

## AGENCY EFFECTS ON THE OUTCOMES OF DISTRESSED FIRMS

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*What is the relationship between outcomes for distressed firms and the value of managerial stockholdings in those firms? The outcomes presented are: (1) Chapter 11 reorganization; (2) acquisition/merger; (3) internal turnaround. Dollar value of ownership of the firm's common stock by the firm's top managers is used to distinguish between the outcomes for distressed firms which have declining performance. The likelihood of a firm ending up in a merger with or being acquired by another private firm increases with the amount of managerial wealth invested in the firm's stock. Firms whose managers are not owners are more likely to follow an internal turnaround strategy, such as cutting costs and/or selling assets. This strategy offers non-owner managers a greater opportunity to maintain their managerial prerogatives than does a merger or an acquisition. This outcome is consistent with agency theory, which asserts that where possible, managers act in their own best interests to the detriment of the stockholders' interests. In the context of the firm, agency theory describes the situation wherein stockholders (principals) delegate responsibility for the firm's day to day affairs to managers (agents). One key issue in agency theory is risk sharing. Managers and stockholders may prefer different outcomes for the distressed firm due to their different risk preferences. Findings of the present study suggest that managerial wealth was not a predictor of Chapter 11 reorganization in bankruptcy, but the distressed firms' strategies were affected by the aggregate dollar value of a firm's stock owned by top managers.*

Many firms fall into distress every year. The causes are many: their markets mature, new competitors and technologies emerge, and demand for what they sell declines. Typically distressed firms are highly leveraged. Their financial risk grows during a recession in the business cycle. Does the amount of stock in the distressed firm which top managers own affect the direction in which that firm moves in attempting to become healthy? In much of the finance and accounting literature on distressed firms, the focus is on liquidation or non-liquidation of the

firm. Financial variables are used in this literature to predict these outcomes. This literature has a useful application for banks considering a firm's loan request. In strategy, there are further questions. Assuming the firm will not be liquidated, how will its management obtain the resources needed to return the firm to financial health? One possibility is reorganization in bankruptcy, which offers the firm immediate relief from payments to creditors. Another possibility is merger with or acquisition by another firm. Here the distressed firm seeks or is purchased by a partner-firm with available resources. Finally, the distressed firm may be able to go it alone, without assistance from either government or a private firm. In this case, the firm must find resources to fund a turnaround effort either from earnings, sales of assets, or sales of securities. This option is called 'internal turnaround' in this paper.

This paper relies on agency theory. Agent-managers may own stock in the firm, in which case their interests are aligned with stockholders' interests. In other firms, managers have little if any ownership stake in the firm's stock. This paper considers the following question: under what ownership conditions is internal turnaround more likely to occur within the distressed firm? The goal of this paper is to describe the relationship between the ownership of stock in the firm by the firm's top managers and the recovery outcomes for distressed firms. This is the agency problem in the context of the distressed firm, and is an important topic which has gained increasing attention in the management literature (Kimberly et al., 1980; Bibeault, 1982; Harrigan & Porter, 1983; Goldstein, 1988).

A business firm is in a distressed situation if it confronts the possibility of financial disaster. It may have to take action to prevent the occurrence of that disaster. The distressed situation is first recognized when there is serious concern or dissatisfaction with the firm's performance, results, and/or near term forecasts of performance and results (Sloma, 1985, p. 111). A corporation does not have to be in dire trouble currently to be in a distressed situation (DiPrimio, 1988). The firm instead may be in a situation where it forecasts future financial difficulties.

A distressed firm experiences a severe performance decline, in such areas as retained earnings, market value of equity, sales, and ability to service its debt; continuation of operations may be in jeopardy. A source of resources is needed for the firm to make its turnaround. Economists argue that the distressed firm can end up being reorganized in bankruptcy, liquidated in bankruptcy, merged with and/or acquired by another firm, or restructured through an internal turnaround (White, 1983; Bulow & Shoven, 1978). These alternatives are not final ones. A reorganization in bankruptcy may become a liquidation proceeding, or the firm may be acquired by another firm, or the firm may emerge as an independent entity. Also, an internal turnaround attempt may be followed by a bankruptcy proceeding or a merger.

