

When Shareholder Approval Matters: 20 Percent Rule for Privately Issued Equity

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Abstract

This paper empirically studies agency conflict by using a shareholder approval rule governing private placements. NASDAQ and other exchanges require shareholder approval for discounted, placements that make up more than 20% of existing shares. I document a distribution discontinuity around the threshold and identify many managers who avoid approval by keeping the fraction of new shares just below 20%. Shareholder avoiding firms have negative and 4.43% lower announcement day abnormal returns than firms that gain approval. Moreover, shareholder avoiding firms are less distressed and issue at higher discounts. Overall, my findings suggest agency problems in privately issued equity.

KEYWORDS: Private Placements, Shareholder Approval, Agency Problem

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I Introduction

Classic corporate theory suggests conflicting views about distress and equity issuance depending on the assumption made on managers. Assuming benevolent managers to shareholders, Myers (1977) suggests that it is difficult to issue equity under distress because value transfer to creditors (i.e., the debt overhang problem). Managers should issue equity only when the expected cost is less than the expected benefits for shareholders. Assuming self-interested managers, on the other hand, Jensen and Meckling (1976) and Jensen (1989) suggest managers would take actions to issue equity even when these actions do not maximize shareholder value. The cost of issuing discounted equity (i.e., dilution) would have limited effect on managers while the private benefits of issuing equity would be high to the manager.¹

Although distress and equity issuance have been important settings for principle-agent problems in theoretical models, it has been difficult to explicitly show agency conflict empirically. As such, the empirical literature find conflicting views on the main motivation for private placements which have been argued to be financing of last resort.² The difficulty in sorting out the motivation for private placements is that most benefits (e.g., decrease of distress cost and solving the underinvestment problem) are difficult to measure while only some costs are measurable (e.g., dilution from issuance discounts) making it difficult to weigh the benefits against the costs. To overcome this measurement problem, I use the managers' decision facing a shareholder approval governing private placements as a novel identification to show possible disagreement between principle-agent more directly.

NASDAQ and other exchanges require shareholder approval for discounted, privately is-

¹Aghion and Bolton (1992) and Dewatripont and Tirole (1994) provide arguments that managers have both private and monetary incentives to continue funding negative NPV projects. In distressed situations, Grossman and Hart (1982) and Gilson (1989) argue that the risks of bankruptcy and employment loss can lead to severe personal losses including the loss of private benefits, reputation, and specialized human capital.

²Hertzel and Smith (1993) argue that private placements could be the solution to the underinvestment problem. Brophy, Ouimet, and Sialm (2009), and Chaplinsky and Haushalter (2010) describe the distressed nature of firms that issue discounted equity and conclude private placements as a last resort financing. On the other hand, Barclay, Holderness, and Sheehan (2007) and Wu (2004) argue the managerial entrenchment aspects of private placements.

sued equity that make up more than 20% of existing equity shares. Studying the discounted issuance observations around the threshold, I find a clustering just before the threshold, and a clear decrease in the number of observations after the 20% threshold. I also test the distribution discontinuity finding that the clustering at the 20% threshold is statistically unlikely to happen by simple chance. This distribution discontinuity at the 20% threshold is evidence of managers writing private placement contracts to avoid shareholder approval and suggests potential principal-agency disagreement. To the best of my knowledge, this is the first paper to document and use the distribution discontinuity at the 20% threshold.³

Assuming managers have highly accurate information about the likelihood of a voting outcome,⁴ managers would avoid shareholder approval mainly for two possible reasons. First, managers may avoid shareholder approval when discounted issuances are misaligned with shareholders' best interest (the "Misalignment Hypothesis"). Self-interested managers would issue equity by avoiding shareholder approval even when the issuance does not maximize shareholder value. Since managers know shareholders would not approve such issuances, managers would avoid approval by issuing less than 20%. Second, managers would possibly avoid approval if the approval process itself is too costly (in a broad sense) for shareholders (the "Costly Approval Hypothesis"). Although managers believe shareholders would approve the issuance, managers would avoid approval in order to maximize shareholder value. Managers would avoid shareholder approval if timeliness of financing is required due to extreme distress or important investment opportunities. Also, shareholder approval might be costly if shareholders are not sophisticated enough to understand the benefits of the issuance.

To test the Misalignment and Costly Approval Hypotheses, I use the two groups that nat-

³Arena and Ferris (2007) investigate the impact of shareholder approval in board appointments related to private placement. Their paper identifies shareholder approval of board appointments by examining press releases, 8-K filings, and proxy statements rather than using the 20% rule and distribution discontinuity ending up with a much smaller sample.

⁴Listokin (2008) compare the distribution of manager proposed voting results and shareholder proposed voting results finding that managers have highly accurate information of the vote outcome even before the actual vote.

urally form around the 20% threshold as treatment and control group. The misalignment hypothesis would predict that the clustering observation close to, but not more than the 20% threshold identifies issuances that are less likely to be in the best interest of shareholders. The observations over the 20% threshold are the ones that are subject to shareholder approval process and therefore more likely to be aligned with shareholders' interests. On the other hand, the costly approval hypothesis would predict that both groups would both be in the best interest of shareholders and the decision to avoid approval is simply due to various costs of achieving shareholder approval itself.

The strongest test of the hypotheses is the market response to the announcement of the issuances. If avoiding approval is aligned with shareholders' interests, the market would not respond differently to whether shareholder approval is required or not. If avoiding approval is misaligned with shareholders' interests the market would respond negatively to the issuance. Using announcement day abnormal returns, I find the approval group (i.e., discounted issuance of fraction from 20% to 22.5%) has non-negative abnormal returns of 2.50 ($t\text{-stat} = 1.68$), which is consistent with equity issuance optimizing shareholder value despite issuance discount. However, the group that avoids shareholder approval (i.e., discounted issuance of fraction from 17.5% to 20%) has negative announcement day returns of -1.82 ($t\text{-stat} = -2.66$). The mean difference in the returns is statistically significant for various sample ranges centered around the 20% thresholds and also discount-adjusted returns. These return patterns suggest that the market values the shareholder approval avoiding issuances negatively and thus consistent with the Misalignment Hypothesis.

To further test the Misalignment and Costly Approval Hypotheses, I compare firm and issuance characteristics of the shareholder approval group and the avoidance group. Using a logit regression model on the decision to issue less than 20% (i.e., avoid shareholder approval,) I do not find support for the costly approval hypotheses. Firms that avoid approval are less distressed and issue at higher discounts than firms that gain shareholder approval. Also, firms

that avoid approval have more institutional investors making the investors more sophisticated than investors of firms that gain approval to understand the costs and benefit of the issuance.

Further focusing on the shareholder avoidance group sample, I find that the market responses negatively only to the issuances that firms do not seem to have a good reason for issuing at a discount. Firms that are less distressed, issue at higher discounts, and do not state the use of proceeds have statistically significant negative returns. These results imply that the negative market response to avoid shareholder approval is driven by those firm observations that do not seem to need costly discounted issuance. Thus, supports the Misalignment Hypothesis.

This paper also contributes to the private placement literature by introducing the the shareholder approval rule. Wruck (1989), Hertz and Smith (1993), and others document the positive announcement returns of private placements and propose the monitoring hypothesis and certification of equity undervaluation hypothesis to justify the positive returns. On the other hand, Barclay, Holderness, and Sheehan (2007) argue that other characteristics except the short-run returns are consistent with managerial entrenchment. I find that the positive announcement day returns for firms that go through shareholder approval are consistent with the certification hypothesis. However, most of the other discounted issuance less than 20% are on average consistent with managerial entrenchment hypothesis. The mean positive announcement day returns of private placement are the result of averaging returns from three different regions of the samples (i.e., discounted issuance below 20%, discounted issuance above 20%, and premium issuances.) I show that without acknowledging the break in the 20% threshold regressions could be misspecified.

Finally, this paper contributes to the empirical literature of agency problems in distress and equity issuance. Jung, Kim, and Stulz (1996) show that equity issuances by firms with poor growth prospects reflect agency problems and that stock prices react negatively to new equity issuances. Using the example of L.A. Gear, DeAngelo, DeAngelo, and Wruck (2002) illustrate how asset liquidity can give managers substantial operating discretion during financial distress

by liquidating assets to fund losses. More recently, Gormley and Matsa (2011) finds that firms respond to liability risk by acquiring unrelated business with relatively high operating cash flows. They find that these acquisitions are motivated by managers' personal exposure to firm's risk by showing negative announcement returns. My paper is different from these papers in that I focus on private placements using a much larger sample distribution. I also show more explicitly how managers alter a specific term in contracts to avoid shareholder approval and identify a sample with a shareholder interest aligned control group to test agency conflict in possible distress situations.

The remainder of the paper is organized as follows: Section **II** introduces the shareholder approval regulation and introduces the distribution discontinuity. Section **III** discusses the empirical framework and testable hypotheses. Section **IV** describes the empirical results and Section **V** discusses other potential hypotheses. Finally, section **VI** concludes.

