retain too much of the earnings, or not issue enough debt.

Managers in turn must be compensated for investing in firm-specific human capital. Typically, managers have been compensated for growth in sales or revenue rather than for maximizing the firm's stock-market value. Under some circumstances, these objectives may be in conflict. However, managers generally realize that their future salaries will reflect their ability to increase stock-market values and act accordingly.

However, it is impossible to anticipate all the events that may encourage the stockholders or managers simply to redistribute wealth to themselves. In addition, in some cases, it may be too costly to negotiate contracts. In either case, there may be "implicit contracts" that involve the stakeholders' trust that their interests will not be knowingly violated. Appointment of trustworthy managers may be necessary in order to maintain contracts under these circumstances.[5]

LBOs affect the traditional corporate relationships between stockholders, bondholders, and employees described above. In order to change these relationships, however, it may be necessary for control of the corporation to change hands.

■ The Market for Corporate Control

Whoever has a controlling interest in the equity of the corporation chooses the managers and managerial compensation. Bondholders do not become owners since the tax benefits of corporate debt are contingent on the debtholders not being owners.[6] Employees can be, but typically are not, owners. Increasingly, however, managers have been gaining controlling interest of their firms and have been preempting outside takeovers through MBOs (management buyouts).

In the market for corporate control, outside acquisitions reflect buyers' belief that they will earn an above-market rate of return from owning the firm. The new, higher share value may reflect the fact that the new owners are not necessarily bound by the old set of corporate contracts. It may even be possible to increase share value by replacing the old set of contracts.

In particular, it may be necessary to replace the incumbent management to institute the desired changes. Incumbent management simply may be unaware of potential value-improving strategies, or may not have the proper incentives to increase the firm's stock-market value, especially if such actions would decrease managerial wealth. This could occur if managers were compensated for short-term performance rather than for increasing firm value. Or, incumbent management may not institute such changes if their future salaries will reflect poorly on their trustworthiness in honoring such contracts.

Recent changes in market conditions may have made it generally more profitable to engage in merger and acquisitions (M&As), of which LBOs are a variation. This increased profitability could either reflect new opportunities to improve efficiency or new chances to redistribute wealth from stakeholders. Other factors may also be involved. The growth of the junk-bond market, for example, has created a new pool of funds and lowered the costs of debt finance.

The increase in funding controlled by institutional investors and the money subsequently available for takeover efforts may have stimulated the concerted analysis of takeovers. Changes in the tax code also may have lowered the cost of debt finance. Increasing international competition may have increased pressures to take advantage of such new, lower-cost financing arrangements. Deregulation in industries such as financial services and oil and gas may also have renewed competitive pressure.

And, finally, some claim that the break-up LBOs of the 1980s reflect an admission that the conglomerate mergers of the 1960s were mistakes. Investors can diversify their market risks without needing to purchase equity in a diversified corporation.

■ Effects of LBOs on Stockholders and Bondholders

Most studies of the impacts of M&As focus on the reactions of financial markets. There is a great deal of evidence on the impacts of the broader category of M&As. One study indicates, for example, that shareholders of target companies clearly benefit from tender offers. However, stockholders of the bidding company at best receive small gains. Others have found that values of bonds do not appear to be adversely affected by M&A activity in general.[7]

Since most firms affected by LBOs go private, there is less evidence of the impacts of LBOs on either stockholders or bondholders. Generally, however, stock prices react positively to financial restructurings that increase leverage, such as issues of new debt or repurchases of equity. Recent studies of management buyouts (MBOs), which also tend to be highly leveraged, seem to confirm the finding that while bondholders don't gain, they don't lose either.[8]

These results may seem surprising given the well-publicized adverse reactions of bondholders to LBO announcements and the fact that a firm's reorganization may increase the risk of bankruptcy. After all, it is not uncommon for a firm's debt to be downgraded after an LBO. However, bondholders realize in advance that the firm will be run for the benefit of the stockholders. If the bondholders anticipated such actions by stockholders the rates of returns on the bonds should reflect this risk and thus compensate the bondholders.

■ Effects of LBOs on Employees

So far, there is little quantitative evidence about the impact of LBOs on employees. LBOs may eventually push labor towards industries in which labor is more productive. There is some indirect and mixed evidence on the short-run impact of LBOs. One study of M&A activity among small firms in Michigan found no significant decline in employment. Another study, however, found that employment rose by less than industrywide averages for firms going through MBOs.[9]

Any changes in wages or employment associated with an LBO may involve rewriting union contracts or reestablishing the trust necessary to enter implicit contracts. In some cases, such as Carl Icahn's takeover of TWA, union contracts were rewritten with lower wage rates. It is not clear if the lower wages were more competitive and thus led to improved efficiency in airline operations, or if the wage decline represented a transfer of wealth from the employees to the stockholders.