The definition of a 'distressed firm' used in this paper is based on Altman's Z-score. Altman's discriminant function, which he termed the 'Z-score', was  $Z = .021X_1 + .014X_2 + .033X_3 + .006X_4 + .999X_5$  where

- $X_1$  = Working capital/Total assets,
- $X_2$  = Retained earnings/Total assets,
- $X_3$  = Earnings before interest and taxes/Total assets,
- $X_4$  = Market value equity/Book value total debt,
- $X_5$  = Sales/Total assets.

Altman's model was created in the late 1960s with manufacturing firm data. It is used by commercial banks to distinguish between firms likely to fail and those likely to survive to repay their loans. Firms with Z-scores above 3.0 are clearly healthy, according to Altman's algorithm. Below 1.8 firms are clearly unhealthy. Between 1.8 and 3.0 is a grey area where 'healthiness' is unclear. Any firm whose Z-score is below the cutoff level of 3.0 is deemed to be a 'distressed firm' for purposes of this paper. Included in the sample used for analysis here are manufacturing firms whose Z-score was below 3.0 for at least five consecutive years.

Bankruptcy usually occurs when the firm is unable to make a payment on one or more of its debt obligations. The firm continues to operate under the 'umbrella' of the bankruptcy court. During this proceeding, the firm need not service its debt. This affords the firm a breathing space, during which it can operate with reduced fixed costs (debt service). Oftentimes, the firm's creditors exchange their holdings of debt instruments for equity in the firm. Chapter 11 proceedings do allow the firm's then-current management to act as debtor in possession. Thus management may oversee the firm's reorganization, which occurs as the firm continues to operate. In effect, existing management has more time to turnaround the firm without immediately having to pay back creditors.

Chapter 11 proceedings are a formal and legal means of preventing creditors from taking possession of the firm's assets. Chapter 11 proceedings are conducted under the authority of the Bankruptcy Reform Act of 1979, 11 USCA. Sec. 1101 et seq., which refers to "provisions modifying or altering the rights of unsecured creditors generally or of some class of them upon any terms or for any consideration" (11 USCA Sec. 756). These proceedings are a hypothetical sale of the firm's assets (Baird, 1986). Chapter 11 proceedings allow the firm's current management to act as debtor in possession.

Former secured creditors may emerge from Chapter 11 proceedings as owners of equity in the firm. This possibility makes Chapter 11 a relatively riskier alternative for the current owners of the turnaround firm. The owners may lose some or all of their ownership interest in the firm. The bankruptcy court may approve a plan which transfers ownership from the stockholders to creditors. In such an arrangement, creditors exchange debt securities for stock certificates. Associated with or following a change of ownership could be a change of management. Thus Chapter 11 proceedings represent risk to current management in

that management might be replaced on a motion of the bankruptcy judge or pursuant to a reorganization plan filed with the bankruptcy court by one or more classes of creditors.

Merger is the combination of two corporations by the transfer of one firm's property to the surviving firm. One firm is swallowed up or absorbed by the surviving corporation (Random House dictionary, 1987). In their integrated typology of mergers and acquisitions, Buono and Bowditch (1989, p. 75) identified financial takeover as one strategic purpose for a merger between two organizations. Following a merger or acquisition, the distressed firm has access to the assets and/or borrowing capacity of its new private partner/owner. These new, private resources represent a potential source of succor to the distressed firm. Merger is another formal, legalistic mechanism that affects the firm's relationships with its debtors. Top managers especially are likely to lose their positions in the newly amalgamated firm.