II Shareholder Approval Rule and Data Distribution

A. 20% Shareholder Approval Rule

A private placement is a private issuance by a publicly traded equity invested by a limited group of accredited investors. Private placements include both registered direct (RD) issuances and private investment in public equity (PIPE). What separates private placements from traditional public offering is the speed that funds can be raised and the pricing of the equity issuance. The typical private placement deals take two to four weeks compared to the lengthy process of a public offering. While public offerings are offered close to the market price, private placements are typically traded at a discount averaging from 15% to 30% which is dilutive to the existing shareholders. Because of the dilutive nature of private placements, NASDAQ, NYSE and NYSE MKT LLC (formerly AMEX) have corporate governance listing regulations of private placements.

NASDAQ listing rule 5635 (previously 4350) states the regulations regarding shareholder approval of listed firms which include regulations of acquisition of stock of director, officer or substantial shareholder change of control and equity compensation etc. In particular, Rule 5635(d) requires issuers to obtain prior approval of its shareholders when the issuance or potential issuance is at a price equal to or less than the greater of book or market value equals 20% or more of common shares or 20% or more of the voting power outstanding before the issuance.⁵ The shareholder approval regulation does not apply to public offerings.⁶

An exception to shareholder approval rule is made when a delay in equity financing would seriously jeopardize the financial viability of the firm (the “financial viability exception”). This financial viability rule needs to be approved by the audit committee or a comparable body of the board of directors comprised solely of independent, disinterested directors. A company that receives the exception must mail shareholders not later than ten days before the issuance of the omission to seek the shareholder approval.

B. Data and Private Placement Distribution Discontinuity

I use four main data sources for the analysis of this paper. I use COMPUSTAT (CRSP/COMPUSTAT Merged) quarterly accounting data. For stock market data, I use CRSP monthly database for market size and financial ratios and CRSP daily stock returns for event studies and to identify timely changes in shares outstanding.

For private issuance data, I use Sagient Research’s PlacementTracker database which is the

⁵According to SEC News Digest 89-231 and 90-142 regulation the 20% rule was lowered from 25% to 20% in 1990 which is before the start of my sample.

⁶There are two other cases where shareholder approval is required: private placement that result in change-in-control and private placements to managers. NASDAQ clarifies that the change-in-control means issuance to a single investor more than 20%. If equity is placed to a single buyer for more than 20% a shareholder approval would be triggered for both premium and discounted issuances. For discounted issuances, the 20% shareholder approval rule would subsume the change-in-control regulation. Finally, sales of private placements to a director, officer or substantial security holder of the company will be considered as a form of equity compensation. Therefore, private placements to managers would require shareholder approval even when fraction of equity issuances is less than 20%. I drop these cases when forming the sample.

primary source for private placements.⁷ The database includes shares outstanding, type of equity placed and warrants attached, closing day of the contract and use of proceeds. I match all types of private placement observations with CRSP/COMPUSTAT data base from January 1995 to December 2010. Then, I only use common equity issuance (including the ones with warrants) that would not have potential problems in determining the fraction of issuance and discounts to apply the 20% shareholder approval rule. See Appendix A for further details on data selection and calculating the fraction of equity placed.

In order to be included in the sample, firms need to be listed on NYSE, NASDAQ and NYSE MKT. I also require firm to have enough daily returns to estimate the 3-day cumulative abnormal returns (CAR) to conduct event studies on the announcement day of issuance. Each observations should also have a book-to-market ratio measure, size, and accounting variables to form the distress measure of Campbell, Hilscher, and Szilagyi (2008) which will be the distress measure for this paper.⁸ Definitions and detailed derivations of each variable can be found in Appendix B.

Additionally, I use Thomson Reuters data to match holding information for the private placement issuers. Institutional holdings (13f) and manager shares (12s) information are aggregated for each firm each quarter. Insider shares include both direct and indirect shares of CEOs, CFOs and COOs. I also use debt covenants violation data from Amir Sufi's website which is also at a quarterly frequency. I assume there are zero institutional holdings, managerial shares, or no covenant violation if data is not observed for firms in the sample.

Table I presents summary statistics for discounted private placements of fraction placed less than 40%. This will be the main sample of the paper. The data spans from January 1995 to

⁷see Brophy, Ouimet, and Sialm (2009), Chaplinsky and Haushalter (2010) for more details on data and specific contractual terms.

⁸I use the distress measure from Campbell, Hilscher, and Szilagyi (2008) because it is known to be the state-of-art measure that is estimated on the most recent data. The model combines both accounting and market variables, and uses quarterly data that would be more timely than other measures that use annual frequencies. The predictability is documented to outperform other distress measures. I get very similar results when using a more tradition measure of Ohlson (1980) *O*-score.

June 2010 with 2,452 observations. Mean discount is 15% and mean fraction of equity placed is 13%. Debt related use of proceeds are about 9% and 36% of the observations state a specific use of proceeds including debt.

I also present measures related to distress. The distress measure of Campbell, Hilscher, and Szilagyi (2008) averages -6.70 . This average number is equal to an average annual default rate of 1.47% and a monthly rate of 0.12%. According to Table VI of Campbell, Hilscher, and Szilagyi (2008), this average default rate corresponds to the top distress quartile of all firms traded on the market.⁹ This shows that firms that issue privately are relatively distressed in general. *CASHMTA* is cash and short-term investments divided by market equity and total liabilities. The average *CASHMTA* is 9%. *BURN* is the geometrically decreasing average of net income (i.e., *NIMTAAVG* which is defined in Appendix B) divided by *CASHMTA* when *NIMTAAVG* is negative, and zero otherwise. The interpretation is that higher the *BURN* the more time left before cash will run out because of net losses. About 6% of the firms have covenant violations at the time of private placements.

The ownership structure is summarized by institutional and managerial ownership. Institutional ownership on average comprises 12.06% of the ownership structure while only 2.81% of the shares are owned by management. The market-to-book ratio (MB) is on average 3.63 and the size of market equity is 410 million dollars which means firms on average are small growth firms.

I now look at the distribution of private placements by the fraction of equity placed and the discount amount. Figure 1 presents the distribution of common equity private issuances. The x -axis represents the fraction of equity placed relative to existing shares and the y -axis represents the premium/discount. I drop observations placed above the 40% fraction. We can observe the uneven number of observation in discounted issuances that place more than the 20% threshold. Moreover, issuances are clustered just before the 20% threshold while the number

⁹Park (2012) also shows that about half of the common equity private placements are distributed in the top two distress decile portfolios.

of observations drops dramatically after the threshold.

To further observe the discontinuity, I look at the cumulative distribution function (CDF) and the histogram for discounted equity issuance in Figure 2 for fraction of equity placed from 10% to 30%. The CDF shows a steady increase before the 20% threshold, and displays a wedge around the 20% threshold. After the 20% threshold, the rate of increase in the CDF flattens out suggesting that there is an even number of observations after the threshold. The histogram graphically also shows a distribution discontinuity at the 20% threshold. Especially, the bar just below the 20% threshold is especially high with about 6% of the observations in that bin. I formally test the distribution discontinuity in the empirical result section.

This distribution discontinuity identifies managers who avoid seeking shareholder approval when issuing discounted equity. This suggests that issuing discounted equity might not be in the best interest of existing shareholders. Further discussion of the empirical approach and discussion of testable hypotheses using this distribution discontinuity will follow in the next section.

III Empirical Framework and Hypotheses

A. Empirical Framework

Testing misalignment of interests for firms that issue discounted equity is not an easy task. Managers would defend an issuance by different arguments including reasons of underinvestment and distress. However, the distress situation is exactly when agency problems exacerbate. The difficulty in separating misalignment of interests from alternative explanations is that it is difficult to identify which actions are aligned with shareholders' best interest and which are not. For private placements, some costs such as dilution is measurable while most benefits (e.g., decrease of distress costs) are difficult to measure. To bypass this measurement problem,

I use the managers' decision facing the 20% shareholder approval rule to identify observations that are more likely to be aligned with and misaligned with shareholders' interest.

Since managers would have the most accurate information about the firm, managers would know which actions are in the best interest of shareholders. Hence, it is likely that managers know whether shareholders would approve of a private placement when required. Supporting this argument, Listokin (2008) shows that most manager-sponsored votes pass easily and when the vote is close to a small margin, votes pass overwhelmingly more than the ones that lose by a small margin.¹⁰ This result implies that managers acquire highly accurate information about the outcome even before the vote takes place and managers would go through a shareholder approval only when the the proposal is most likely to be approved.

If managers act in shareholders' best interest and shareholder approval is not costly (in a broad sense,) managers would simply choose the optimal amount to maximize shareholder value without concerning about the 20% threshold because approval would be easily earned. We would observe a smooth distribution around the 20% threshold. As described in the previous section, however, managers avoid approval by altering the contract and creating a distribution discontinuity around the threshold.

