Post-Chapter 11 Bankruptcy Performance: Avoiding Chapter 22

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ABSTRACT

Despite the long experience in the United States with restructuring firms in bankruptcy, there remains a persistent tendency for firms to emerge from bankruptcy with too much debt and negative profitability as compared to firms which successfully avoid future financial distress after emergence. We assess the future viability of firms just as they exit the bankruptcy reorganization process, specifically as to whether they will file again - - the "Chapter 22" phenomenon. Using a variant of the Z-Score model, one can distinguish quite well the post-bankruptcy performance of publicly owned industrial firms. We conclude that careful screening of firms that exit bankruptcy can improve on the effectiveness of the reorganization process.

Key words: Bankruptcy, Chapter 11, Chapter 22, Z-Scores, Corporate Reorganization

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More than forty years ago, this author published an article (Altman, 1968) whereby fundamental financial data and equity market values were combined to effectively predict whether firms would go bankrupt in the United States. That resulting Z-Score model has become a venerable financial tool to assess the credit worthiness of manufacturing firms throughout the world and is still used generally by scholars and practitioners in a variety of ways, including credit and debt analysis, investment decisions, default probability, merger and acquisition screens, audit-risk receivable management and even by advisors and managers themselves to manage a financial turnaround of distressed companies.[1] This article extends the applicability of bankruptcy prediction to a unique assessment of the health of corporate industrial entities as they *emerge* from the chapter 11 bankruptcy process and assesses the likelihood that the debtor will have to file for bankruptcy again – the so-called "Chapter 22" phenomenon.

1 - Chapter 11 Bankruptcy Reorganization

Over the years, in addition to the issue of the overall effectiveness of the Chapter 11 bankruptcy process in the United States, there has been a fairly continuous debate as to whether the process provides the right balance between reorganizing economically viable firms versus liquidating non-viable companies under Chapter 7. For those firms which do attempt the former reorganization, seeking temporary protection from creditors while putting in place an operational plan and financial structure which will permit the firm to emerge as a going concern, there are several ways in which one might evaluate the success of the reorganization.

[1] For a more detailed description of Z-score applications, see Altman and Hotchkiss (2006).

The first requirement of a successful restructuring is for the firm to, in fact, emerge from the process as a going concern. A further test is to assess the post-bankruptcy results of the entity as to its operating and/or its stock market performance. While this performance may be compared to other firms in the same industry or to some stock market index over time, it is clear that if the firm is forced to seek another distressed restructuring within a relatively short period of time after emerging, the process was not a success at all. The most extreme instance of a failed Chapter 11 is that the firm files for bankruptcy again - - a situation that has been described as "Chapter 22" (Hotchkiss, 1992, Altman, 1993).[2]

Studies of post-bankruptcy performance, reviewed in Altman and Hotchkiss (2006), find that while many firms restructure without the need of further remedial action, a striking number of cases require that the reorganized business needs to restructure again through a private workout or a second (or third!) bankruptcy. For example, Hotchkiss (1995) found that 32 percent of her sample of large companies that emerged as a public entity restructured again through a private or court determined restructuring, and LoPucki and Whitford (1993), in their study of larger Chapter 11 filings, found that 32 percent filed again within four years of emerging. While some firms emerge still with too much debt, most firms cite operating problems as the primary reason for the second filing.

As we will show, the troubling incidence of subsequent failures has accrued despite requirements, under the Bankruptcy Codes enacted in 1978, and amended in 2005 (BAPCA), that, in order for a reorganization plan to be confirmed, the bankruptcy court must make an independent finding that the plan is feasible and that further reorganization is not likely or

[2] Edith Hotchkiss, working on her dissertation at New York University, compiled a list of "two-time filers" which she called Chapter 22's. Among the early two-time filers of Chapter 11 were Commonwealth Oil (1979, 1984), Cook United (1984, 1987), CS Group (1982, 1984), W & J Sloan (1981, 1988) and Continental Airlines (1983, 1999).

needed; specifically that the plan "is not likely to be followed by the liquidation or the need for further financial reorganization of the debtor or any successors of the debtor under the plan (Section 1129(a)(11) of the Bankruptcy Code). In reality, however, unless there is convincing opposing evidence presented by interested parties, the bankruptcy court has little choice but to sanction the plan as presented.

1 A - Purpose of the Study

The purpose of this study is not to debate the merits of Chapter 11, especially since the Bankruptcy Code has recently been substantially modified in 2005. The purpose is to analyze whether one could predict, with a reasonable degree of accuracy, which firms emerging from bankruptcy are more likely to suffer subsequent problems and file again under "Chapter 22." In other words, can advisors, analysts, investors, and the debtors, indeed, the court system itself, avoid as much as possible the Chapter 22 phenomenon.

1 B - Post Bankruptcy Performance

It is important to understand that a relatively high proportion of larger firms that attempt to reorganize under Chapter 11 do emerge as independent, going-concerns[3]. At the same time, Altman and Hotchkiss (2005) show that for public firms of all sizes only between 26-45% (depending upon the year) emerged over the period 1990-2002 with their reorganization plans confirmed by the courts, and these statistics include many firms with multiple filings for various subsidiaries of the same firm. For those firms which had their plans confirmed, about 44% emerged as a publicly registered company (see Hotchkiss and Mooradian's (2004) study of 1400

[3] This proportion is expected to shrink in the current credit market crisis due to the difficulty in attracting lenders to provide adequate debtor-in-possession loans just after filing and sufficient "exit-financing" to enable emergence.

Chapter 11 case outcomes from 1979-2002). The most important determinant of a firm's likelihood of emerging successfully was the firm's size (measured by assets at the time of the bankruptcy petition - - see Hotchkiss (1993) and more recently by its ability to secure debtor-in-possession (DIP) financing (Dahiya et al (2003). Size and access to post-petition financing are, not surprisingly, highly correlated.

Gilson (1997) found that leverage remained high after both out-of-court restructuring and Chapter 11 reorganization, although it remained considerably more elevated after the out-of-court strategy. In a study of 58 out-of-court cases and 51 firms which went through the Chapter 11 process over the period 1980-1989, he found that the median ratio of long-term debt (face value) to the sum of long-term debt and common shareholders equity (market value) was 0.64 for firms that restructure out-of-court and 0.47 for those that reorganize in Chapter 11. Hence, significant remaining debt on the balance sheets of reorganized firms could contribute to their re-filing in the not too distant period after emergence. He also found that as much 25 percent of his total sample had to file for bankruptcy (again in the case of emerged firms from Chapter 11) or restructure their debt again.