Internal turnaround is continuation of the firm's operations, oftentimes focusing on parts of the firm's current business, e.g. strategic business units (SBUs), while selling off assets associated with other parts of the current business, e.g. other SBUs. This strategy is characterized by intensive management efforts to maintain cash flow in the core business. Firms attempting an internal turnaround often sell off one or more SBUs to raise the cash needed to finance the remaining core business. Concomitant to such selloffs are reductions in personnel. Selling off segments of the firm may be a means to reduce burdensome debt (Goldstein, 1988). Internal turnaround is clearly the most advantageous outcome for existing management, so long as that management's equity position in the firm is slight. It allows existing management to maintain its prerogatives and control. The shareholders bear the risk that an internal turnaround will not succeed.

Internal turnaround is the outcome stressed in the strategic management literature, which by and large ignores the formal, legalistic outcomes: Chapter 11 reorganization and merger. These legalistic outcomes are more in the owner's interests, but may threaten current management. The weakness in the current strategic management literature in understating legalistic solutions to distressed firms' plight is a broad weakness which extends to the discussion of healthy firms. The microeconomics and industrial organization base of strategic management slights the fact that the firm is a legal construct defined by formal rights and responsibilities which can be altered to benefit and hurt particular stakeholder groups. Two of the options discussed above, merger/acquisition and reorganization in bankruptcy, are legal changes in the firm's ownership structure. Only the third option, internal turnaround, is consistent with the view normally promulgated in the mainstream business strategy literature. Strategy at the firm level—whether the firm is healthy or distressed—is often devised in conjunction with attorneys who take advantage of legal restructuring such as merger, acquisition, or reorganization in bankruptcy to change the firm's nexus of duties and its prospects for survival.

### Agency Theory

This paper relies on agency theory to examine the outcomes for the distressed firm. An agency relationship refers to a fiduciary relationship whereby one person acts in behalf of, or in the interests of and with the consent of, another person. The agent is supposed to act on behalf of the principal, and in return the agent expects remuneration for its actions on behalf of the principal. The issue which arises out of agency relationships is that the agent, who is to act on behalf of the principal, nonetheless has its own interests. These personal interests may cause the agent to act contrary to the interests of the principal.

In the context of the firm, agency theory describes the situation wherein stockholders (principals) delegate responsibility for the firm's day to day affairs to managers (agents). One key issue in agency theory is risk sharing. Turnaround firms are inherently risky for all parties. Stockholders' capital is at risk. Managers' jobs are at risk. Managers and stockholders may prefer different outcomes for the distressed firm due to their different risk preferences. For the managers of distressed firms, the greatest risk arises from the possibility that they may lose their jobs. This job loss is likely following a merger or acquisition. It can also occur should the firm be liquidated. Reorganization in bankruptcy may or may not lead to managerial job loss. For the owners of the distressed firm, the greatest risk arises from the possible loss of their investment. The best way to protect that investment is via acquisition or merger. Internal turnaround, while preserving managers' jobs, does not provide a source of succor to the firm. Distressed firm outcomes may be partially dependent upon the extent to which managers own equity in the firm. This equity represents a portion of the managers' wealth. Such wealth considerations convolute the managers' role as agents because the stockowning manager is both agent and principal.

The conflict between management and ownership interests is an old argument. Adam Smith (1776/1937) argued that managers would not take the same degree of care with money entrusted to them by others as they would with their own money. Berle and Means (1967) discussed the split between owners and managers. Managers who are rational and self-interested will operate the firm, to the extent that they are able, for their own benefit rather than to the benefit of the firm's owners.

Agency theory has been applied to diverse organizational issues, including compensation, acquisition and diversification strategies, board relationships, ownership and financing structures, vertical integration, and innovation (Eisenhardt, 1989). Jensen and Meckling (1976) review agency relations between managers and owners, focusing on the incentives which motivate managers who are not 100% owners of the firms which they manage. Jensen and Meckling show that such managers have incentives to make decisions which are not entirely consistent with the interests of the equity owners. They believe that no matter what transactions costs are incurred by stockholders, conflict of interest will continue to exist between out

side investors and managers. Jensen and Meckling (1976) argue that only 100% ownership of the firm's common stock aligns management and stockholder interests. Other researchers find coalignment of management and stockholder interests at levels below 100% ownership of common stock by management. Hill and Snell (1988) conclude from their study of research intensive industries that management stockholdings below 100% are capable of aligning the interests of managers and stockholders. Management stockholdings amount to an outcome based contract between agent and principal, whereby managers receive a wealth increment based on their efforts. Such an outcome based contract more closely aligns the interests of managers and stockholders, as the former are now also stockholders.