Firms that are clustered just below the 20% are located there because of the shareholder approval regulation. The amount the managers would want to issue could have been more than 20% if the 20% rule did not exist. Managers might have reduced the amount because managers believe shareholders would not approve the issuance or shareholder approval itself is too costly. Alternatively, the placement amount that would optimize shareholder value could have been less than 20%. Managers might have increased the amount to the maximum amount that does not require shareholder approval and dilute shareholder value.

In any case, the 20% shareholder approval rule and the managers issuing above and clustering below the threshold provide a natural treatment group and control group to test hypotheses.

¹⁰I use RiskMetrics database from 1997 to 2004 to verify these results. I find that out of all types 15,916 manager proposed votes less than 2% (285) of the votes did not pass.

Assuming that the firms that avoid approval and gain approval by a close margin are similar in other characteristics, firms that avoid approval would be our treatment group and firms that gain approval would become the control group. Our control group is important in the sense that managers in the group are confident that the private placement will be approved. Therefore, these private placements can be assumed to be in shareholders' best interest. Firms that avoid approval (i.e., treatment group) will be compared to the control group to test whether the private placement and actions of avoiding shareholder approval is misaligned with shareholders' interest, or still aligned with shareholders' best interest.¹¹

I test hypotheses using the distribution discontinuity framework. I first divide hypotheses into two main categories: the Misalignment Hypotheses (MH) and the costly approval hypotheses (CAH). MH explains argues discounted issuance and shareholder approval avoiding behavior is misaligned with the best interest of shareholders. Alternatively, CAH are potential explanations why manager would avoid shareholder approval because shareholder approval is costly. I focus on two costs: timeliness of financing and ignorance of the average shareholder to understand the benefit of the issuance.

B. Misalignment Hypothesis

First, I discuss the misalignment hypothesis.

Misalignment Hypothesis (MH)

: Managers avoid approval because managers' interests and shareholders' interests are misal-

¹¹To be clear, the empirical approach in this paper is different from the regression discontinuity setting (see Keys, Mukherjee, Seru, and Vig (2010) and Cuñat, Gine, and Guadalupe (2012) for recent examples of the regression discontinuity.) The regression discontinuity approach uses the fact that the distribution around a threshold is smooth. The assignment of observations very close above or below the threshold is considered close to random selection which replicates a random assignment of an experiment. Once an observation passes a threshold, the treatments are different on either side of the threshold creating a natural experiment setting and inference of causal relationship of the treatment. On the contrary, my approach uses the very fact that observations alter the selection of group assignments by changing the contractual terms. This creates a group that avoids a specific treatment (i.e., shareholder approval) and a group that does not avoid approval.

ingned.

The Misalignment Hypothesis argues that the managers avoid approval due to principal-agent conflict. For example, Jung, Kim, and Stulz (1996) show that equity issuances by firms with poor growth prospects reflect agency problems and that stock prices react negatively to new equity issuances. Also, managers are known to attempt to fund negative NPV projects using additional funding rather than terminate the project as shown in DeAngelo, DeAngelo, and Wruck (2002). Through the example of L.A. Gear DeAngelo, DeAngelo, and Wruck (2002) show that although liquid assets can help managers to help turnaround the company, the more appealing story is that it is difficult to stop a manager to subsidize losing operation.

Even in a situation where the issuance might decrease distress costs, agency problems exacerbate and misalignment of interests could still be the motivation for issuing equity. Grossman and Hart (1982) and Gilson (1989) argue that the risks of bankruptcy and employment loss can lead to severe personal losses including the loss of private benefits, reputation, and specialized human capital. Because of these personal losses Jensen and Meckling (1976) suggest managers would take actions to reduce the likelihood of bankruptcy even when these actions do not maximize shareholder value. While the reduction of distress costs would benefit both manager and shareholders, the dilution of equity shares would mainly affect shareholders not managers. Self-interested managers would therefore want to issue equity even if the issuance would not maximize shareholders value.

The strongest test for MH would be the stock market reactions to the announcement of the private placements. Under MH, firms that gain approval would have higher announcement returns than firms that avoid approval. MH would also predict the magnitude of the difference would be larger for firms closer around the 20% threshold. Moreover, firms that avoid approval would have negative stock market responses while firms that gain approval would have non-negative returns under MH.

Additional to the stock market reactions, I use several proxies for shareholder-manager

alignment and justification for avoiding shareholder approval to test the Misalignment Hypothesis. I proxy managers' alignment of interest to shareholders' by the proportion of shares the managers hold. If manager hold more shares, cost of issuing discounted equity (e.g., dilution) would impact managers as well as shareholders. MH would predict firms with less managerial shares to avoid shareholder approval more often.

Also, MH would predict managers not being able to justify the high discounts in the issuance. Since the higher discounts are costly to shareholders, the managers should be more distressed or hold less cash to justify higher discounts. Under the MH, the manager would avoid approval when the firm is less distressed and managers would issue at a high discount after adjusting for distress and other characteristics, and do not provide a specific use of proceeds compared to firms that gain approval.

C. Costly Approval Hypotheses

Although avoiding shareholder approval suggests possible disagreement between managers and shareholders, avoiding behavior does not always suggest agency conflict. There are various costs that are associated with the shareholder approval. I focus on the following two costly approval hypotheses (CAH) that could potential explain why manager would avoid shareholder approval and still be aligned with shareholders' interest

Costly Approval Hypothesis 1 (CAH1)

: Managers avoid approval because timely financing is required.

The Costly Approval Hypothesis 1 (CAH1) is related to the timeliness of the issuance. Since many private placements issuing firms are highly distressed and are out of alternative funding opportunity as argued by Chaplinsky and Haushalter (2010), managers might avoid approval because of the timeliness of financing. Companies could be in urgent need for cash to pay interests and avoid bankruptcy. Companies could also need financing to invest in an ongoing

project and solve the underinvestment problem as argued by Hertz and Smith (1993). Waiting for approval can be costly for shareholders because it might jeopardize the financial viability of a company. Under this hypothesis, managers expect the shareholders to approve the issuance when required, but the approval process could take too much time to go through and is all together avoided.¹²

Again, the strongest statistical test to test CAH1 would be the stock market reactions to the announcement of the private placement. Under CAH1, avoiding approval is justified by the need for timely financing. The market would respond positively or at least non-negatively to the announcement. Also comparing to firms that gain approval, the returns should be at similar levels as the firms that gain approval because both groups are maximizing firm value.

I test CAH1 by examining whether firms that avoid approval are more distressed or in need of immediate financing. Distressed firms are more likely to avoid approval under CAH1. I use a proxy for distress using the most recent distress measure from Campbell, Hilscher, and Szilagyi (2008). Additionally, I use debt covenants violation,¹³ cash holdings, burn rate and the use of proceeds related to debt to proxy for distress and need for timely financing. Under CAH1, firms that avoid approval should have debt covenant violation more often as covenant violation would restrict additional debt financing opportunities. Also, companies would hold less cash holdings, have less time deplete existing cash, and state the use of proceeds as debt related or specific use more often than firms that gain approval.

While most of my analysis focuses on CAH1, I also look at shareholders' sophistication as a possible cost of gaining shareholder approval.

Costly Approval Hypothesis 2 (CAH2)

: Managers avoid approval because shareholders are unsophisticated.

¹²The financial viability exception (NASDAQ rule 5635(f)) mentioned in section A. weakens this argument because managers could use the exception to go around the shareholder approval and still issue more than 20% if it is clear that the delay and financing would jeopardize the financial viability of the company.

¹³Roberts and Sufi (2009) shows that after covenants are triggered the control rights go to creditors and additional debt financing becomes difficult.

The Costly Approval Hypothesis 2 (CAH2) suggests that shareholders are not sophisticated enough to understand what is in their best interest. Managers not only act in the best interest of shareholders but they know better than shareholders and do not want to risk the chance that shareholders would vote against their own best interest. Therefore, managers would avoid shareholder approval to maximize shareholder interest because shareholders might not be sophisticated enough.

I use the portion of institutional shareholders to proxy for shareholder sophistication. Institutional Shareholder Service Inc. (ISS)¹⁴ explicitly states private placements should be voted case by case taking dilution, financial issues (e.g., company's financial conditions, need for capital, use of proceed, etc.), management effort to seek alternative financing, control issues, conflict of interests, and stock market reaction into consideration. ISS also advises to vote for a private placement if it is expected that the company will file for bankruptcy if not approved.

According to these guidelines and assuming institutional investors are more likely to understand the complicated terms of a private placement and know if a private placement is in the equity holders' best interest, it is safe to use the portion of institutional investors as a proxy for shareholder sophistication.¹⁵ Assuming the private placements are indeed aligned with the best interest of shareholders, CAH2 would predict firms that avoid approval would have less institutional investors than firms that gain approval. If firms that avoid approval have more institutional investors CAH2 would be rejected. If CAH2 is rejected the result would support MH because it would mean that managers purposely avoid approval when shareholders are too sophisticated.

Other possible alternative hypotheses are discussed in the section **V**.