The uses of Employee Stock Ownership Plans (ESOPs) and pension fund assets in LBOs also affect employees. ESOPs are trusts set up to provide employees with direct ownership in their firm. There are substantial tax benefits for a company that establishes an ESOP. ESOPs can be used by companies in takeover defenses since the more stock held in an ESOP, the harder it is for an acquirer to obtain sufficient stock to effect a takeover. On the other hand, employees can use ESOPs to have a greater role in a company's operations or to acquire companies themselves.

Pension funds are large enough to become important sources of financing for LBOs. In addition, companies with surplus pension funds are attractive takeover targets since surplus pension funds revert to the company upon termination of the plan. Or the company may use the pension fund to defend against takeovers. Surplus pension funds are contributions made to the fund in excess of the benefits that the company would be required to pay if the plan were terminated. Recent increases in stock prices (that bloated the value of the funds' equity holdings) and lower rates of wage increases (holding down pension liabilities) may have encouraged these developments.

■ Do LBOs Reduce the Costs of Conflicts Within the Firm?

As discussed above, LBOs operate by replacing contracts governing the corporation. There are costs associated with writing new contracts since trust must be reestablished. Another view, called the *free-cash-flow theory,* emphasizes a way that the post-LBO corporate form may lower the costs of conflicts within the corporation.

The free-cash-flow theory of takeovers emphasizes the costs of having managers' incentives not reflect those of the stockholders. Free cash flow is cash flow in excess of that necessary to fund profitable investments. If managers are rewarded for increased sales or increased revenues rather than for increased stock values, they are likely to accumulate free cash flow. Free cash flow can be regarded as a measure of managers' failure to maximize market value.

LBOs may reduce the costs of free cash flow in at least three ways. First, by incurring higher interest payments, free cash flow is reduced. Second, by giving managers an equity stake, the agency conflict between owners and managers is mitigated. Third, the eventual need to issue stock will subject the firm to more scrutiny than when it could rely more heavily on internally generated funds.

There is broad evidence in favor of the free-cash-flow theory. [10] LBOs have occurred in industries where changing market conditions are likely to have increased free cash flow. Typically, "streamlining" changes occur such as: rewriting of managerial compensation schemes, rewriting labor contracts, and reducing the size of the company by selling off operations.

Nonetheless, it is unclear if restructuring improves economic performance. Accounting data does not support the efficiency view. A 1987 study of 5,000 mergers between 1950 and 1975 concluded that mergers have led to declines in profitability. More recent studies tend to confirm these results. However, accounting data may not accurately measure performance. [11]

■ The Evolving Response to LBOs

As LBOs become an increasingly accepted part of the financial system, managers, bondholders, and employees will rewrite the explicit and implicit contracts that define the corporation. Or, the prices at which stakeholder services are provided will reflect any increased risk that is not protected through contracts.

Bondholders are responding to the threat posed by LBOs both through contracts and pricing. "Poison puts," which allow bondholders to sell the bonds back to the company at face value if the LBO lowers the bond rating, are now written into some bond covenants. Bondholders are also organizing in an effort to bargain for better terms when new debt is issued.

The response of bondholders to LBOs is obscured by a more fundamental development in the pricing of debt. The distinction between debt and equity has been lessened, largely through the increased use of junk bonds, whose returns have risk valued by the market in ways similar to that of equity. Other types of debt with equity characteristics, such as convertible debt, are also more common. To some extent then, bond prices may come to reflect the risk associated with LBOs. In fact, there is some evidence that LBOs were encouraged by a decreased emphasis on writing bond covenants in the early 1980s.

Changes in managerial compensation are an important response to LBOs. Managers are now given equity stakes in the form of direct stock ownership or options in order to make the interests between managers and stockholders more compatible.

Labor unions may try to respond to the LBO threat through the terms of new labor contracts, in particular by including antitakeover provisions. Union efforts also have focused on legislative attempts to restrict takeovers. In addition, ESOPs give unions the potential to own the companies themselves as a way of insuring against the risk of LBOs.

Legislative restrictions on takeovers are also part of the overall response to LBOs. Congress could consider changes to aspects of the tax code that currently favor debt over equity or that encourage "abuse" of ESOPs or pension funds. However, even without these responses the profitability of future LBOs will decline. It is likely that market prices of corporate debt and equity will come to reflect the potential increases in value from restructuring. As further evidence of the long-term impact of LBOs, incumbent managers now increasingly perform the analysis that takeover specialists would perform and, if warranted, institute the changes that would follow an LBO. Through this process, LBOs may become institutionalized.