Heron, Lie and Rogers (2006) find similar results to that of Gilson (above) in that while firms they studied substantially reduce their debt burden in "fresh start" Chapter 11 reorganizations, they still emerged with higher debt ratios than what is typical in their respective industries. They studied 172 firms that emerged from Chapter 11 under "fresh start" accounting values (firms which emerged with a significant change in equity ownership) from 1990 to 2004.

Existing studies that have examined the post-bankruptcy performance of firms registered as public companies can be found in Table I. Several of these studies assessed the performance of firms' profitability and cash flows relative to comparable firms in similar industries. The

overwhelming result was that more than two-thirds of those emerged firms underperform industry peers for up to five years following bankruptcy and in some studies (e.g., Hotchkiss, 1995) as much as 40 percent continued to experience operating losses in the three years after emergence. McHugh, et al (1998) show that projections provided by the Bankruptcy reorganization plan for two-time filers (Chapter 22s) prior to their emergence from their first Chapter 11 are typically overstated and these overstatements are more pronounced for two-time filers than for single filers.

On the other hand, however, recent experience for larger firms do show improved post-bankruptcy experience and one study by Eberhart, Aggarwal and Altman (1999) shows significant excess stock market returns in the 200 days following emergence for those firms which emerged in the period 1980-1993 with publicly listed equity. While this positive stock price performance seems to be cyclical, with poorer performance in the mid-to-late 1990s, a number of more recent firms enjoyed spectacular post-bankruptcy returns after the surge in bankruptcies in 2001-2002.[4] Lee and Cunney (2004) found that investing in formerly bankrupt firms' equities between 1988-2003 (sample of 111 firms) resulted in a positive average 85% relative to the S&P 500 Index performance in the first 12 months after emergence. The volatility of these returns was extremely high, however, with only 50% of the stocks outperforming. Indeed, the excellent post-bankruptcy performance of many firms in the 2003-2005 period

[4] The "poster- child" for impressive returns was Kmart Inc. whose stock traded under $14 per share when the firm emerged in May 2003 but rose to almost $200 per share within a year and a half. Other notable gainers of above 40% return in excess of the S&P 500 in the two years after emergence were American Commercial Lines, Atlas Air Holdings, Chiquita Brands International, Dade Bearings, Haynes International, Sears Holdings, Laidlaw International, Leap Wireless, McLeod USA, Motient Corp., MPower, NRG Energy, Petroleum Gas Services, Spectra Science, Texas Petroleum, Warnaco Group, and Washington Group International.

prompted one investment bank, Jefferies & Co., to create an Index of Post-Bankruptcy equity performance in 2006 called "*The Jefferies Re-org Index*^{sm}."[5]

A few additional studies show fairly positive post-bankruptcy performance or at least less negative experience. Alderson and Betker (1999) examined a sample of 89 firms emerging from bankruptcy between 1983-1993 and compute the five-year annualized return earned by the reorganized firm, relative to the value that would have been received in liquidation and invested in alternative assets. Where the liquidation value was not available from the plan, the authors used the plan's estimated market value at emergence. They find that the reorganized firms' annualized returns are not significantly different from returns on the S&P 500 stock index, i.e., they neither under nor over perform. Hotchkiss and Mooradian (1997) find, from a sample of 288 firms that defaulted on public debt, most of whom went bankrupt, that while 32 percent experienced negative operating performance in the year following emergence if there were no outside "vulture" investors directly involved with significant ownership, only about 12 percent had the same negative experience when a "vulture" was actively involved in the restructuring.

2 - Subsequent Distressed Restructurings

As noted earlier, roughly one-third of those firms emerging as a publicly registered company experience some form of subsequent distressed restructuring again, including the filing

[5] This index was launched on December 20, 2006 to track the returns for newly emerged post-Chapter 11 equities. These new equities are updated daily and tracked for a two-year period after emergence. Index values are published on Jefferies website (www.jefferies.com/indices) and on Bloomberg under JEFIREOP. In their test runs, the number of constituent firms ranged from 15 to 29 between 2001 and 2006. Since then the number has diminished somewhat as the bankruptcy rate decreased in 2007. The potential constituent list has increased of late and is expected to increase even more in 2009-2010. Indeed, in 2008, there were about 146 Chapter 11 filings with liabilities greater than $100 million compared to just 38 for all of 2007. In 2009, there were 234 of these large bankruptcies with total liabilities over $600 billion,(see the Altman – NYU Salomon Center Bankruptcy data base) and E. Altman and B. Karlin (2010).

of a second (or third, or even more) bankruptcy. [6] Table II shows the number of Chapter 22s and 33s from 1984-2009. Including 19 in 2008 (the highest single year total in our sample) and 18 in 2009, there have been 215 Chapter 22s and ten Chapter 33s (see Appendix A for the list of Chapter 33s).[7] In a sample of about 60 Chapter 22s that we observe, for all, the second filing took place within nine years after the firm emerged from its first Chapter 11 and a surprisingly large proportion (92%) within five years of emergence (see our empirical results discussion at a later point). For example, for the "class of 2008" Chapter 22s, 12 of the 19 filed within five years and 15 of 19 within six years (Table IIIa). The average time between the first emergence and the second filing was four years and six months (three years nine months median). In 2009, 10 of the 18 filed again within five years and the average time between the first emergence and second filing was four years and five months (Table IIIb). Usually, but not always, the amount of assets of Chapter 22 firms is greater at the time of the first filing than the second, since one of the strategies found in most bankruptcy reorganizations is the selling of assets to improve operations or to provide much needed liquidity. For example, in 14 of the 19 Chapter 22's in 2008 and in 16 of the 18 in 2009, the second bankruptcy had lower assets than the first.

[Table II here]

[Table IIIa and IIIb here]

[6] Amazingly, there was one firm, Trans Texas Gas Corporation, whose initial filing was prior to the 1978 Bankruptcy Reform Act, that has filed and emerged four times and following its most recent emergence in 2003, operates as a private company. And four of Donald Trump's various hotel and entertainment enterprises have filed for bankruptcy (in 1982, 2001, 2004 and 2009). We do not include them in our Chapter 22 sample since the specific hotels involved are different.

[7] Two recent seeming Chapter 33s, Frontier Airlines (2008) and National Energy Group (NEG) (2003), were actually two distinctly different companies, and so we have not included them as a Chapter 33s.