¹⁴see 2012 U.S. Proxy Voting Summary Guidelines (<http://www.issgovernance.com/files>)

¹⁵Replacing the portion of institutional investors with an indicator function of firms with institutional investors more than 50% does not result in any statistical significance for any my test.

IV Empirical Results

A. Test of Distribution Discontinuity

In this section, I study the distribution around the 20% approval rule when issuing discounted equity by formally testing the distribution discontinuity. I measure the extent of the distribution discontinuity using techniques that are used in the regression discontinuity literature (e.g., Keys, Mukherjee, Seru, and Vig (2010)). I count the number of discounted common equity private placements and estimate the equation using a flexible seventh-order polynomials on each side of the 20% threshold.

$$Y_i = \alpha + \beta I_{fraction \geq 20\%} + \theta I_{fraction < 20\%} f(Fraction(i)) + \delta I_{fraction \geq 20\%} f(Fraction(i)) + \epsilon_i$$

where Y_i is the number of observations for each bin and the $f(Fraction(i))$ is a seventh-order polynomials on each side of the distribution discontinuity. I vary the range of the estimation centered at 20% (i.e., 0% to 40%, 10% to 30%, 15% to 25%, and 17.5% to 22.5%) as well as the bin width to count the number of observations (i.e., 0.1% and 0.25%). The data are re-centered so that $Fraction(20\%)$ corresponds to 0, and thus the cutoff of the polynomials are evaluated at 0 just above and below the threshold. This allows β to be interpreted as the discontinuity at 20%.

Figure 3 plots the results for the case of 0.1% width bins for different ranges. For all different ranges a clear discontinuity can be observed by the estimates of each side of the 20% threshold. For a closer range (i.e., 17.5% to 22.5% and 15% to 25%) to the threshold, the estimates reach the number of observation in the 19.9% bin. For a wider range (i.e., 10% to 30% and 0% to 40%), on the other hand, the estimates underestimates the number of observation for bins that approaches the 20% threshold from the left. This is due to the sudden increase of observations

that cannot be predicted even with a smooth seventh-order polynomials binding at different point in a wider range.

Table II shows the results of the test of distribution discontinuity. For all ranges and bin width the sign for β is negative and statistically significant at the 1% level. As observed from Figure 3, the magnitude of β becomes larger as the range becomes smaller due to the fact that the polynomials predict the number of observations in bins just below the 20% threshold more accurately. This is also the case for the 0.25% width bin estimates. The estimates are twice as big as the case of the 0.1% bin due to the increase of the bin width. The magnitude also increases as the range becomes smaller.

Finally, I conduct a permutation test of the distribution discontinuity by treating every value of a discontinuity a potential discontinuity from the range of 0% to 40% excluding the bottom and top 1%. After estimating the β s for each 0.1% fraction, I use the distribution to test whether the estimate of β at 20% can be the mean of the 380 possible discontinuities. The permutation test gives a t -statistic of -127.93 confirming the distribution discontinuity at the 20% threshold in extremely unlikely to happen by simple chance. Moreover, the estimate of β is the largest absolute value among all 380 discontinuity points with the largest t -statistic.

The distribution discontinuity tells us that managers are aware of the shareholder approval process and creates a break in the distribution of private placements. Also, firms that issue just below the threshold can be interpreted as firms with managers that write contracts to avoid shareholder approval. The rest of the paper focuses on why these firms avoid shareholder approval.

B. Returns by Shareholder Approval

This section presents the main results of the paper. The strongest test of Misalignment Hypothesis (MH) and Costly Approval Hypothesis (CAH) would be the market response to the announcement of these issuances. If avoiding shareholder approval shows misalignment of

interests, firms that avoid shareholder approval should have lower returns than the ones that gain shareholder approval. If avoiding shareholder approval is in the best interest of shareholder value and is due to higher costs of gaining approval, firms that avoid approval should have similar market responses to the ones that gain shareholder approval.

To calculate abnormal returns on the announcement day I first estimate coefficients for the Carhart (1997) 4-factor model including the intercept from -245 trading days up to -45 trading days of the announcement of the private placements. Daily returns on Market, HML, SMB and Momentum are from Ken French's website. Daily abnormal return is calculated as following

$$AR_{i,t} = R_{i,t} - \alpha_i - \beta_{i,M}R_{M,t} - \beta_{i,H}R_{HML,t} - \beta_{i,S}R_{SMB,t} - \beta_{i,MOM}R_{MOM,t}$$

and the 3-day Cumulative Abnormal Return (CAR) is the sum of the three abnormal returns ± 1 -day of announcement day. A detailed description of how I find the announcement days can be found in the Appendix C. I adjust returns for delisting biases documented in Shumway (1997) and Shumway and Warther (1999) if a company delists during the accumulation window. I require at least 15 trading day returns during the estimation period and at least one trade during the announcement day window to be included in the sample.

Table III presents returns of discounted common equity issuance by bins of different issuance fractions. Panel A presents the mean difference of announcement day returns between issuances above and below the 20% threshold. Panel B looks at observations in overlapping bins created centered around the 20% shareholder approval threshold while Panel C looks at non-overlapping bins.

Panel A shows the main result of the paper. Samples are created from 0% to 40%, 2.5% to 37.5%, and so on by reducing the sample range 2.5% above and below the 20% threshold. All differences of issuing more than 20% and less than 20% are positive and statistically significant. The magnitude generally increases from 2.55 (t -stat = 2.95) for the 0% to 40% fraction bin to 4.43 (t -stat = 2.63) for the 17.5% to 22.5% fraction bin as the sample gets closer and closer to the

threshold. This result shows that the market does not value shareholder avoiding placements the same as shareholder approved placements which are most likely aligned with shareholders' interest. Thus, shareholder avoiding placements are viewed as less aligned with shareholders' best interest.

To understand these results better we take a closer look in Panel B. The announcement day returns exhibit a statistically significant negative abnormal return for all bins below the 20% threshold. The 17.5% to 20% fraction bin exhibits returns of -1.82 ($t\text{-stat} = -2.66$) and the 15% to 20% fraction bin exhibits returns of -1.43 ($t\text{-stat} = -2.47$). The returns for bins that include more observations in a wider range have mean returns that is smaller in magnitude but with larger t -statistics showing that more observations help the power of test but the larger negative returns are concentrated in observations closest to the threshold. These results suggest that the action of issuing discounted equity without shareholder approval seems to affect shareholder value negatively consistent with MH.

On the other hand, observations for bins of fractions larger than 20% have positive announcement day abnormal returns. The abnormal return for the 20% to 30% fraction bin is statistically significant at the 10% level with positive 2.61 ($t\text{-stat} = 1.68$) percent returns. When including more observations from 20% to 25%, the mean of the returns decreases in magnitude but statistical significance at the 5% level is achieved by including more observations. The positive returns for observations that issue more than 20% shows that once shareholder approval is required, the market welcomes the private placement and expects the action to increase market value in spite of dilution. These actions are most likely to be in the best interest of shareholders. Therefore, these observations are used as the control group for the observations that avoid approval.

I look at bins separately without overlapping bins in Panel C. We observe that announcement day return exhibit statistically significant negative abnormal returns only for 10% to 15% fraction bin, 17.5% to 20% fraction bin, and 20% to 22.5% bin. The bins above the 22.5% do

not have statistically significant returns without overlapping the bins toward the 20% threshold because there are fewer observations per bin.

These insignificant returns show the difficulty in using the threshold event as identification. Theoretically, only observations very close to the thresholds should be used as the control and treatment group. However, limiting the sample size to observations near to the threshold reduces the power of test significantly making it difficult to get statistical significance. Throughout the paper I use samples 17.5% to 22.5%, 15% to 25%, and 10% to 30%. Analysis using 17.5% to 22.5% would be most accurate but will have less statistical power. 10% to 30% sample would have more statistical power but the comparison between firms that issue 10% and a firm that issues 30% might not be comparable.

Also notice that firms that issue above the threshold issue larger fractions of equity at a discount yet achieve non-negative market response to the issuance. This suggests that when private discounted issuances are in the best interest of existing shareholders the benefit of issuance outweighs the cost of dilution. For firms that avoid approval, however, the cost of dilution outweighs any benefit from the placement. The effect of market value generated by the private placement can be seen more clearly by looking at discount-adjusted returns. I follow Hertz and Smith (1993) by adjusting returns to get discount-adjusted abnormal returns by

$$CAR_{i,t,adj} = [1/(1 - \alpha)]CAR_{i,t} + [\alpha/(1 - \alpha)]Discount_{i,t}$$

where α is the fraction of equity placed.

Results are presented in Table IV. The format is the same as Table III but all announcement day returns are adjusted by discount (CAR_{adj} .) The pattern in returns difference are all statistically significant at the 1% level in Panel A similar to the previous table. Looking at Panel B and C we can observe that discount-adjusted CARs for firms that issue more than 20% are all positive and statistically significant at the 1% for both overlapping and non-overlapping bins. These positive returns suggests that after adjusting for dilution, there is statistically

significant value increase that result as the benefit of the private placement when firms require shareholder approval. This is consistent with the view that private placements with approval are maximizing shareholder value.