Agency theory asserts that managers operate to the detriment of stockholders in order to maximize their personal wealth or to hold on to the perquisites associated with managing a firm. Managers operating in ways inconsistent with the best interests of their firms' shareholders reap the short-run benefits of their decisions, e.g. continued perquisites associated with top management positions, large salaries, expectation of future stock options, salary increases, bonuses, and lucrative pension provisions. Managers have but one job, while stockholders usually have a portfolio of stocks.

Managers' opportunistic behavior is to the detriment of stockholders, for example, in attempting to manipulate the accounting data on which their performance based compensation depends (Raviv, 1985). Managers may actually deceive stockholders into believing that they are operating the firm in the shareholders' interest. Agrawal and Mandelker (1987) have considered the relationship between stock and stock option holdings by top managers and whether acquisition and financing decisions are made consistent with the interests of stockholders. They find that executive stock holdings coaligned managerial preferences with those of stockholders.

Managerial welfare affects corporate restructuring as demonstrated by many studies, but the effects on distressed firms have not been analyzed. Lewellen et al., (1985) measured stockholder welfare in merger situations using abnormal price increases and have shown that the increases were highly correlated with the percentage of a firm's outstanding common stock held by senior management. Managerial welfare also affects managerial resistance to takeovers. Walkling and Long (1984) have compared 57 uncontested and 38 contested tender offers, choosing their sample based on the firms' similar financial characteristics. The major difference between the two groups was that directors owned a much larger percentage of the firms' shares in uncontested offers. Generally, resistance to takeover bids is not in the best interests of stockholders. Such resistance, however, may be in the best interests of managers who may lose their jobs subsequent to a takeover. Walkling and Long (1984) report that the offer premia were approximately equal for both groups of firms. Thus the difference in management stock ownership means a difference in effects of takeover on managerial stockholdings. These authors found a statistically significant difference in the average wealth change for management of

the target firm between contested and uncontested offers. They also use a binomial logit model which indicates that management shareholdings are larger in uncontested offers. "The decision [by management] to contest a tender offer is conditioned on personal wealth changes" (p. 67). "The value of a firm that is a potential takeover target depends on the fraction of the voting stock held by management. . . . The conflict of interest between shareholders and managers arises from the fact that a successful takeover always benefits shareholders but may hurt managers" (Stulz, 1988, p. 50).

There are many studies which have found differences between actions taken by firms operated by owner-managers versus firms operated by non-owner managers. Management controlled firms are more likely to take decisions which smooth out income streams (Boudreaux, 1973; Smith, 1976). Such firms have less variability in their profits and a lower rate of profit (Nyman & Silbertson, 1978). Management controlled firms are more likely to be diversified as a means of reducing management's risk. Conglomerate mergers are not in the interests of shareholders who can diversify their risk directly through their stock portfolio (Amihud & Lev, 1981). Management controlled firms are more likely to focus on maximization of sales at the expense of maximizing profits (Amihud & Kamin, 1979). "Managers reduce their employment risk at the expense of firm performance in order to maximize their own utility" (Hoskisson & Turk, 1990, p. 468). One of the reasons for these differences is that managers have tied their human capital into their firm and are unable to diversify away this employment risk (Amihud, Kamin, & Ronen, 1983).

