

INSIDER TRADING AND DUAL-CLASS RECAPITALIZATION

Charmen Loh^{*} and R.S. Rathinasamy^{**}

Abstract

Existing empirical evidence on the impact of dual-class recapitalization on shareholder wealth has produced results that range from insignificant to negative abnormal returns. One possible reason for the different results is the existence of two sets of motives for the issuance of limited-voting stock with opposite effects on shareholder wealth. This paper uses insider trading to segregate the dual-class recapitalizations that increase shareholder wealth from those that reduce firm value. Our results show that, consistent with our hypothesis, firms with net insider purchases over a period of six months prior to the issuance of dual-class stock experience significant positive abnormal returns while firms with net insider sales suffer significant losses in firm value.

INTRODUCTION

The creation of a second class of common stock with disparate voting power has received increasing attention in the financial market, especially in the wake of the 1984 New York Stock Exchange moratorium on delisting firms with dual-class common stock. The creation of limited-voting stock represents a deviation from the normal one share/one vote rule because it separates the ownership of equity from the ownership of voting rights. One class of common stock, often held by company founders and management, has superior voting privilege and a lower claim to dividends. It enables corporate insiders to increase their voting control of the firm without increasing their equity stakes.¹ The other class of common stock has limited voting privilege but a preferential claim to the firm's dividends.

Empirical examination of the effect of dual-class recapitalization on shareholder wealth has yielded mixed results. Partch (1987) examines 44 publicly traded firms and concludes that the creation of classified common stock does not harm current shareholders. Jarrell and Poulsen (1988) examine 94 firms which issue limited voting stock, and find significant stock price declines at the announcement of the dual-class recapitalization. They also document that on the announcement day, 62 percent of the firms experience negative returns and 38 percent register positive returns.²

These empirical findings indicate that the creation of limited voting common stock may be associated with both positive and negative wealth effects. Possible reasons for the positive effect include (1) providing managerial continuity, (2) giving the management the ability to raise additional equity capital without diluting its voting control, and (3) offering managers incentive to invest in firm-specific human capital.³ The negative wealth effect stems from the use of limited-voting stock as an antitakeover device. When the likelihood of a successful value-increasing takeover is diminished by the creation of a limited-voting class of common stock, it alters managerial incentives by allowing the managers to deviate from making financing and investment decisions that are consistent with shareholder wealth maximization. It also weakens the effectiveness of the market for corporate control as a disciplining mechanism, thus providing the incumbent managers greater latitude to consume perquisites. Finally, when a takeover attempt is defeated, shareholders suffer the loss of control premium.

One drawback associated with the analysis of wealth effect of all dual-class reorganizations is that the stock return merely summarizes the *net* effect of the issuance, balancing its costs and benefits while obscuring the

*Rider College

**Ball State University

separate effects.⁴ Just how to differentiate the ‘good’ limited-voting stocks from the ‘bad’ ones remains an unresolved issue in finance. This paper attempts to fill this gap by examining the pattern of insider trading activity prior to the issuance of a limited class of common stock.^{5,6} According to John and Mishra (1990, p.836), “[i]n an environment where corporate insiders have information superior to the market about the future prospects of the firm, the trading activity of corporate insiders would be one of the most direct signals available to them to communicate their private information to the market.” Since the insiders are in close touch with the firm’s major decision making process, they often possess nonpublic information. As a result, trading by insiders prior to a major corporate event is likely to convey previously undisclosed information regarding that event. With respect to the present study, we hypothesize that a dual-class recapitalization that is preceded by net insider buying (selling) conveys a positive (negative) signal to the market. If insiders believe that the issuance of limited-voting stock is for wealth-maximizing purposes, then increasing their net purchases prior to the recapitalization would enable the insiders to capture more of the price run-up associated with the issuance. On the other hand, if a firm issues limited-voting stock as an antitakeover device, then we would expect insiders to sell shares in their own company to avoid the costs associated with managerial entrenchment, changing managerial incentives, and lost control premium.^{7,8}

We examine 72 firms that issue limited-voting common stock in the period 1976-1987. For firms that have net insider purchases prior to the issuance, the results show significant increases in shareholder wealth. On the other hand, firms with previous net insider sales experience significant wealth losses. These findings provide support for the proposition that the pattern of insider trading activity is aligned with the motives for dual-class recapitalization. In other words, the market interprets the issuance of limited-voting stock preceded by net insider purchases as a wealth-maximizing decision. Conversely, the market views the issuance as an action to insulate the firm from the market for corporate control when insiders sell shares in their own firm prior to the creation of restricted-voting stock.