It is quite interesting to observe that Chapter 22 instances are still prominent in 2008 and 2009 despite the fact that the outright sale of the bankrupt company consummated during the bankruptcy reorganization period is quite a common occurrence under the revised Bankruptcy Code of 2005. Time will tell if the Chapter 22 phenomenon will decrease somewhat as the older reorganizations are flushed from the system. What we are observing, however, also in recent years, is that many of the larger Chapter filings involve "prepackaged" agreements, which usually only attempt to "fix" the capital structure problems of the distressed company. Amongst these cases, more Chapter 22s might be expected.

3 - Avoiding Chapter 22

In order to assess the ability to predict the subsequent performance of firms emerging from Chapter 11 bankruptcy reorganization, we utilize a bankruptcy prediction model known as the Z"-Score model, patterned after the classic Altman Z-Score model of 1968, (see Altman and Hotchkiss, (2005) for a description of the Z"-Score model and its application to industrial firms and emerging market entities). The Z"-Score model was first developed for testing the efficacy of credit scoring of emerging market firms (Altman, Hartzell and Peck, 1995) and then applied to US non-manufacturers as well as manufacturing industrials. The success of the emerging market application was further tested by Altman (2005).

The logic behind this methodology is that if a model has proven to be credible and accepted by academics and practitioners for predicting corporate distress,[8] it might also be

[8] The Altman Z-Score models are widely accepted and found in financial textbooks and scholarly articles, as well as on many financial software packages and information sources. For example, Bloomberg terminal results show that there are regularly close to 1,000 "hits" per day on the "Altman Z-Score" (AZS) page.

effective in assessing the future health of firms emerging from bankruptcy reorganization, especially if the result you are trying to predict (avoid) is a second filing of bankruptcy.

The original Z-Score model (Altman, 1968) was built primarily for manufacturing firms, although many use it for other industrial firms, as well. Firms need to be publicly held since one of the variables, the market value of equity/total liabilities (X_4 in Table IV) requires the availability of publicly traded equity. In order to make the model more robust across all industrial groupings, as well as for privately owned companies, Altman developed the Z"-Score model, first for US companies and then adapted for emerging market firms (Table V). Note that the Z"-Score model has four variables, not five as in the original model. The Sales/Total Tangible Assets variable is removed and the coefficients re-estimated.

[Tables IV and V Here]

In order to make the Z"-Score model more meaningful, Altman developed the concept of a bond-rating-equivalent (BRE) of the Z"-Score (and for Z-Score, as well - - see Altman & Hotchkiss, 2005). Table VI shows the Z"-Score model and its BREs based on data from 1996; chosen as an appropriate year for our subsequent empirical tests. The equation used to calculate Z"-Score was modified by adding a constant term of 3.25 so as to scale the scores to a "D" rating equal to zero (0.0).[9] Firms with Z"-Scores above zero have BREs in the non-bankrupt zones (AAA to CCC-).

[Table VI Here]

[9] The average "Z"-Score of a sample of firms filing for bankruptcy prior to 1996 was -3.25; hence the addition of that constant term.

3 A - Expectations

We will now explore the results of applying the Z"-Score model to two samples of firms that emerged from bankruptcy. One sample consists of Chapter 22s or 33s, i.e., they filed a second or third time for bankruptcy. The second sample represents those Chapter 11 emergences which did not file a second time.

Since both samples represent firms that have undergone an extensive restructuring, usually of both their operations and capital structure, one might expect that their financial profiles upon emergence will resemble a going-concern, non-bankrupt entity. If, however, the bankruptcy prediction model is effective in detecting future problems, then we should find that the average Z"-Score values of the Chapter 22 sample will be significantly lower (worse) than the sample of Chapter 11s.

3 B - Sample Characteristics

We have assembled two samples of firms which have (1) filed for bankruptcy protection under Chapter 11 and have not suffered a subsequent distressed restructuring, including a second bankruptcy filing (Chapter 11s), and (2) have filed for bankruptcy protection at least twice (Chapter 22s). The effective confirmation date of the bankruptcy reorganization plans for the 45 Chapter 11s was between 1993 and 2003 (Table VIIa). The latter date was chosen so that there has been at least five years since the firm emerged from bankruptcy and has not filed again. The firms were chosen based mainly on data availability for calculating the Z"-Score distress prediction model. Our objective was to assemble a reasonably large representative sample of industrial firms that filed for bankruptcy under Chapter 11 and emerged as publicly held firms with post-bankruptcy financial data available during roughly the same data period as our Chapter

22 sample. The size of this sample is similar to our Chapter 22 sample (see below). Our data source for emerged companies is *New Generation Research* and their database goes back to 1993.[10] While we did not match the two samples exactly by year of emergence, the distribution by emergence year was quite similar, with the exception of the year 2003, where we used 11 Chapter 11s and only two Chapter 22s.[11]

For the 41 Chapter 22 firms listed in Table VII(b), the effective emergence date from their first bankruptcy ranged between 1993 and 2006 (only two were after 2003). Five of the firms were Chapter 33s, so they appear twice in the sample. The average time between the effective emergence date and the second filing date was three years and four and a half months. The range of the durations from the emergence to the second-filing date of the Chapter 22s listed in Table VII(b) was between one year and 10 months (TWA [1]) and eight years and eight months (Ames Department Stores). While the number of Chapter 22s sampled in Table VII(b) is about 30 percent of the total Chapter 22s since 1993, they represent a broad cross-section of industrial companies and virtually all entities that we were able to obtain complete financial data in order to calculate our distress prediction model. Likewise, we believe that the 45-firm sample of Chapter 11s in Table VII(a) represents a broad cross section of non-second-filers.

[Tables VII (a) and VII (b) Here]

[10] There are three Chapter 22 firms that emerged just prior to 1993 (1991 and 1992) that are included.
[11] This was done to increase our sample of Chapter 11s. If we had randomly selected only seven Chapter 11s in 2003 so as to make the size of the two samples exactly the same (41), the comparative results, discussed later, would have been almost identical to that of the slightly larger sample.

3 C – Post-Bankruptcy Distress Prediction Results

In order to test the effectiveness of screening Chapter 11 emerging firms for potential serious subsequent distress, we utilize the Z"-Score prediction model on our samples of Chapter 11 single versus multiple filers. A comparison of the average Z"-Scores and their respective bond rating equivalents (BREs) will be observed and statistical difference tests applied between the two groups. We observe from Table VII(a) that the average Z"-Score for our sample of single-filers (Chapter 11s), based on data from their first financial statement following emergence, was 4.73 (4.38 median), with a bond rating equivalent of B+ (see Table VI). The B+ BRE is consistent with our observations over time that almost all firms that do emerge with bonds outstanding have a bond rating usually in the single-B to double-B range, rarely higher. For our Chapter 22 sample, the average Z" score was considerably worse, at 2.67 (3.05 median), with a BRE of CCC (Table VII (b)). The differential between the average Chapter 11s and 22s Z"-Scores remained similar based on data from an additional one year beyond the emergence date (4.65 vs. 2.45). Indeed, the Chapter 22s average scores dipped by 0.08, one year after the first financial period, consistent with deteriorating conditions as the firm moved toward its second filing.