Ownership of a firm's common stock is an important source of incentives for the firm's managers. "The pattern and amount of stock ownership influence managerial behavior . . ." (Jensen & Warner, 1988, p. 4). The extent of managerial common stock holdings has been used to investigate outcomes of failing firms, distinguishing between merger and Chapter 11 reorganization in bankruptcy (Pastena & Ruland, 1986), but this analysis was not extended to the internal turnaround outcome. The finding of Pastena and Ruland's study is that where managerial and shareholder interests are aligned, i.e. management owns significant blocks of the common stock of the firm it manages, merger is a more likely outcome. Where management stock holdings are small, Chapter 11 bankruptcy is a more likely outcome, since in a bankruptcy proceeding current managers have a better chance of maintaining their positions, with the attendant benefits thereof. "Managers may be tempted to act according to their own best interests rather than the owner's interests" (Walsh & Seward, 1990, p. 421). "Valuing their positions, many executives work to ensure their own job security" (Walsh & Seward, 1990, p. 431).

The financial interests of managers and shareholders are more closely aligned when managers own substantial blocks of their firms' common stock. Thus, equity based managerial compensation may increase shareholder wealth (Bhagat, Brickley, & Lease, 1985). In the context of a turnaround firm, agents may attempt to

maintain their positions with attendant perquisites, although the best interest of the equity holders would be to either liquidate the firm, returning some equity to shareholders immediately, or merge the firm with another. In the latter case, management is likely to lose its leading role and attendant benefits (Walkling & Long, 1984; Walsh, 1988). "Managers who pursue their own best interests may select different strategies than managers who pursue the interests of shareholders . . ." (Hoskisson & Turk, p. 462). Walsh (1988) found that very senior executives are the first managers to be replaced following the acquisition of their firms.

This agency literature suggests that managers who do not own large blocks of common stock of the firm which they manage have interests which differ from the interests of the firm's stockholders. These large blocks of stock represent an accretion of managerial wealth. Managers owning such wealth have multiple interests: interests in maintaining their position as managers and interests in maintaining the value of their stock. It is the latter interest which aligns managers and stockholders. Interests of managers who do not own stock in their firms are not coaligned with interests of shareholders.

*Hypothesis:* Distressed firms in which managers own stock are more likely to be restructured through a formal legal process, e.g. merger or bankruptcy, rather than internal turnaround.

## Method

### Sample

The outcomes were designated 1–3 because the multiple logit analytical method requires a comparison of outcomes. Thus, outcomes 1 and 2 were compared to outcome 3.

Outcome 1 = Acquisition/merger outcome	166 firms
Outcome 2 = Chapter 11 Bankruptcy outcome	21 firms
Outcome 3 = Internal turnaround	131 firms

Data were drawn from the Compustat tapes, then segregated into three outcomes, each representing one firm's outcome: acquisition/merger, Chapter 11 reorganization, internal turnaround. An additional variable representing management's ownership of common stock was added to this data.

Sample selection was divided into two parts, per the structure of the Compustat tapes, i.e. (1) surviving firms (firms which were listed on the Compustat tapes for the 1987 data year as an independent entity) which were deemed to be undertaking an internal turnaround; (2) firms in the other categories. Sample selection proceeded as follows:

A FORTRAN program was used to access the Compustat Full Coverage Industrial File. The scope of the sample was 10 years of data, 1978–1987, including manufacturing firms only. This choice was made so as to control the data for industry and also to be consistent in following the literature on firm failure. Manu



facturing was defined as Standard Industrial Classification codes 2000–3999. Within this range of SIC codes, sufficient data were removed from the Full Coverage file to compute Z-scores for each firm for each year.

Altman's model is used by commercial banks to distinguish between firms likely to fail and those likely to survive to repay their loans. Only manufacturing firms were included in the sample used in this study. Limiting the scope of this paper to manufacturing firms had the advantage of using Altman's screening method on firms similar to those for which it was intended. The disadvantage was a reduction in sample size. Market value of equity was defined as value of common stock plus that of preferred stock. The former was obtained by multiplying fiscal year end closing price of the firm's common stock by the number of common shares outstanding. The latter was the book value of preferred stock. Compustat does not report either a price or the number of shares outstanding for preferred stock.