The rest of this paper is organized as follows. Section II discusses the data collection procedure and research methodology. The empirical results are discussed in section III. Section IV provides the summary and conclusions.

DATA COLLECTION AND METHODOLOGY

The preliminary data used in this study are based on information collected by Jarrell and Poulsen (1988). Their sample consists of 97 firms identified from the American Stock Exchange List, the NASDAQ/CQS Symbol Directory, and the New York Stock Exchange as having issued two classes of common stock with different voting power from 1976 to May 1987. Information on insider trading activity is gathered from the *Insiders’ Chronicle*.⁹ This study uses three measures of insider trading: (1) the number of insider purchases and sales, (2) the number of shares purchased and sold, and (3) the number of shares traded as a percentage of outstanding shares.¹⁰ Table 1 contains the number of insider transactions based on these three measures. It shows that 45 of dual-class firms do not have any insider trading activities.

A total of 72 firms are identified. To be included in the final dual-class sample, a firm has to satisfy the following selection criteria: (1) the availability of stock return data for the period $t=-270$ to 10 (day $t=0$ is the announcement date), (2) the availability of insider trading data over a period of six months prior to the event date, and (3) there are no other contemporaneous events over a period of 7 days surrounding the event date.¹¹

The event study methodology based on Brown and Warner (1985) is used to examine the stock market response to the announcements of dual-class recapitalizations. Appendix A contains details of the event study methodology.

EMPIRICAL RESULTS

Table 2 contains the cumulative average abnormal returns (CAARs) of firms that issue a second class of common stock with disparate voting power.^{12,13} To isolate the positive impact from the negative, the total sample is divided into three subsamples according to three measures of insider trading activity over a period of six months prior to the recapitalization announcement.

TABLE 1
Insider Trading Measures And The Number Of Firms
In Various Subsamples For The 72 Firms That Undertake
Dual-Class Recapitalizations In The Period 1982-1987

Insider Trading Measure	Net-Buy	Net-Sell	No Net Trading	No Trading	Total
Number Of Insider Transactions	11	15	1 ^a	45	72
Number Of Shares Traded	13	13	0	45	72
Number Of Shares Traded As A Percentage Of Outstanding Shares	12	14	0	45	72

a. The number of insider purchases is equal to the number of insider sales.

The insider trading measure used in Panel A is the number of insider transactions prior to the announcement of dual-class recapitalization. For the Net-Buy subsample, there is evidence of marginally significant CAARs over three windows surrounding the event day— $t=-1$ to 0, $t=-1$ to 1, and $t=-3$ to 0. The size of cumulative wealth gain ranges from 5.05 percent to 6.96 percent. For the Net-Sell subsample, over a period between $t=-3$ to 3 the CAAR is -3.33 percent (t-statistic is significant at the ten percent level). As for the No-trading subsample, there is no evidence of any significant market reaction over any of the event windows we examine.

Panel B of Table 2 presents the results of our analysis using the number of shares traded as the measure of insider trading. For the 13 firms in the Net-Buy group, there is evidence of positive market response. For instance, $CAAR_{-1,+1}$ is 3.12 percent and the t-statistic is significant at the five percent level. For firms with net-sell insider trading activity, the $CAAR_{-1,+1}$ is -0.85 percent (t-statistics is significant at the five percent level). For the 45 firms in the No-trading group, there is no evidence of significant abnormal returns.

Panel C of Table 2 portrays the familiar picture. The CAARs over the periods $t=-1$ to 0 and $t=-1$ to +1 are significantly positive for the Net-Buy group. The CAARs are only marginally negative for the 14 firms in the Net-Sell group. Again, the No-trading group shows no significant changes in shareholder wealth.

SUMMARY AND CONCLUSIONS

Existing empirical evidence on the impact of dual-class recapitalization on shareholder wealth has produced mixed findings. Partch (1987) finds nonnegative but insignificant wealth effect while Jarrell and Poulsen (1988) document significant negative abnormal returns. One possible reason for the different results is the existence of two sets of motives for the issuance of limited-voting stock with opposite effects on shareholder wealth. On the one hand, the issuance of dual-class stock can ensure managerial continuity, encourage senior executives to invest in firm-specific human capital, and allow corporate insiders to raise equity capital without diluting control. These are efforts that enhance the value of the firm. On the other hand, the creation of a limited-voting class of stock can be used as an antitakeover device. Shareholders suffer wealth losses because when the threat of a takeover is blunted, top management tends to consume more perquisites and the shareholders are denied the control premium. While the above mentioned papers examine the overall wealth effect of dual-class recapitalization, little formal work has been done to segregate those recapitalizations that increase shareholder wealth from those that reduce firm value.