For the sample of Chapter 22s, nine of the 41 firms actually had a financial profile (BRE) at a point nearest the emergence date consistent with a "D" (default) rating and only 16 had a BRE better than CCC. Most of these firms showed unmistakable early warning signals of future distress. For the 45 firm Chapter 11 sample, only one firm (Fansteel, Inc.) had a Z"-Score consistent with a "D" profile bond rating equivalent.

3 D – Significance Test

In order to test the statistical significance of our average results of the two samples of Chapter 11 emerging firms, we performed a “difference of means” test, indicated in Table VIII. The t-test between a mean of 4.73 (Chapter 11s) and 2.67 (Chapter 22s) was significantly different at the .01 level (t-test = 3.84) at the point nearest the emergence date and also one year later (t=3.60). So, it is clear that the sample of firms that eventually filed a second bankruptcy petition had a significantly worse financial profile just after emerging from bankruptcy than did the sample of firms which remained a going concern for at least five years after emerging.

4 - Why Do Firms Fail to Restructure Successfully

We have shown quite clearly that the overall risk profile of firms which are unsucessfully reorganized under Chapter 11 look considerably worse than those which manage to emerge and remain as going concerns. It remains now to observe, if possible, if there were specific signals, in addition to the composite Z”-score criterion, of the impending fate of these two groups of enterprises. To accomplish this, we now analyze the four individual indicators that comprise the Z”-Score model. The four represent indicators of corporate liquidity, solvency, profitability and leverage. The results are quite revealing.

Table IX lists the means, standard errors and the difference in means test between our two main samples of Chapter 11 vs. Chapter 22 firms for the four explanatory variables in the Z”-score model. We conclude that the Chapter 22 sample had inferior measures in all four dimensions and that, in particular, measures of profitability and leverage were statistically significant different between the two groups. While we could argue that a reorganization plan could eventually lead to an improvement in profitability, there does not appear to be any excuse

for the over-leveraged situation. Indeed, the equity/total liability ratio of Chapter 22 firms was only 0.27 vs. 0.74 for the Chapter 11 firms. To put it differently, the leverage of firms which failed again was almost three times greater than those that emerged and remained solvent. The Chapter 22 sample had almost four times as much liabilities as equity ($3.70 of debt to every dollar of equity) while the Chapter 11 firms had about $1.35 of debt to every dollar of equity. This finding confirms what Gilson (1997) first concluded based on earlier analysis of reasons for poorly constructed reorganization plans. The prescription for future successful reorganizations is clear - - do not load up the balance sheet of emerging firms with excessive debt.

Table IX also shows that the average working capital to total assets of Chapter 22 firms was 0.09 vs. 0.15 for Chapter 11 firms. The retained earnings to total assets for Chapter 22s was a negative 0.22 vs. a negative 0.09 for 11's and the EBIT/TA for the Chapter 22's was a negative 0.07 vs. a positive 0.01 for 11's and, as noted above, the Chapter 11 firms had an equity/debt ratio of 0.74 vs. 0.27 for the Chapter 22s. The first two measures' differences were only marginally statistically significant. On the other hand, both the profitability and leverage measures were significantly different between the two samples (at the .01 level (extremely low p-values)).

5 - Implications and Conclusions

We have examined the financial profiles of firms emerging from the Chapter 11 bankruptcy process as a publicly registered and owned company. Using the Z"-Score distress prediction model, we found that those firms that filed a subsequent bankruptcy petition had a significantly worse financial profile than did a sample of firms which emerged as a going concern and continued in that condition. Indeed, the average financial profile and bond rating

equivalent for the Chapter 22 sample when it emerged from its first bankruptcy was not that much better than what a defaulted firm looks like. Firms which file for bankruptcy a second time emerged as significantly less profitable with significantly more leverage than those that emerge and remain as going concerns.

We believe that a credible corporate distress prediction model can be an important indicator of the future success of firms emerging from bankruptcy and could even be used as an independent technique by the bankruptcy court to assess the future viability of the reorganization plan, which, as the Bankruptcy Code stipulates, should be done. It could also be used by those responsible for devising and/or assessing the reorganization plan with the possible positive benefit of further modifications if the emerging firms' profiles are that of a continuing distressed company. Another potential benefit is for those creditors of the "old" company to assess the investment values of the new package of securities, including new equity, offered in the plan. Or, for those investors considering purchasing the new equity, the technique can be another analytical tool. Finally, professional turnaround specialists, who might be involved in the cases, can use this early-warning technique to assess the likelihood that their efforts will succeed.

Table I

Academic Studies of Post-bankruptcy Performance

This table lists a number of existing studies related to the Post-Bankruptcy Performance of firms emerging from Chapter 11

	Operating Performance	Ability to Meet Cash Flow Projections	Stock Performance	Sample
Hotchkiss (1995)	√	√		197 firms emerging by 1989
Hotchkiss & Mooradian (2004)	√		√	620 firms emerging by 2004
Maksimovic & Phillips (1998)	√			Plant-level data for 302 manufacturing firms in Chapter 11, 1978-1989
Alderson & Betker (1999)	√			89 firms emerging from Chapter 11, 1983-1993
Hotchkiss & Mooradian (1997)	√			288 firms defaulting on public debt 1980-1993 (166 are reorganized in Chapter 11)
McHugh, Michel, & Shaked (1998)		√		35 firms emerging from Chapter 11, 1990-1994
Betker, Ferris, & Lawless (1999)		√		69 firms emerging from Chapter 11, 1984-1994
Aggarwal, Altman & Eberhart (1999)			√	131 firms emerging from Chapter 11, 1980-1993
Goyal, Kahl & Torous (2002)			√	Firms distressed between 1980 and 1983; 35 firms in first year after resolution of distress to 25 firms five years after
Lee & Cunney (2004)			√	111 firms emerging from Chapter 11, 1988-2005

Source: Updated from Altman & Hotchkiss (2005).

Table II

Chapter 22s and 33s in the United States
1984-2008*

This Table lists the number of Chapter 22 and Chapter 33 Filings from 1984-2008.