On the other hand, firms that avoid approval have positive but statistically insignificant returns for observations close to but not more than 20%. These returns together with the previous table that showed negative announcement day returns for firms that issue less than 20% suggest that when shareholder approval is avoided some benefit might occur but the benefit is not significant enough and is outweighed by the cost of dilution consistent as suggested by MH.

The patterns of returns above and below the 20% approval threshold presented in Table IV and Table III suggest that approved private issuances are aligned with existing shareholders' best interest while the ones that avoid approval by issuing below the threshold are not. The difference in returns exemplify the difference of shareholder interest aligned issuance and misaligned issuance. These results are inconsistent with CAH and consistent with MH.

C. Logit Regression on the Decision to Avoid Approval

In this section, I further investigate the characteristics of the firm and issuance to test whether avoiding shareholder approval is evidence of costly shareholder approval, or shareholder-manager conflict. I use a logit regression to predict the decision to avoid shareholder approval ($I_{\text{Fraction} < 20\%}$). For the explanatory variables, I include variables that could test whether the decision to avoid shareholder approval is evidence of the Costly Approval Hypotheses (CAH) or Misalignment Hypothesis (MH).

I first include variables that could test whether timely finance was required that shareholder approval had to be avoided (CAH1.) I use the distress measure, *CHS*, from Campbell, Hilscher, and Szilagyi (2008) (higher *CHS* indicate higher levels of distress). To deal with possible nonlinearities of the distress measure, I also use indicator functions of $\text{Distress}_{\text{High}}$ and $\text{Distress}_{\text{Low}}$

which are one if the firms are in the highest and lowest distress quartile of the sample, respectively. I also include cash and short-term investment (*CASHMTA*) to proxy for cash buffers and *BURN* to proxy for time left for financing (lower *BURN* indicates less time left). An indicator function ($I_{Covenant\ Violation}$) of debt covenants being triggered is included as a proxy of the situation that other types of debt financing would be difficult and private issuance might be the last resort financing option. Additionally, Since firms in distress should generally use the proceeds for dealing with indebtedness or interest payments, I include an indicator function (I_{Debt}) that is one if the use of proceeds includes debt, and zero otherwise. Since timely financing for other reasons could also be important, I also include an indicator function ($I_{Specific}$) that is one if the use of proceeds states a specific use, and zero otherwise. Firms that avoid approval for timely financing could at least explain what the proceeds are for if time is the only reason why approval is avoided. Variables except for *CASHMTA* and *BURN* should have positive coefficients to be consistent with distress and finance timing being the reason for avoiding approval (CAH1.)

Next, I include institutional ownership to test whether shareholders are not sophisticated enough to understand what is in their best interest and shareholder approval needs to be avoided (CAH2). The proportion of institutional holdings from Thomson’s Reuter’s database to proxy for shareholder sophistication. CAH2 would predict negative coefficients for institutional investors.

Finally, to test the MH, I include variables of managerial ownership and discounts. I include managerial ownership to proxy for manager’s interest being aligned with shareholder interest. I also include discounts to test whether firms that avoid shareholder approval issue at higher discounts that cannot be justified. MH would predict positive coefficients for discounts and negative coefficient for managerial ownership. I include book-to-market and size of market equity to control for general firm characteristics.

Empirical results can be found in Table V. I initially run the logit regression on the sample closest to the 20% threshold of 17.5% to 22.5% in regression (1) and (2). I use a wider sample

range of 15% to 25% in regressions (3) and (4), and 10% to 30% for regressions (5) and (6). The odd number regressions use the distress measure, *CHS*, while the even number regressions use indicator functions of Distress_{High} and Distress_{Low} instead of using the distress measure directly.

In regressions (1) and (2), I first look at variables that test CAH1. The *CHS* has a statistically significant coefficient (-0.52 [$t\text{-stat} = -3.52$]). This coefficient suggests that firms that are relatively less distressed issue at a fraction less than 20% without shareholder approval. *CASHMTA*, *BURN*, $I_{Covenant\ Violation}$, I_{Debt} , and $I_{Specific}$ all have insignificant coefficients. These results are inconsistent with CAH1 that argues that firms avoid approval because gaining approval is costly due to timely financing.

I test for CAH2 by looking at ownership information. Looking at the coefficient for institutional ownership, I find a positive and statistically significant coefficient of 0.02 ($t\text{-stat} = 2.01$).¹⁶ This positive coefficient suggests that firms with more sophisticated investors avoid shareholder approval more often. This is not consistent with the predictions of CAH2. Managers do not avoid shareholder approval because shareholders are less sophisticated. It seems that managers avoid shareholder approval because shareholders are more sophisticated and understand that the private placement is not in shareholders' best interest.

To test for MH, I look at managerial ownership and issuance discounts. The coefficient for managerial ownership is negative but statistically insignificant of -0.01 ($t\text{-stat} = -0.81$). The sign of the coefficient suggests that firms that avoid approval have less ownership consistent with MH but insignificant. The statistical insignificance could be due to the fact that managerial ownership only comprises 2.76% of ownership for firms in the sample as shown in the summary statistics table. Finally, the coefficients for discount is 3.11 ($t\text{-stat} = 2.24$). This result suggests that the discounts for firms that avoid approval are higher and cannot be justified

¹⁶Under CAH2, firms with institutional investors more than 50% of existing shares would have an easier time in getting approval. However, replacing the portion of institutional investors with an indicator function of firms with portion of institutional investors more than 50% of shares does not result in any statistical significance inconsistent with CAH2.

after controlling for other characteristics such as distress. This result is consistent with the predictions of MH. Overall, regression (1) rejects predictions of CAH1 by lower distress, CAH2 by higher institutional ownership, and is consistent with MH by issuance higher discounts of firms that avoid approval. Other variables are statistically insignificant.

In regression (2), I replace the continuous distress measure with indicator functions of Distress_{High} and Distress_{Low} . I find that Distress_{High} has a statistically significant coefficient of -0.80 ($t\text{-stat} = -2.64$) while Distress_{Low} has a statistically insignificant coefficient. Other coefficients have the same sign and statistical significance as regression (1). This shows that the significance of CHS is not due to a simple result of possible non-linearities in the measure. The negative sign of the coefficient of CHS is driven by firms that are in high distress. Firms that avoid approval include more firms relatively less distressed than firms that gain approval which is the opposite of the prediction of CAH1.¹⁷ If firms that avoid approval are mostly due to distress, firms that avoid approval should have relatively more distressed firms than other firms that cannot wait for approval. However, this conjecture of CAH1 is rejected in regression (1) and (2) which show that firms that avoid approval are less distressed on average and include less highly distressed firms than those firms that gain approval.

Regression (3) and (4) expands the sample range to 15% to 20%. Firms that avoid approval are still less distressed on average and have more institutional ownership than firms that gain approval as the previous regressions. On the other hand, I lose statistical significance for discount. I interpret the result under the MH as firms that avoid approval by issuing right below the threshold have higher potential of issuing at a discount than firms that issue further below

¹⁷Firms that issue privately can be considered somewhat distressed in general when viewed in the cross-section of all traded firms as mentioned in the Data section. Private placement firms that avoid approval are less distressed in a relative sense compared to private placement firms that gain approval. The quartile cutoff point for private placements used for Distress_{High} is higher than the average of the top 10 to 5 percentile distressed firms of the cross-section of all firms according to Table VI of Campbell, Hilscher, and Szilagyi (2008). Using a higher cutoff point for Distress_{High} of the top 10 percentile and 5 percentile also results in statistical significant coefficients in regressions (2), (4), and (6).

the threshold. Therefore, when increasing the sample size I lose the statistical significance. Also, notice that the coefficient for distress are smaller in regressions (3) and (4) than in regression (1) and (2). This shows that firms closer to the 20% threshold have higher potential of issuing when less distressed.

Additionally, I have negative statistically significant coefficients for I_{Debt} (-0.62 [$t\text{-stat} = -1.79$] and -0.57 [$t\text{-stat} = -1.68$] for regression (3) and (4), respectively.) This suggests that firms that avoid approval have less debt related use of proceeds than firms that gain approval opposite of the prediction of CAH2. I do not find, however, these results in regression (1) and (2) which are of observations closer to the 20% threshold. The statistical significance could be the result of stronger statistical power due to the increase of observations, or could be driven by some samples further away from the threshold. A larger sample would help us conclude the robustness of the results.

Regressions (5) and (6) which expand to a larger sample have similar results as regression (3) and (4) except for I_{Debt} . Firms that avoid approval are still less distressed and have more institutional ownership than firms that gain approval. Since the statistical significance for I_{Debt} is gone in regression (5) and (6), it seems the results in (3) and (4) is a sample specific result rather than a power of test issue.