### Analysis

**Multinomial Logit Technique.** A multiple logit routine, polytomous regression in BMDP, was used to compare the outcomes, based on degree of management ownership of the firm.

Primary use of logistic function model is for dependent variables which are unordered, categorical, qualitative measures rather than continuous ones. Probabilities of all categorical measures must sum to one. The predicted probability value of any dependent variable is interpreted as the preference of that categorical alternative, given a set of exogenous variables. The resulting equation is very similar to a regression equation.

$$Y^*_i = E b_k X_{ik} + u_i$$

The elements of this multinomial logit equation are analogous to those elements in a multiple regression equation. (Aldrich & Nelson, 1984; Agresti, 1979). *T*-ratios are used to test the null hypothesis that a given exogenous variable has no effect on the dependent variable. For large sample sizes, this *t* distribution should be equivalent to a normal distribution. *Y* variable was firm outcomes, categorically numbered 1, 2, and 3. *X* variable was Wealth, defined as the product of stock price, number of shares outstanding, and percent of total shares held by top management. This methodology compares outcomes #1 and #2 against outcome #3. As the *X* variable increases, the probability that outcome #1 and/or outcome #2 will occur increases. Thus, outcome #3 is a baseline for comparison.

There is also a goodness-of-fit test used to test the joint hypothesis that all coefficients are zero. Finally, there is an analog to the adjusted coefficient of determination used in linear regression. It is the Akaike Information Criterion (AIC), which is calculated:

$$\text{Goodness-of-fit statistic} - 2 (\text{degrees of freedom}) = \text{AIC}$$

Unlike  $R^2$ , where higher numbers are preferable, values of AIC closer to negative infinity are indicative of a better model.

## Results

There are three components of the results—newcnt, coefficient with an associated coefficient divided by its standard error (coeff/se), and exponent. The 'Newcnt' variable was created by the author to indicate number of years prior to a firm outcome. Newcnt ranged from 1 to 5. Newcnt = 1 indicates the year immediately prior to an outcome, e.g. merger/acquisition, bankruptcy, or internal turnaround. Newcnt = 3 would indicate data for three years prior to one such firm outcome. The outcomes considered in this study were acquisition/merger of the firm, the initiation of a Chapter 11 bankruptcy proceeding by the firm or by the firm's creditors forcing the firm into bankruptcy, or a successful internal turnaround. A successful internal turnaround was defined using Altman's Z-score. Z-score was the basis for determining 'unhealthiness' in choosing the sample for this study. If the firm maintained a Z-score above 3.0 for two consecutive years, it was considered to have completed an internal turnaround. The coefficient is the output from the multiple logit program.

If the sign on the coefficient is positive, then a one unit change in the independent variable increases the odds of that outcome over the alternative by the exponent. The significance of the coefficient divided by its standard error is interpreted similarly to the *t*-ratio in least squares regression. The change in likelihood is indicated by the exponent. The exponent is not listed in the table but is calculated by adding 1 to the coefficient. For example, the exponent in Table 1, Newcnt = 1, would be 1.0013, indicating that a one unit increase in the underlying variable, millions of dollars value of top management's stock holdings, increases the likelihood of an acquisition/merger outcome versus the contrasting outcome, an internal turnaround, by .13%. An increase of top management wealth of \$10 million would increase the likelihood of an acquisition/merger outcome by 1.3% over an internal turnaround outcome.