Year	Number of Chapter 22s	Number of Chapter 33s
1984	2	0
1985	2	0
1986	4	0
1987	1	0
1988	5	0
1989	4	0
1990	10	0
1991	9	0
1992	6	0
1993	8	0
1994	5	0
1995	9	0
1996	12	2
1997	5	0
1998	2	1
1999	10	0
2000	12	1
2001	17	2
2002	11	0
2003	17	1
2004	6	0
2005	9	1
2006	4	0
2007	8	1
2008	19	0
2009	18	1
Totals	215	10

Sources: The Bankruptcy Almanac, annually, Boston: New Generation Research and Altman and Hotchkiss *Corporate Financial Distress and Bankruptcy*, J. Wiley, Hoboken, NJ., (2005).

Table IIIa

2008 Chapter 22s: Size and Duration

This Table lists the actual firms that filed for bankruptcy protection a second time in 2008.

Company	Bankruptcy Date	Assets	Confirm Date	Time Between Confirmation and Second Filing	Public/ Private
Aloha Airlines, Inc. (2004)	12/30/04	$100,000,000	11/26/05	2 years, 4 months	Private
Aloha Airlines, Inc. (2008)	03/20/08	$215,850,000			Private
ATA Holdings Corp. (2004)	10/26/04	$869,987,000	01/31/06	1 year, 1 month	Public
ATA Airlines, Inc. (2008)	04/02/08	$100,000,000			Private
Bally Total Fitness Holding (2007)	07/31/07	$396,771,000	09/17/07	1 year, 3 months	Public
Bally Total Fitness Holding (2008)	12/03/08	$1,376,000,000			Public
Dan River, Inc. (2004)	03/31/04	$466,479,000	01/18/05	3 years, 3 months	Public
Dan River, Inc. (2008)	04/20/08	$ 50,000,000			Private
DESA Holdings Corporation (2005)	06/08/02	$132,500,000	04/01/05	3 years, 9 months	Public
DESA LLC (DHP Holdings II (2008)	12/29/08	$233,896,000			Private
Friedman's Inc. (2005)	01/14/05	$447,883,000	11/28/05	2 years, 2 months	Public
Friedman's Inc. (2008)	01/28/08	$245,787,000			Private
Gemini Air Cargo (2006)	03/15/06	$ 59,363,216	07/21/06	2 years, 0 months	Private
Gemini Air Cargo (2008)	06/18/08	$100,000,000			Private
Indesso International (2000)	11/17/00	$165,846,000	01/11/02	6 years, 6 months	Public
Continental AFA Dispensing (2008)	08/07/08	$ 18,000,000			Private
Intermet Corporation (2004)	09/29/04	$686,684,000	09/25/05	2 years, 11 months	Public
Intermet Corporation (2008)	08/12/08	$ 50,000,000			Private
KB Toys, Inc. (2004)	01/14/04	$507,000,000	08/18/05	3 years, 4 months	Private
KB Toys, Inc. (2008)	12/11/08	$100,000,001			Private
Key Plastics, LLC. (2000)	03/23/00	$388,490,000	04/02/01	7 years, 8 months	Public
Key Plastics, LLC. (2008)	12/15/08	$100,000,001	01/29/09		Public
Leiner Health Products Inc. (2002)	02/28/02	$353,137,000	04/15/02	5 years, 11 months	Public
Leiner Health Products Inc. (2008)	03/10/08	$378,618,000	10/15/08		Public
Mattress Discounters Corp. (2002)	10/23/02	$105,746,000	03/04/03	5 years, 6 months	Public
Mattress Discounters Corp. (2008)	09/10/08	$ 16,922,316			Private
Penn Specialty Chemicals Inc. (2001)	07/09/01	$ 83,260,620	07/19/02	6 years, 5 months	Private
Penn Specialty Chemicals Inc. (2008)	12/17/08	$ 1,000,001			Private
Polar Molecular Corp. (2008)	01/11/08	$400,001,500	05/19/08	6 years, 3 months	Private
Polar Molecular Corp. (2008)	08/04/08	$ 1,500			Private

Polaroid Corporation (2001)	10/12/01	$2,043,000,000	11/18/03	5 years, 1 month	Public
Polaroid Corporation (2008)	12/18/08	$250,000,000			Private
Steakhouse Partners (2002)	02/15/02	$ 45,390,000	12/19/03	4 years, 5 months	Public
Steakhouse Partners (2008)	05/15/08	$ 17,750,000			Public
U.S. Wireless Data, Inc. (2004)	03/26/04	$ 13,963,000	12/27/04	3 years, 3 months	Public
StarVox Communications, Inc. (2008)	03/26/08	$ 4,865,000			Public
Sun Country Airlines Inc. (2002)	03/12/02	$ 55,200,000	12/19/03	4 years, 10 months	Private
Sun Country Airlines Inc. (2008)	10/06/08	$ 9,923,642			Private

Average Time Between Emergence & Second Filing **4 years and 6 months**

Source: New Generation Research, Boston, MA and NYU Salomon Center Bankruptcy Database.

Table III b
2009 Chapter 22s: Size and Duration

This Table lists the actual firms that filed for bankruptcy protection a second or third time in 2009