In sum, Table V does not find support for the CAH. The lower distress level of firms that avoid approval rejects CAH1. Higher institutional holdings of the firms that avoid approval reject CAH2. The higher discounts for firms that avoid approval is consistent with MH. The results from the logit regression combined with the announcement day return difference found in the previous section supports MH. Managers avoid shareholder approval not because of the cost of approval is high but because the issuance is not in the best interest of shareholders.

D. Delisting Rates

In this section I look at post-issuance delisting rates to augment the results of less distressed firms avoiding approval shown in the previous table. Since the private placements and other events could affect the ex-post delisting, looking at the post-placement delisting is not ideal to measure distress at the time of private placements. However, we can use the control group of firms that gain approval. Let us assume that the effect of avoiding delisting by the private placement is similar for firms that avoid and gain approval. Then under CAH1, more observations that avoid approval due to distress should eventually delist more frequently than firms that gain approval.

Table VI presents the delisting rate. First looking at the sample of 17.5% to 22.5%, I find that in first 6 months firms that avoid approval delist less than 1% while firms that gain approval delist at a 5% rate. The difference is statistically significant at the 10% level suggesting that firms that gain approval are more distressed than firms that avoid approval. For one year after the issuance, 5% of the firms that avoid approval while 12% of firms that gain approval delist. Again, the difference is statistically significant at the 10% level. Finally, 2 years after the issuance 15% of firms that avoid approval delist while 22% of firms that gain approval delist. The difference is statistical insignificance for this period because of the power of the test is small. When expanding the sample to 15% to 25% and 10% to 30%, I find similar numbers with higher t -statistics and statistical significance difference for all periods due to more observations in the sample.

Overall, the logit regressions and the rate of delisting confirm that the argument that firms that avoid approval because of distress is not well supported. As discussed in the empirical approach section of the paper, my identification comes from the control group that are also somewhat distressed but still go through shareholder approval and are most likely aligned with shareholders' interest. Although private placement firms are in general distressed, firms that avoid approval need to be more distressed than the control group to justify avoiding

approval. However, I find the opposite result that less distressed firms avoid approval suggesting misalignment of interests to be a better description of the reason why firms avoid approval.

E. Announcement Day Returns of Firms that Issue without Approval

In this section, I connect the low announcement day returns of firms that issue without shareholder approval to characteristics of the firm and issuance. Previously, I show that firms that avoid approval have negative announcement day returns. I also show that firms that avoid approval do not have a good reason to avoid approval. In this section, I try to see if the low announcement day returns of firms that avoid approval are particularly stronger for firms with weaker excuses to avoid shareholder approval.

Table VII presents the results. The table presents the ordinary least square regression of ± 1 announcement day CAR on the variables used in the previous logit regression. I initially run the regression on the sample closest to the 20% threshold of 17.5% to 20% in regressions (1) and (2). I use a wider sample range of 15% to 20% in regressions (3) and (4), and 10% to 20% for regressions (5) and (6). The odd number regressions use the distress measure, CHS , while the even number regressions use indicator functions of $Distress_{High}$ and $Distress_{Low}$ instead of using the distress measure directly.

In regression (1), we observe that all variables are statistically insignificant but the coefficient for CHS and $I_{Specific}$. The coefficients for CHS is 1.31 (t -stat = 1.72) and statistically significant at the 10% level. The coefficient for $I_{Specific}$ is 2.88 (t -stat = 1.98) and statistically significant at the 5% level. We know that firms that avoid approval have on average negative announcement returns for the sample of firms that issue from 17.5% to 20%. These results suggest that firms that avoid approval for distress reasons or state a specific use of proceeds firms underperform less. These observations that do not underperform are consistent with CAH1. However, many other firms that are not distressed and do not state where the proceeds will be used have lower returns driving the negative announcement day returns of firms that avoid approval which is

inconsistent with CAH1 but consistent to MH.

Regression (2) has similar results for $I_{Specific}$ but marginally lose statistical significance for $Distress_{High}$ of 2.77 (t -stat = 1.47). This sample has limited number of observations making the power of the test weak. We look at a wider sample to see if the result of regression (1) for the distress measure is robust. In regressions (3) and (4), the announcement day returns have a statistically significant positive coefficients with the CHS and $Distress_{High}$ of 1.49 (t -stat = 1.86) and 3.35 (t -stat = 1.84), respectively. These results are consistent with regression (1) and suggests that the statistical results for $Distress_{High}$ in regression (2) might be due to the weak power of test. On the other hand, the indicator function for specific use of proceeds is marginally statistically insignificant suggesting that the effect of announcing the specific use of the proceeds on return is more important as companies that avoid approval just below the threshold.

In regressions (5) and (6), the announcement day returns again have a statistically significant positive correlation with the CHS and $Distress_{High}$. The statistical significance is at the 1% level for CHS with coefficients of 1.31 (t -stat = 2.75) in regression (5) and statistical significance is at the 5% level for the coefficient for $Distress_{High}$ is 2.70 (t -stat = 2.21) in regression (6). Compared to regressions (3) and (4), the magnitudes are smaller but the statistical significance increase due to including more observations resulting in stronger power of the test. The magnitude and t -statistics of the indicator function of specific use of proceeds is smaller than in regression (3) and (4) supporting the conjecture that stating the specific use of proceeds is more important for returns when avoiding the approval is more apparent.

Additionally, discounts have statistical significance coefficients of -9.53 (t -stat = -2.26) in regression (5) and -9.49 (t -stat = -2.25) in regression (6). Firms that avoid approval have lower returns when firms issue at a higher discount. This It is consistent to what we have seen in discount-adjusted returns in Table IV. Firms that avoid approval do not benefit enough from the private placement to justify the high discounts. Consistent with these results, we also

observed that firm that avoid approval issue at higher discounts than firms that gain approval in the previous logit regression.

Overall, the statistical significant coefficients of the table are consistent with previous conclusions. The negative abnormal returns of firms that avoid shareholder approval is stronger in firms that are less distressed, do not state specific use of proceeds, and issue at higher discounts. To see this more clearly, I split the companies that issue without approval by the statistical significant coefficients of Table VII to look at the signs and statistical significance of announcement day returns. I split the sample into lowest distress quartile and highest quartile. Also, I split the sample into companies that state specific use of proceeds and the ones that do not. Finally, I split the sample into companies that issue below than the median discount and more than the median discount of all discounted private issuances.

Table VIII presents the mean announcement day returns of the subgroups of the companies that issue without approval. The first row uses the range of 17.5% to 20%, the second row uses the larger sample of 15% to 20%, and the third row looks at the largest sample of 10% to 20%. In the first row, when the avoidance group is divided by distress, firms that are in the highest distress quartile bin have negative but statistically insignificant returns of -0.09 ($t\text{-stat} = -0.05$). However, firms that are in the lowest distress quartile bin have a statistically significant negative return of -2.34 ($t\text{-stat} = -2.36$). This shows that when shareholder approval is avoided, the market responds negatively to discounted issuance if firms do not seem distressed.

When looking at issuance that state specific use of proceeds and ones without, firms that state specific use of proceeds have negative but statistically insignificant returns for announcement day returns of -0.88 ($t\text{-stat} = -0.96$). Firms that do not state a project for the use of proceeds, however, have negative statistically significant returns (-3.00 [$t\text{-stat} = -2.94$]). The results are similar for discounts. firms that issue at a discount less than the median have negative but statistically insignificant returns for announcement day returns of -0.78 ($t\text{-stat} = -0.86$). Firms that have discounts more than the median, on the other hand, have negative

statistically significant returns (-2.78 [$t\text{-stat} = -2.81$]).

The results are similar for the larger samples of 15% to 20% and 10% to 20% in the second and third row but with stronger statistical power. Companies that are in lower distress, do not state a specific use of proceeds, and issue at higher discounts have negative and statistically significant returns. Returns are statistically insignificant for high distress firms, firms that do not state a specific use of proceeds, and issue at higher discounts. The only exception are companies in the 10% to 20% sample that state specific use of proceeds have negative returns of -1.13 ($t\text{-stat} = -2.01$). Since the magnitude of this return increase as we move to the larger sample in the third row the negative returns are driven by mostly observations further away from the 20% threshold rather than closer to the threshold which are the paper’s primary concern.

Overall, the regression of returns in Table VII and splitting the avoidance group into further subgroups in Table VIII show that when shareholder approval is avoided the negative market responses are driven mainly by issuances that do not seem to be in the best interest of shareholders (i.e., less distressed, do not state specific use of proceeds, higher discounts). The analysis of the low returns is consistent with the Misalignment Hypothesis of firms avoiding shareholder approval.

F. Implication: Full Sample Announcement Day Returns

In this section, I look at the implication of the shareholder approval rule on the announcement day returns of private placements. I add the common equity issuance observations that are issued at a premium to the discounted issuance sample that is used for the rest of the paper. I denote this sample as the “full sample.” The total sample size increases from 2,470 to 3,262.