■ Conclusion

There is no conclusive evidence on whether LBOs improve economic efficiency or merely redistribute wealth to shareholders from stakeholders. LBOs were encouraged by events that made the existing set of contracts inconsistent with maximizing the stock market value of firms. The resulting new contracts may make the corporation more efficient. However, if LBOs were unanticipated when the old contracts were written, some parties may be made worse off. Clearly, the traditional corporation is changing: the set of explicit and implicit contracts that define the corporation are being rewritten. It is not yet clear whether the restructured corporation will be more efficient than the one it replaced.

Of course, it is possible that LBOs both improve efficiency and redistribute wealth. In that case, policymakers evaluating proposed changes in the tax code or regulations face a difficult tradeoff between improvements in efficiency that benefit society as a whole and redistributions of wealth that may harm individuals or groups.

Footnotes

1. An LBO is a type of takeover. Takeovers involve obtaining a controlling portion of equity. In LBOs, the takeover is financed with a relatively high amount of debt that is generally secured by the assets of the target company. The high levels of debt either force the new company to restrict expenditures or to develop new sources of funds, possibly by selling assets. More than half of the LBOs announced in 1988 went private (after the LBO, the stock was no longer publicly traded). Not all LBOs are hostile; approximately one-quarter were organized by management without the help of an equity sponsor.

2. Stakeholder wealth can be thought of as having two components. One is the value of financial assets such as stocks and bonds. The other represents the value of the investments they have made in accumulating employment skills. The latter component is closely related to expected future earnings.

3. Efficiency in the modern corporation refers to its ability to reduce the costs of the conflicts within the corporation and to organize productive resources in the least costly manner. See Michael C. Jensen and Clifford W. Smith Jr., "Stockholder, Manager, and Creditor Interests: Applications of Agency Theory," in *Recent Advances in Corporate Finance*, eds. Edward I. Altman and Marti G. Subrahmanyam, Richard D. Irwin, 1985, pp. 93-131.

4. Research has shown that bond yields and prices reflect the protection that bond covenants give bondholders.

5. See Andrei Schleifer and Lawrence H. Summers, "Breach of Trust in Hostile Takeovers," in *Corporate Takeovers: Causes and Consequences*, ed. Alan Auerbach, National Bureau of Economic Research, University of Chicago Press, pp. 33-67. An alternative view to the position that managers and employees negotiate implicit contracts maintained with trust is the view that such relationships may arise because of managerial discretion or even "weakness." Managers may value having a good relationship with employees.

6. The distinction between debt and equity for tax purposes is determined on a case by case basis. However, "...independence between the holdings of the stock of the corporation and the holdings of the interest in question ..." is one of the features the courts have come to view as characteristic of debt. See Joint Committee on Taxation, *Federal Income Tax Aspects of Corporate Financial Structures*, U.S. Government Printing Office, Washington, D.C., 1989, p. 36.

7. See Jensen, Michael C., and Richard S. Ruback, 1983, "The Market for Corporate Control: The Scientific Evidence," *Journal of Financial Economics*, 11, 5-50, and Denis, Debra K., and John J. McConnell, 1986, "Corporate Mergers and Security Returns," *Journal of Financial Economics*, 16, pp. 143-187.

8. See K. Lehn and A. Poulsen, "Leveraged Buyouts: Wealth Created or Wealth Redistributed?" in *Public Policy Towards Corporate Mergers*, ed. by M. Weidenbaum and K. Chilton, (Transition Books, New Brunswick, N.J.) and L. Marais, K. Schipper and A. Smith, 1989, "Wealth Effects of Leveraged Buyouts for Senior Securities," *Journal of Financial Economics*, forthcoming.

9. See Charles Brown and James L. Medoff, 1988, "The Impact of Firm Acquisitions on Labor," in *Corporate Takeovers: Causes and Consequences*, ed. Alan Auerbach, National Bureau of Economic Research, University of Chicago Press, pp. 9-31, and Steven Kaplan, "A Summary of Sources of Value in Management Buyouts," paper presented at 1988 Institutional Research Conference, Drexel Burnham Lambert, April 1988.

10. See Michael C. Jensen, 1988, "The Free Cash Flow Theory of Takeovers: A Financial Perspective on Mergers and Acquisitions and the Economy," in *The Merger Boom*, eds., Lynn E. Brown and Eric S. Rosengren, Federal Reserve Bank of Boston, pp. 102-143.

11. See David J. Ravenscrafts and F.M. Scherer, *Mergers, Sell-Offs, and Economic Efficiency*, Brookings Institution, Washington, D.C., 1987. Accounting measures of profitability are influenced by the chosen methods of depreciation and inventory valuation as well as by other accounting decisions.

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The author would like to thank Mark Sniderman and James Thomson for helpful comments.

The views stated herein are those of the author and not necessarily those of the Federal Reserve Bank of Cleveland or of the Board of Governors of the Federal Reserve System.

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