Company	Bankruptcy Date	Assets	Confirm Date	Time Between Confirmation & Second Filing	Public/ Private
Bruno's , Inc. (1998)	02/02/98	$ 791,430,000	12/30/99	8 years, 2 months	Public
Bruno's Supermarkets, LLC (2009)	02/05/09	100,000,001	09/25/09		Private
Eagle Geophysical, Inc. (1999)	09/29/99	273,200,000			Public
Eagle Geophysical, Inc. (2009)	05/31/09	6.526.394	n. a.	n. a.	Public
Spiegel, Inc. (2003)	03/17/03	1,889,580,000	05/25/05	4 years, 1 month	Public
Eddie Bauer Holdings, Inc. (2009)	06/17/09	596,920,000			Public
eNucleus, Inc. (2001)	05/10/01	2,505,930	11/06/03		Public
eNucleus Inc. (2009)	07/25/09	500		5 years, 8 months	Public
Filene's Basement Corp. (1999)	08/23/99	202, 700,000	10/23/00		Public
Filene's Basement, Inc. (2009)	05/04/09	79,967,643	01/26/10	8 years, 7 months	Private
FIRSTPLUS Financial Grp, Inc. (1999)	03/05/99	2,447,206,000	04/07/00		Public
FIRSTPLUS Financial Grp.Inc. (2009)	06/23/09	19,620,935		9 years, 2 months	Public
Foamex International Inc. (2005)	09/19/05	645,710,000	02/01/07		Public
Foamex International Inc. (2009)	02/18/09	430,550,000		2 years, 0 months	Public
Fortunoff Fine Jewelry & Silverware, LLC (2008)	02/04/08	267,624,000			Private
Fortunoff Holdings, LLC (2009) Private	02/05/09	154,698,000	n. a.	n .a.	
Goody's Family Clothing,Inc.(2008)	06/09/08	313,000,000	10/07/08		Private
Goody's, LLC (2009)	01/13/09	206,000,000		0 years, 3 months	Private
Hayes Lemmerz International, Inc. (2001)	12/05/01	2,811,100,000	05/12/03		Public
Hayes Lemmerz International, Inc. (2009)	05/11/09	1,096,200,000	11/03/09	6 years, 0 months	Public
Holley Performance Products, Inc. (2008)	02/11/08	111,997,000	03/19/08		Public
Holley Performance Products, Inc. (2009)	09/28/09	46,426,943		1 year, 6 months	Public
J.L. French Automotive Castings, Inc. (2006)	02/10/06	366,681,000	06/21/06		Public
J.L. French Automotive Castings, Inc. (2009)	07/13/09	100,000,000	09/03/09	3 years, 1 month	Private

Meridian Automotive Systems, Inc. (2005)	04/26/05	530,000,000	12/06/06		Private
Meridian Automotive Systems, Inc. (2009)	08/07/09	25,593,104		2 years, 8 months	Private
Penn Traffic Company, The (1999)	03/01/99	1,563,590,000	05/27/99		Public
Penn Traffic Company, The (2003)	05/30/03	806,370,000	03/17/05		Public
Penn Traffic Company, The (2009)	11/18/09	193,714,000		4 years, 8 months	Public
Pliant Corporation (2006)	01/03/06	777,092,000	06/23/06		Public
Pliant Corporation (2009)	02/11/09	675,979,000	10/06/09	2 years, 8 months	Public
Silicon Graphics, Inc. (2006)	05/08/06	452,145,000	09/19/06		Public
Silicon Graphics, Inc. (2009)	04/01/09	415,195,000	11/10/09	2 years, 7 months	Public
Trump Hotels and Casino Resorts, Inc. (2004)	11/21/04	2,031,433,000	04/04/05	3 years, 10 months	Public
Trump Entertainment Resorts, Inc. (2009)	02/17/09	2,231,211,000			Public
Ultra Stores, Inc. (2002)	03/07/01	76,060,000	12/03/01		Private
Ultra Stores, Inc. (2009)	04/09/09	63,850,350	07/28/09	7 years, 4 months	Private
Average Time Between Emergence & Second Filing				**4 years and 5 months**	

Source: New Generation Research, Boston, MA and NYU Salomon Center Bankruptcy Database.

Table IV

Z-Score Component Definitions and Weightings

This table shows the original Z-Score Model's
Variables and Coefficients.

Variable	Definition	Weighting Factor
X_1	Working Capital / Total Assets	1.2
X_2	Retained Earnings / Total Assets	1.4
X_3	EBIT / Total Assets	3.3
X_4	Market Value of Equity / Book Value of Total Liabilities	0.6
X_5	Sales / Total Assets	1.0

Source: Altman & Hotchkiss (2006) and Altman (1968).

Table V

Z”-Score Model for Manufacturers, Non-Manufacturer Industrials and Emerging Market Credits

This Table shows a modification to the original Z-Score model. It is known as the Z”- Score Model.

$$Z'' = 6.56X_1 + 3.26X_2 + 6.72X_3 + 1.05X_4$$

$$X_1 = \frac{\text{Current Assets} - \text{Current Liabilities}}{\text{Total Assets}}$$

$$X_2 = \frac{\text{Retained Earnings}}{\text{Total Assets}}$$

$$X_3 = \frac{\text{Earnings Before Interest and Taxes}}{\text{Total Assets}}$$

$$X4 = \frac{\text{Book Value of Equity}}{\text{Total Liabilities}}$$

Source: Altman and Hotchkiss (2006).

Table VI
US Bond Rating Equivalents Based on Z”-Score Model

This table shows the standardized Z”- Score Model
and the Bond Rating Equivalents for the Resulting Scores.

$$Z'' = 3.25 + 6.56X_1 + 3.26X_2 + 6.72X_3 + 1.05X_4$$

Rating	Average 1996 Z”-Score[1]
AAA/AA+	8.15 (8)
AA/AA-	7.16 (33)
A+	6.85 (24)
A	6.65 (42)
A-	6.40 (38)
BBB+	6.25 (38)
BBB	5.85 (59)
BBB-	5.65 (52)
BB+	5.25 (34)
BB	4.95 (25)
BB-	4.75 (65)
B+	4.50 (78)
B	4.15 (115)
B-	3.75 (95)
CCC+	3.20 (23)
CCC	2.50 (10)
CCC-	1.75 (6)
CC/D	0.00(14)

Source: Compustat, Company Filings and S&P

[1]Sample Size in Parentheses

TABLE VII (a)

Z" Scores for Chapter 11's

This table lists a sample of firms, and their Z"-Scores that emerged from bankruptcy and did not file for bankruptcy protection a second time