Wruck (1989), Hertz and Smith (1993), and others document positive announcement returns of private placements. This is in contrast to the negative announcement day returns of public equity issuances (i.e., Secondary Equity Offerings) which generally have negative an-

nouncement day returns. Wruck (1989) proposes that the monitoring effect of the new shareholders explain the positive announcement day returns by looking at identities of new investors and new board positions. Hertz and Smith (1993), on the other hand, suggest a certification hypothesis arguing that firms that issue private placements have positive announcement day returns because information about the undervaluation is released through private placements. One prediction of the certification hypothesis is that firms that issue at a higher fraction have stronger announcement day returns.

However, Wu (2004) and Barclay, Holderness, and Sheehan (2007) suggest the managerial entrenchment aspect of private placements by looking at discounts given to managers and the post-issue events of private placements. Especially, Barclay, Holderness, and Sheehan (2007) compare different hypothesis and find most empirical results are consistent with managerial entrenchment except for the positive short-run returns. Although the goal of this paper is not to sort out these different hypotheses, I study the announcement day returns by different regions to show that the positive announcement day return documented in the literature is not necessarily inconsistent to managerial entrenchment. Since the distribution around the shareholder approval region of 20% region has not been recognized before, it would be interesting to investigate the announcement day returns by distribution of issuance premium (negative discount) and the fraction of equity placed using the full sample.

Figure 4 presents the full sample returns in Panel A and the distribution of returns by different regions of premium/discount and below/above the 20% fraction of equity placed in Panel B. In Panel A, I first show that the mean ± 1 announcement day abnormal CARs are positive for the full sample (0.79 [t -stat = 2.84]) consistent with past literature. This positive abnormal return is statistically significant at the 1% level.

By looking at the separate regions in Panel B, I find that the positive announcement day returns are found in shareholder approved discounted issuances and premium issuances. The discounted issuances with fraction of equity placed less than 20% have negative statistically

significant returns of -0.90 ($t\text{-stat} = -3.35$). Firms that issue at a discount but issue more than 20%, on the other hand, have positive announcement day returns of 1.64 ($t\text{-stat} = 1.95$) as shown earlier in Table III. Firms that issue at a premium and less than 20% have positive returns of 3.82 ($t\text{-stat} = 4.37$), and firms that issue more than 20% at a premium have positive returns of 11.05 ($t\text{-stat} = 4.85$). The positive announcement returns of firms that issue at a premium is not surprising as these issuance would add value to existing shareholders and most likely signal undervaluation of the equity consistent to the certification hypothesis.

This distribution of returns shows that the positive announcement day returns is the result of averaging issuance that are placed at a premium, discounted issuance less than the 20% threshold, and discounted issuance above the 20% threshold. It is difficult to argue, however, that the positive announcement day returns are representative of all private placements. About two thirds of the sample is issued at a discount and less than 20%. In terms of the number of observations and since people generally associate private placements with discounts, this region better represents private placements. These issuances have negative returns and are consistent with managerial entrenchment. Returns of issuance at a premium or issuances of more than 20% are more consistent with the predictions of the certification or monitoring hypothesis depending how one interprets the role of shareholder approval.

To formalize the argument, we turn to a regression analysis. Table IX presents the ordinary least square regressions of announcement day abnormal returns. Regression (1) to (3) uses the sample of discounted common equity issuances as the rest of the paper. The sample contains up to the 40% fraction of equity placed. Regression (4) to (8) uses the full sample including the ones placed at a premium. Explanatory variables include fraction of equity placed, premium (negative discount) of the issuance to the closing day price, and interaction of the fraction of equity placed and premium. This interaction term will control for the dilution occurring for existing shareholders. I also include an indicator function $I_{Approval}$ which is one if issuances are at a discount and placed more than 20%, and zero otherwise. To control for issuances at a

premium (negative discount), I also use an indicator function $I_{Premium}$ to include for regressions (7) to (8). $I_{Premium}$ will also be used to interact with premium and fraction of equity placed.

First, looking at the discounted issuance sample in regression (1), we observe that the fraction of equity placed is positively related to the announcement day returns (6.19 [t -stat = 1.59]). This positive coefficient is consistent with the certification hypothesis that larger fractions placed are related to higher announcement day returns. However, we know that firms that are placed more than 20% have higher returns than the ones that issue less than 20%. Including $I_{Approval}$ in the regression shows that the positive coefficient of fraction placed flips signs to -7.09 (t -stat = -1.41). Also, the coefficient of $I_{Approval}$ is statistically significant at 3.90 (t -stat = 3.45). This suggest that the positive relationship of the announcement day return with fraction of equity placed is mostly due to the shareholder approval region rather than the simple fraction of equity issued.

In regression (3), we include the interaction term which should control for dilution. Including the interaction term makes the coefficient for fraction placed statistically significant at -12.62 (t -stat = -2.15). The premium (negative discount) amount is also positively related to the announcement day returns showing that the issuance price is a signal of the true price after issuance. The coefficient of $I_{Approval}$ is statistically significant at 3.76 (t -stat = 3.29) confirming previous results.

The next 5 regressions from (4) to (8) use the full sample of both discounted and premium issuances. Regression (4) includes fraction placed and premium as explanatory variables. Both coefficients are statistically significant. Fraction placed has a coefficient of 13.48 (t -stat = 3.50) where premium has a positive coefficient of 13.08 (t -stat = 3.40). The positive sign on the fraction placed could again be interpreted as evidence supporting the certification hypothesis. Compared to regression (1), we can see that the coefficient for premium is statistically positive as we included premium issuance to the sample. Regression (5) includes the interaction term. The interaction term has positive coefficients while the premium loses its statistical significance

showing that the dilution is important in understanding the announcement day returns of firms rather than the premium itself.

Including $I_{Approval}$ to the regression in (6), we have statistical significance of 2.76 (t -stat = 2.25) while other coefficients have similar statistical significance as in regression (5). Especially, the positive coefficient for fraction placed (15.15 [t -stat = 2.90]) is still significant compared to the negative coefficient in regression (3) for discounted issuances. I conjecture that this positive relation is mainly coming from positive issuances and the shareholder approval region. There are proportionately more observations placed at a premium when issuing more than 20% of shares because the shareholder approval region not having many observations (See Figure 1).

Including an indicator function for premium issuances and the interaction of the premium amount, fraction placed, and $I_{Premium}$ in regression (7), I find that the interaction term is statistically significant of 2.01 (t -stat = 2.54) while all other coefficients become statistically insignificant showing that value addition by the premium issuance were driving the results of regression (6). Finally, I include all variables in regression (8). The only two variables that are statistically significant are $I_{Approval}$ and the interaction of premium, fraction placed, and $I_{Premium}$ of 2.88 (t -stat = 2.44) and 2.00 (t -stat = 2.52), respectively. These results show that announcement day returns are positively related to the value added by premium issuances and the discounted issuances of the shareholder approval region as shown in Figure 4.

This section looks at the implication of shareholder approval in the distribution of announcement day returns. The distribution of observations as well as the distribution of return is fragmented in a way that is consistent with shareholder approval having positive impact on returns. Also, the gain from premium issuance is important in explaining stock return responses to private placements. The majority of issuance observations that are distributed in the discounted equity issuance region that place less than 20% have negative statistically significant announcement day returns. Without separating the distribution of issuance at the shareholder approval region and premium issuances, the average positive announcement returns of private

placements could be misleading in representing characteristics of all private placements.

V Discussion of Alternative Hypotheses

In this section, I discuss other alternative hypotheses that might explain the shareholder approval avoiding behavior.

Monetary Costs Hypothesis

: Managers avoid approval because of monetary costs.

One direct cost of obtaining shareholder approval could be the monetary cost of gaining approval. Contacting shareholders and opening a special meeting could be costly. Monetary Costs Hypothesis posits that manager would possibly avoid shareholder approval due to these monetary costs.

This argument is not well supported when thinking about the pattern of announcement day returns of private placements. The monetary cost should occur only to firms that issue above the 20% threshold. Firms that avoid approval save the monetary costs of approval suggesting that firms that avoid approval should have higher returns than firms that gain approval when only considering the additional monetary cost. However, firms that issue more than the 20% threshold have positive announcement returns while firms that gain approval have lower negative returns in Table III. This return pattern shows that monetary cost alone cannot be the reason managers avoid shareholder approval.

Another argument could be that perhaps the returns are lower for firms that avoid approval due to not being able to issue at the optimal fraction in order to avoid the monetary costs related to shareholder approval. A quick approximation of the announcement day return effect can show that the monetary costs have to be extremely large to justify the ex-post return difference for avoiding approval. The average market equity size of a company in the sample is 450 million dollars. The negative announcement day return for firms that avoid approval is

more than 1.5% which would approximate to a devaluation of 6.7 million dollars on average. If one looks at the return difference of firms that gain approval, the return difference for firms that avoid approval is more than 4.5%. This return difference would amount to a devaluation of 20.25 million dollars. Monetary cost of gaining approval needs to be larger than these numbers (i.e., 6.7 million or 20.25 million dollars) to justify that avoiding shareholder approval is better than to go through the approval process and paying the cost of monetary cost of approval. Since it seems difficult to argue that the monetary cost would come even close to these numbers, the monetary cost hypothesis is not well supported.