This paper attempts to fill this gap by incorporating insider trading in the examination of the creation of a second class of common stock with unequal voting power. Our results show that firms with net insider purchases over a period of six months prior to the issuance of dual-class stock experience significant positive abnormal returns while firms with net insider sales suffer significant losses in value. These findings are consistent with the hypothesis that corporate insiders who possess nonpublic information about the true motives behind dual-class recapitalization buy and sell shares in their own firm that reflect these motives.

TABLE 2

Average abnormal returns and cumulative average abnormal returns of firms undergoing dual-class recapitalization in the period 1982 to May 1987. Day 0 is the announcement day. Subsample Net-Buy (Net-Sell) consists of firms with insider net-buying (net-selling) activity during the six-month period prior to the issuance of dual-class common stock. Subsample 'No Trading' contains the firms which have no insider trading activity or with equal number of insider sales and purchases.

Panel A

A firm is classified as a Net-Buy (Net-Sell) if the number of insider purchases is greater (less) than the number of insider sales.

Event Window	Net-Buy (N=11)	Net-Sell (N=15)	No Trading (N=46)
-1 to 0	0.0538*	-0.0040	-0.0072
-1 to +1	0.0505*	-0.0070	-0.0128
-3 to 0	0.0696*	-0.0149	0.0014
-3 to +3	0.0696	-0.0333*	-0.0037

Panel B

A firm is classified as Net-Buy (Net-Sell) if the number of shares purchased is greater (less) than the number of shares sold.

Event Window	Net-Buy (N=13)	Net-Sell (N=13)	No Trading (N=45)
-1 to 0	0.0247*	-0.0041	-0.0062
-1 to +1	0.0312**	-0.0085**	-0.0011
-3 to 0	0.0354	-0.0110	0.0032
-3 to +3	0.0412*	-0.0311	-0.0121

Panel C

A firm is classified as a Net-Buy (Net-Sell) if the proportion of insider purchases (as a percentage of outstanding shares) is greater (less) than the proportion of insider sales.

Event Window	Net-Buy (N=12)	Net-Sell (N=14)	No Trading (N=45)
-1 to 0	0.0442**	-0.0063*	-0.0028
-1 to +1	0.0534**	-0.0020	-0.0113
-3 to 0	0.0612*	-0.0120	0.0024
-3 to +3	0.0643	-0.0352*	-0.0076

*Significant at the ten percent level.

**Significant at the five percent level.

ENDNOTES

1. DeAngelo and DeAngelo (1985) examine 45 firms that issue limited voting common stock prior to 1980. They discover that senior managers hold 59.2 percent of the high voting rights stock and only 20.8 percent of the limited voting rights stock.
2. See also Ang and Megginson (1989), Jog and Riding (1986), Levy (1983), and Robinson and White (1987) for research on dual-class reorganization in other countries.
3. See Ang and Megginson (1989), DeAngelo and DeAngelo (1985), Lease, McConnell, and Mikkelsen (1983 and 1984) for further discussion on these topics.
4. For instance, if half of the dual-class recapitalizations have an abnormal return of 3 percent on announcement day (because the market chiefly values the benefits) while the other half have a -2.75 percent abnormal return (because the market is mainly concerned about the costs), the net effect will likely be insignificantly different from zero. Ryngaert (1988) discusses a similar problem with the adoption of poison pill securities.
5. The Securities and Exchange Act of 1934 defines a corporate insider as either (a) an officer, (b) a director, or (c) a shareholder who owns at least ten percent of any class of equity securities.
6. A number of research has found significant insider trading activities around other corporate announcements such as stock repurchases [Choi (1986)], exchange offers and stock swaps [Copeland and Lee (1988)], dividend payments [John and Lang (1988)], capital investments [John and Mishra (1990)], corporate sell-offs [Hirschey and Zaima (1989)], and capital structure changes [Karpoff and Lee (1987)].
7. A number of firms specifically mention on their proxy statements that resisting hostile takeovers is the reason for the proposal to create a second class of common with disparate voting power.
8. The Securities and Exchange Commission proposed Rule 19c-4 in September 1986 and adopted it on July 8, 1988. The rule prohibits the listing of the securities of an issuer if their issuer “issues any class of security or takes any other corporate action that would have the effect of nullifying, restricting, or disparately reducing the per share voting rights of holders of an outstanding class of common stock.” The rule effectively abolishes dual-class recapitalizations that are injurious to existing shareholders. Our contention is that the creation of a second class of stock may cause no actual harm to the outstanding shareholders, but the pattern of insider trading alters the perception of the wealth consequences of dual-class recapitalizations.
9. Other sources of insider trading information include: (1) *The Insiders*, a bimonthly newsletter edited by Norman Fosback, (2) *Insiders Outlook*, a newsletter edited by Aaron Feigen, (3) *Wealth Monitors*, a monthly newsletter edited by Michael Lamb, and (4) *Official Summary of Security Transactions and Holdings*, a monthly publication put out by the US Government Printing Office.
10. This technique is similar to that used in Hirschey and Zaima (1989). A number of other measures of insider trading have been suggested by Penman (1985): (1) insider trading to total common shares outstanding, (2) the proportion of the outstanding common stock acquired by insiders, (3) the ratio of purchases to sales, and (4) net insider purchases as a share of total insider holdings. He finds no appreciable difference in the predictive capability among these measures.
11. Fifteen firms are excluded from the Jarrell and Poulsen (1988) sample—twelve for lack of insider trading information and three for having other contemporaneous events.
12. We also determined the standardized AARs using a version of the event study methodology used by Dodd and Warner (1983) and Hite and Owers (1983). The results are similar to those reported in this section.