	CHAPTER-11 Company Name	Effective Date	Z"-Score After Emergence	Bond Rating Equivalent	Z"-Score 1-Year Post	Bond Rating Equivalent
1	Boonton Electronics	11/18/94	7.67	AAA/AA+	7.63	AA
2	CAI Wireless Systems, Inc.	10/14/98	2.12	CCC-	na	na
3	Cherokee Corp	06/01/93	4.00	B	2.09	CCC-
4	Consolidated Hydro, Inc.	11/07/97	3.90	B-	4.81	BB-
5	El Paso Electronic	02/12/96	4.38	B+	4.75	BB-
6	Elsinore Corporation	02/28/97	3.65	B-	4.18	B
7	Emcor	10/03/94	4.03	B	4.38	B+
8	Emerson Radio	08/09/94	5.42	BB+	4.08	B
9	Fansteel, Inc.	12/22/03	0.72	D	2.67	CCC
10	Flagstar Companies, Inc.	01/07/98	2.90	CCC+	(0.44)	D
11	Gantos	03/07/95	6.58	A	6.17	BBB+
12	Gentek, Inc.	10/07/03	4.51	B+	2.19	CCC
13	Grant Geophysical	09/30/97	4.49	B+	4.14	B
14	Harnischfeger Industries, Inc.	07/13/01	5.70	BBB-	5.30	BB+
15	Hayes Lemmerz International	05/12/03	4.38	B+	0.18	CC/D
16	Heartland Wireless Communications, Inc.	04/05/99	6.11	BBB+	5.01	BB
17	Hexcel Corporation	01/12/95	4.83	BB-	4.45	B+
18	Hvide Marine, Inc.	12/15/99	3.69	B-	3.64	B-
19	Imperial Sugar Co. TX	08/29/01	3.98	B	5.00	BB
20	Kaiser Group International, Inc.	12/18/00	6.94	A+	4.23	B
21	Kash N' Karry	12/12/94	4.20	B	4.60	B+
22	Kitty Hawk Inc.	09/30/02	6.19	BBB+	7.39	AA
23	Krystal Company	04/22/97	3.46	CCC+	9.41	AAA
24	Laidlaw, Inc.	02/28/03	4.40	B+	5.55	BBB-
25	Loehmann's Holdings Inc. DE	10/31/00	5.48	BBB-	6.24	BBB+
26	Loewen Group International, Inc.	01/02/02	3.09	CCC+	3.62	B-
27	Lone Star Industries	03/01/94	5.16	BB+	6.19	BBB+
28	Magellan Health Services, Inc.	10/08/03	4.96	BB	7.89	AAA/AA+
29	NRG Energy	11/24/03	3.75	B-	1.22	CCC-
30	Paragon Trade Brands, Inc.	01/28/00	5.72	BBB-	na	na
31	Pathmark Stores Inc.	09/18/00	4.12	B	2.47	CCC
32	Peregrine Systems, Inc.	07/18/03	4.28	B	3.47	CCC+
33	Petroleum Geo Services ASA	10/21/03	4.32	B	5.48	BBB-
34	PhoneTel	11/18/99	3.54	B-	4.30	B
35	Polymre Group, Inc.	01/03/03	2.35	CCC	2.09	CCC-
36	Redback Networks, Inc.	12/22/03	6.56	A	6.19	BBB+
37	Safety Components International	10/11/00	6.13	BBB+	5.13	BB+
38	Southern Mineral Corp.	08/01/00	5.38	BB+	na	na
39	Stage Stores Inc. NV	08/24/01	9.98	AAA	11.78	AAA
40	Sterling Chemicals Inc. New	12/19/02	4.98	BB	3.58	B-
41	Stratosphere Corporation	10/04/98	8.16	AAA	8.56	AAA
42	Telemundo	07/20/94	5.00	BB	4.98	BB
43	Teletrac, Inc.	09/15/99	3.82	B-	2.54	CCC
44	Vista Eyecare, Inc.	05/31/01	3.41	CCC+	3.34	CCC+
45	Warnaco Group, Inc.	01/16/03	4.27	B	4.62	B+
	Number of Bankruptcies		45		42	
	Average Z Score		**4.73**	**B+**	**4.65**	**B+**
	Median Z Score		4.38		4.53	
	Standard Deviation		1.63		2.55	

Source: Authors compilation from CapitalIQ data

TABLE VII (b)

Z" Scores for Chapter 22's

This table lists a sample of firms that filed for bankruptcy protection at least two times and their Z"-Scores just after emergence and a year later

	CHAPTER-22 Company Name	Effective Date	Z"-Score After Emergence	Bond Rating Equivalent	Z"-Score 1-Year Post	Bond Rating Equivalent	Re-filing Date	Period Between Emergence and Second Filing Years	Months	Days
1	American Banknote Corporation	11/21/00	0.34	D	0.35	D	04/08/05	4	4	18
2	Ames Department Stores, Inc.	12/18/92	4.74	BB-	6.31	BBB+	08/20/01	8	8	2
3	Anacomp Inc.	06/04/96	3.72	B-	2.93	CCC+	10/19/01	5	4	15
4	Anchor Glass Container Corp.	11/25/97	3.62	B-	3.73	B-	04/15/02	4	4	21
5	Anchor Glass Container Corp.	08/09/02	3.61	B-	4.05	B	08/08/05	2	11	30
6	ATA Holdings Inc.	01/31/06	3.18	CCC+	3.40	CCC+	04/02/08	2	2	2
7	Brendle's Inc.	12/20/93	6.65	A	6.60	A	04/16/96	2	3	27
8	Coho Energy	03/21/00	1.71	CCC-	(3.27)	D	02/24/03	2	11	3
9	Eagle Food Centers,Inc.	07/10/00	2.49	CCC	3.45	CCC+	03/25/04	3	8	15
10	Edison Brothers Stores Inc.	09/26/97	4.19	B	2.85	CCC	03/09/99	1	5	11
11	Galey & Lord	02/10/04	(0.66)	D	0.28	D	03/05/04	0	0	24
12	Grand Union Company	05/31/95	2.81	CCC	1.90	CCC-	06/24/98	3	0	24
13	Grand Union Company	08/05/98	3.41	CCC+	0.76	D	10/03/00	2	1	28
14	Harvard Industries	08/10/92	2.38	CCC	1.10	CCC-	05/08/97	4	8	28
15	Harvard Industries	10/15/98	1.21	CCC-	0.80	D	01/16/02	3	3	1
16	Heartland Wireless	03/15/99	3.87	B-	5.25	BB+	09/05/03	4	5	21
17	Homeland Holding Corp.	07/16/96	4.73	BB-	4.18	B	08/01/01	5	0	16
18	Ithaca Industries	12/16/96	7.21	AA/AA-	6.86	A+	05/09/00	3	4	23
19	Lamonts Apparels	12/18/97	2.83	CCC	2.16	CCC	01/04/00	2	0	17
20	McleodUSA Inc.	04/18/02	(2.77)	D	3.42	CCC+	12/16/05	3	7	28
21	Memorex Telex	02/07/92	(0.49)	D	1.37	CCC-	02/11/94	2	0	4
22	Memorex Telex	03/14/94	0.62	D	(1.30)	D	10/15/96	2	7	1
23	Payless Cashways Inc.	12/02/97	5.19	BB+	5.64	BBB-	06/04/01	3	6	2
24	Penn Traffic Company	05/27/99	4.39	B+	3.73	B-	03/17/05	5	9	18
25	Pillowtex Corporation	05/02/02	2.78	CCC	na	na	07/30/03	1	2	28
26	Planet Hollywood Int'l, Inc.	01/21/00	(8.24)	D	(6.77)	D	10/19/01	1	8	28
27	Rymer Foods	04/07/93	4.44	B+	4.14	B	07/08/97	4	3	1
28	Salant	07/30/93	6.52	A-	5.80	BBB	12/29/98	5	4	29
29	Smith Corona	02/28/97	5.36	BB+	3.92	B-	05/23/00	3	2	25
30	Solo Serve	07/06/95	2.98	CCC+	1.50	CCC-	01/20/99	3	6	14
31	Steakhouse Partners	12/19/03	1.41	CCC-	1.19	CCC-	05/15/08	4	4	26
32	Todays Man, Inc.	12/12/97	7.24	AA-	9.12	AAA	05/06/04	6	4	24
33	Tokheim Corp.	10/09/00	3.90	B-	(0.57)	D	11/21/02	2	1	12
34	Trans World Airlines	08/11/93	(1.33)	D	1.98	CCC-	06/30/95	1	10	19
35	Trans World Airlines	08/04/95	3.05	CCC+	2.09	CCC-	01/10/01	5	5	6
36	Trism	12/09/99	(2.06)	D	(1.02)	D	12/18/01	2	0	9
37	United Merchants	08/16/91	(1.51)	D	0.63	D	02/22/96	4	6	6
38	US Airways Group, Inc.	03/18/03	2.63	CCC	1.84	CCC-	09/16/05	2	5	29
39	USG Corp.	04/23/93	3.48	CCC+	3.82	B-	06/25/01	8	2	2
40	Westmoreland Coal Company	12/22/94	2.18	CCC	(4.36)	D	12/23/96	2	0	1
41	Wherehouse Entertainment, Inc.	12/16/96	7.59	AA/AA-	7.95	AA+	01/20/03	6	1	4