**Table 1**  
**Multilogit Regression Results Using WEALTH Variable to Predict Likelihood of Acquisition/Merger Outcome Versus Internal Turnaround**

Acquisition/merger	AIC	Coefficient	Coefficient/SE
Newcnt = 1	-1337	.0013	3.91**
Newcnt = 2	-1433	.0009	3.04**
Newcnt = 3	-1328	.0005	2.64**
Newcnt = 4	-1331	.0006	2.70**
Newcnt = 5	-1330	.0002	2.00*

\**p* < .05; \*\**p* < .01

The Wealth variable distinguishes between managers who have a lot of dollars invested in the equity of the firm and those who have few dollars invested therein. For no single year prior to the firm outcome is the Wealth variable statistically significant for the Bankruptcy outcome. Wealth was used as the exogenous variable instead of the percent of the firm's common stock owned by managers because scale differences may have significant impact on managerial preferences. That is, owning 50% of a thinly capitalized firm whose stock price is depressed may provide less incentive to managers than does owning 10% of the higher priced stock of a firm with millions of shares outstanding. The interpretation of Tables 1 and 2, above, is that increases in the Wealth variable, which is measured in millions of dollars, increased the likelihood that the firm outcome was acquisition/merger as opposed to an internal turnaround outcome (Table 1). However, Wealth provides no information about the likelihood of a Chapter 11 bankruptcy reorganization outcome (Table 2). The coefficients on the acquisition/merger outcome are significant for all five years. The AIC is lowest, indicating the best model, for year two prior to the firm outcome. The Wealth variable alone was significantly related to the acquisition/merger outcome for all years but did not explain the bankruptcy outcome in any year. Also, the size of the effect of Wealth in determining the acquisition/merger outcome is extremely small for all years. The AIC is largest in year two.

**Table 2**  
**Multilogit Regression Results Using WEALTH Variable to Predict**  
**Likelihood of Bankruptcy Outcome Versus Internal Turnaround**

Bankruptcy	AIC	Coefficient	Coefficient/SE
Newcnt = 1	-1337	.0006	1.05
Newcnt = 2	-1433	.0005	1.21
Newcnt = 3	-1328	.0003	1.12
Newcnt = 4	-1331	.0005	1.65
Newcnt = 5	-1330	.0006	.29

Thus the hypothesis is only partially supported. The results reported above indicate that while increases in managerial wealth invested in the firm make the acquisition/merger outcome more likely, there was no correlation between the level of managerial wealth and the Chapter 11 reorganization in bankruptcy outcome.

### Discussion

Managers who own stock in their firms are more likely to use a formal, legalistic means of adapting a firm to its environment to deal with a crisis predicament. These managers want to fend off creditors, obtain new cash, or extract some of their own invested capital from the firm. The greater the amount and value of

stock that these managers hold, the greater their incentive to find an acquisition/merger partner. Other managers, ones with smaller ownership stakes or no such stake whatsoever, are more likely to attempt an internal turnaround, managerial magic, cutting costs, focusing on a new strategic niche, risking stockholders' capital, and maintaining their positions with attendant managerial perks. This strategy offers non-owner managers a greater opportunity to maintain their managerial prerogatives than do any of the formal, legal processes.

The results for Wealth fail to disconfirm the hypothesis that managers' ownership stakes in their firms affect the outcome for distressed firms. For the year immediately prior to firm outcome, Wealth was a statistically significant discriminator between acquisition/merger and internal turnaround outcomes. However, Wealth was not statistically significant for the bankruptcy outcome. The Wealth variable represents only a part of the incentives for managers operating a distressed firm. Variables representing stock options and rates of pay would complement the Wealth variable. If the results were similar for those additional variables, the conclusions presented here would be much more robust.

This paper reports effects derived from only a part of managers' wealth—their stockholdings. Other major sources of managerial wealth include earnings, stock options, and personal holdings. Inclusion of these variables may change the results reported here. Also, further division of the dependent variable would offer additional insights. For example, mergers could be distinguished from acquisitions and low cost from focus internal turnaround strategies. Lastly, the uneven sample cell sizes may have affected the results. Not many large firms, which populate the Compustat database, enter into Chapter 11 proceedings. Nonetheless, some support for the wealth hypothesis was found. Where managers had larger stakes (wealth) in the turnaround firm, an acquisition/merger outcome was more likely than an internal turnaround attempt.

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