13. We conducted a separate analysis to examine the overall effect of dual-class recapitalization. Except for day $t=3$, the total sample indicates no significant changes in shareholder wealth associated with the issuance of limited-voting common stock. This finding is consistent with Partch (1987) who documents that the creation of a second class of common stock with restricted voting rights is associated with nonnegative but insignificant stock price response. This result is not surprising in view of the fact that both positive and negative effects may be present among the firms in the total sample, each obscuring the effect of the other, thus resulting in no significant net wealth change.

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Appendix A

Event Study Methodology

The stock price impact of dual-class recapitalization announcement is estimated using the event study methodology similar to Brown and Warner (1985). The stock return information is gathered from the *Wall Street Journal* and Standard and Poor's *Daily Stock Price Record*. This market model assumes that there is a linear relationship between a stock's return and the return on a market index. The daily abnormal return, AR_{it} , for each sample firm i on each event day t during the period of interest is estimated as:

$$AR_{it} = R_{it} - (\hat{\alpha}_i + \hat{\beta}_i R_{mt})$$

where:

- R_{it} = rate of return to security i on event day t ,
 R_{mt} = rate of return on equally weighted New York and American Stock Exchange index on event day t ,
 $\hat{\alpha}_i, \hat{\beta}_i$ = ordinary least-squares estimates of the market model parameters. The parameters are estimated over the 250 day period beginning $t = -270$ through $t = -21$, where $t = 0$ is the dual-class recapitalization announcement day.

The abnormal returns, AR_{it} , are averaged across N securities on each event day to form an average abnormal return over the interval $t = -10$ to 10 ,

$$AAR_t = \sum_{i=1}^N AR_{it} / N$$

The expected value of AAR_t is zero in the absence of abnormal stock price behavior. To test the significance of AAR_t , the following t-statistic will be used:

$$t\text{-statistic} = AAR / [S(AAR_t) / N^{1/2}]$$

where:

$S(AAR_t)$ = the estimated standard deviation of the cross-sectional average abnormal returns for day t , and
 N = the number of sample securities.

To determine the cumulative effect, the AAR s are accumulated over various subperiods of k days from t to $t+k$ to form cumulative average abnormal returns ($CAAR$). The expected $CAAR$ should be zero unless firm-specific news influences the stock returns. The significance of $CAAR_{t,t+k}$ is estimated using the test statistic:

$$t = CAAR_{t,t+k} / k^{1/2} \hat{\sigma}_{ARR}$$

where:

$$CAAR_{t,t+k} = \sum_{\tau=t}^{t+k} AAR_{\tau}$$

$$\hat{\sigma}_{ARR}^2 = 1/249 \sum_{t=-270}^{-21} (AAR_t - \bar{AAR})^2$$

The t-statistic is distributed Student-t with 249 degrees of freedom if the average abnormal returns (AAR_t) are normally distributed and independent through time.