						Years	Months	Days
Number of Bankruptcies	41		40					
Average Z Score	**2.67**	**CCC**	**2.45**	**CCC**	**Average**	**3**	**4**	**16**
Median Z Score	3.05		2.51					
Standard Deviation	3.06		3.18					

Source: Authors compilation from CapitalIQ data

Table VIII

Difference in Means Test between Chapter 22 vs. Chapter 11 Results

The Table shows the difference of Z"-Score means test
between Chapter 11 firms that did not file for bankruptcy a second time
and those that did file at least twice (Chapter 22s)

	Z"-Score After Emergence	**Z"-Score 1-Year Post Emergence**
Chapter 11 Mean	4.73	4.65
(Chapter 11 Std. Deviation)	(1.63)	(2.55)
Chapter 22 Mean	2.67	2.45
(Chapter 22 Std. Deviation)	(3.05)	(3.18)
t-test(*)	3.84(**)	3.60(**)

(*)

$$t = \frac{\overline{X}_{11} - \overline{X}_{22}}{\sqrt{\frac{Var_{11}}{n_{11}} + \frac{Var_{22}}{n_{22}}}}$$

(**) Significant at the .01 level

Source: Tables VII(a) and VII(b).

Table IX

Difference in Means and Tests of Specific Performance and Risk Levels: Chapter 22 Firms vs. Chapter 11's

This table shows the mean values for the four variables in the Z"- Score Model and the difference in means tests between Chapter 11 and Chapter 22 firms.

Variable	Chapter 11 Sample	Standard Error	Chapter 22 Sample	Standard Error	Difference in Means Test (t-test)	P-Value
X_1 = Working Capital/TA	0.15	0.16	0.09	0.28	1.24	0.22
X2= Retained Earnings/TA	(0.09)	0.22	(0.22)	0.39	1.88**	0.06**
X3= EBIT/TA	0.01	0.07	(0.07)	0.19	2.49*	0.02*
X4= Book Equity/Total Liabilities	0.74	1.08	0.27	0.39	2.71*	0.01*

*Significant at .01 level, ** significant at .10 level

Source: Author's calculations from firms listed in Tables VII (a) and VII (b), Capital IQ.

Appendix A
Chapter 33s

Chapter 33 is the unofficial name given to companies that have filed Chapter 11 reorganization for a third time. Below is a historical listing of companies that have filed Chapter 11 for the third time.

Company	Bankruptcy Date	Confirm Date	($ Millions)Assets
Anchor Glass Container Corporation (2005)	08/08/05	04/18/06	657
Anchor Glass Container Corporation (2002)	04/15/02	08/09/02	536
Anchor Glass Container Corporation (1996)	09/13/96	11/25/97	1,208
Grand Union Company (2000)	10/03/00	10/08/02	1,089
Grand Union Company (1998)	06/24/98	08/05/02	1,061
Grand Union Company (1995)	01/25/95	05/31/95	1,394
Harvard Industries, Inc. (2002)	01/16/02	02/26/04	277
Harvard Industries, Inc. (1997)	05/08/97	10/15/98	618
Harvard Industries, Inc. (1991)	04/11/91	08/10/92	533
Levitz Home Furnishings, Inc. (2005)	11/08/07	unknown	178
Levitz Home Furnishings, Inc. (1997)	10/11/05	12/15/05	245
PLVTZ, Inc. (Levitz Furniture) (2007)	09/05/97	pending	934
Memorex Telex Corporation (1996)	10/15/96	10/09/98	268
Memorex Telex N.V. (1994)	02/11/94	03/14/94	1,139
Memorex Telex N.V. (1992)	01/06/92	02/07/92	1,643
Salant Corporation (1998)	12/29/98	04/16/99	233
Salant Corporation (1990)	06/27/90	07/30/93	333
Salant Corporation (1985)	02/22/85	05/19/97	95
Samuels Jewelers, Inc. (2003)	08/04/03	03/30/04	48
Barry's Jewelers, Inc. (1997)	05/11/97	12/22/98	146
Barry's Jewelers, Inc. (1992)	02/26/92	06/19/92	158
The Penn Traffic Company (1999)	03/01/99	05/27/99	1,563
The Penn Traffic Company (2003)	05/30/03	03/17/05	606
The Penn Traffic Company (2009)	11/18/09	Unknown	184
Trans World Airlines (2001)	01/10/01	06/18/02	2,137
Trans World Airlines (1995)	06/30/95	08/04/95	2,495
Trans World Airlines (1992)	01/31/92	08/11/93	2,864
United Mechanics & Manufacturers (1996)	02/22/96	04/19/97	27
United Mechanics & Manufacturers (1990)	11/02/90	08/16/91	224
United Mechanics & Manufacturers (1977)	07/01/77	Unknown	Unknown

Source: The 2008 Bankruptcy Yearbook & Almanac, New Generation Research, Boston, MA 2009.

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