Market Timing Hypothesis

: Managers avoid approval to keep information and sell overpriced equity.

The market timing hypothesis posits that managers might avoid approval so that the manager can sell equity at a level that is higher than the true price of the equity as argued by Baker and Wurgler (2002). Gaining approval could possibly leak information about the bad state of the company and make it difficult to sell the equity even at a discounted price. Manager would avoid approval to keep information about the true price of equity private.¹⁸

The market timing hypothesis has predictions about pre-announcement returns, announcement day returns, and long-run returns. First, discount-adjusted announcement day returns should be negative for firms that avoid approval. If managers are selling discounted equity, the true price should be even lower than the issuance price. Therefore, after the announcement of the private placement, the true price will be revealed and the discount-adjusted returns should be negative if managers are selling overpriced equity.

Second, pre-announcement day returns should be lower for firms that gain approval. Firms that gain approval might leak information about the true price of the firm compared to firms that avoid approval. Therefore, pre-announcement day returns should be lower for firms that

¹⁸In Appendix C, I discuss how I find announcement days for this paper and the validity of the public announcement date of the private placement as an event study date.

gain approval compared to firms that avoid approval.

Finally, returns should be lower for firms that avoid approval than the ones that gain approval in the long-run if there is underreaction to the information release. If the market does not realize the true price which is lower than the discounted price during the announcement period, firms that avoid approval should have lower long-run returns than firms that gain approval. This is because firms that gain approval should have already realized the true price at the announcement of the private placement while firms that avoid approval are slowly realizing the true price. Therefore, post-announcement returns should be lower for firms that avoid approval.

The first prediction can be tested by looking at discount-adjusted returns in Panel B of Table IV. Discount-adjusted returns are non-negative for all bins that issue less than 20%. Returns for the 0% to 20% bin is statistically significant of 0.52 (t -stat=1.71) while bins that issue closer but less than the 20% region are statistically insignificant and positive. These results show that firms that avoid approval issue at a price that is not higher than the market value price after the issuance. These results are inconsistent with the first prediction of the Market Timing Hypothesis.

The second and third prediction can be tested by looking at the pre-announcement and post-announcement returns. Table X presents the difference of cumulative abnormal returns for issuances above and below the 20% threshold for different periods. Panel A presents pre-announcement CARs and Panel B presents post-announcement CARs. All differences are positive for the one-month (-30, -2) pre-announcement returns but only the sample from 0% to 40% fraction issued is statistically significant (3.23 [t -stat=1.78].) This suggests that there could have been a small positive leakage of the shareholder approval information before the announcement of private placements rather than negative signaling of equity being overpriced for firms that gain approval as the second prediction. For the one-week (-7, -2) pre-announcement returns none of the returns are significant. There are some differences in returns that are neg-

ative closer to the 20% threshold but none are statistically significant. These evidences are inconsistent with the second prediction of the Market Timing Hypothesis.

The third prediction can be tested by looking at post-announcement returns in Panel B. I present one-week (+2, +7), one-month (+2, +30), half year (+2, +180), and one-year (+2, +365) CARs. Again, all return differences are statistically insignificant. Especially for the sample closer to the 20% threshold (i.e., 15% to 25% and 17.5% 22.5%) the t -statistics are all smaller than one. These results do not find support for the third prediction of the Market Timing Hypothesis which predicts positive returns. Thus, all predictions are not well supported.

Fiduciary Duties Hypothesis

: Managers avoid approval due to fiduciary duties to creditors.

Fiduciary Duties Hypothesis argues that the private placement is still misaligned with shareholders but differs from the Misalignment Hypothesis (MH) in that the motivation is from fiduciary duties to creditors rather than managers private benefit. When in the proximity of distress, equity issuance would decrease distress cost and benefit creditors. However, equity holders would not always approve of such action due to the value transfer from equity holders to creditors (i.e., debt overhang problem) creating the equity-debt holder conflict. As an example, Becker and Stromberg (2012) studies a legal ruling changing corporate fiduciary duties limiting managers' incentives to take actions that favor equity over debt for distressed firms. Affected distressed firms respond by increasing equity issuance and reducing risk. It is possible that managers avoid approval and issue privately to satisfy fiduciary duties to debt holders that equity holders would not approve of. As a result, shareholder value would decrease but debt value would increase enough to maintain or increase total firm value (i.e., debt value plus equity value).

Ideally, announcement day returns for debt would help measure the total firm value created from the private placement. However, it is difficult to measure how much creditors benefit from

the private placement because only sparse market debt data is available for firms that issue privately in my database. As an alternative, I test the fiduciary duty hypothesis by looking at whether firms are distressed or in need of cash just as in CAH1. Firms that are more distressed should increase debt value more than firms that are less distressed. Therefore, the market response should be the same as predictions of MH because shareholders would still lose value while other proxies should have the same prediction as CAH1.

Most strongly, debt covenant violation should affect managers' action. Roberts and Sufi (2009) shows that after covenants are triggered the control rights go to creditors and the firm's financial policy would be in the interests of creditors. Therefore, managers would avoid approval more often when debt covenants are violated. Fiduciary duty hypothesis would predict managers would avoid approval more often when covenants are triggered and firms are more distressed, have less cash holdings, and more often mention debt related use of proceeds.

The market prediction of MH is supported in earlier sections which also support the Fiduciary Duties Hypothesis. However, the predictions of CAH1 are not supported as seen in previous sections suggesting that Fiduciary Duties Hypothesis should be rejected. The debt of distressed firms would benefit more from the private placements giving managers a good reason to take the side of debt holders but I find that firms that are less distressed are more likely to avoid approval. Moreover, I did not find support for the effect of covenant violations in Table V. Thus, the Fiduciary Duties Hypothesis reason for avoiding shareholder approval is not well supported by data.

Uncertainty Hypothesis

: Managers avoid approval due to uncertainty in prospects of the company.

Uncertainty Hypothesis posits that managers may avoid approval due to uncertainty in the company's current or future prospects. Uncertainty can cause shareholders to have difficulty in understanding whether a private placement is in the best interest of shareholders. Since

managers do not want to risk the chance of the shareholder approval to be rejected, managers might avoid approval. The Uncertainty Hypothesis is similar to CAH2 in that the managers avoid approval because of the possibility that the approval is falsely rejected although the private placement is in the best interest of shareholders.

I test the hypothesis by using the volatility in stock prices prior to the private placement as the proxy for uncertainty in the prospects of the company. I use *SIGMA* which is the annualized three month daily return standard deviation stock volatility.¹⁹ Replacing *CHS* in regression (1), (3), and (5) of Table V with *SIGMA* results in statistically significant coefficients of -1.42 ($t\text{-stat} = -3.15$), -1.01 ($t\text{-stat} = -3.15$), and -0.83 ($t\text{-stat} = -3.50$), respectively.²⁰ These results suggest that firms that avoid approval are less volatile than firms that gain approval. The uncertainty is higher for firms that gain approval rather than firms that avoid approval. This is the opposite of the predictions of the Uncertainty Hypothesis, so I reject the hypothesis.

VI Conclusion

This paper provides empirical evidence that many firms that issue privately may have motivations that are not in the best interest of shareholders. Distressed firms have been the classical setting for agency theory literature. However, it has been difficult to empirically identify principal-agent conflict or value transfer among different agents more directly. This paper focuses on the empirical setting of distressed equity issuance through private placements.

The paper identifies principle-agent disagreement when publicly traded firms issue equity privately using a shareholder approval regulation governing private issuance. Using the distribution discontinuity around the 20% threshold, I identify many managers avoid shareholder approval by manipulating issuance fraction to be just below the threshold.

¹⁹see Appendix B for the detailed definition of the measure.

²⁰I replace the *CHS* distress measure with *EXRETAVG* in the regressions because *EXRETAVG* is included in the distress measure and can cause multicollinearity issues. Including both *EXRETAVG* and *CHS* in all three regressions result in negative but statistically insignificant coefficients for *EXRETAVG* while *CHS* has negative and statistically significant coefficients as before.

Since managers have most accurate information about the company managers should have a good sense of whether shareholders would approval a private placement or not. I further test whether managers avoid approval due to misalignmet of interests or because gaining shareholder approval is costly. I find that both announcement day return patterns and firm characteristics are consistent with the Misalignment Hypothesis while other alternative hypotheses are rejected. This shows that managers' might take actions that do not necessarily maximize shareholder value when issuing discounted equity privately.

Also, my paper has an implication for the private placement literature as I show a break in the distribution of private placements as well as a break in the announcement day returns. In the full sample, the majority of the sample that are placed at a discount and issue at fraction less than 20% have negative announcement day returns while firms that issue at a premium and issue more than 20% have positive announcement day returns. The averaging of these observations creates the puzzling positive announcement day returns of private placements that could be misleading in representing private placements.

Finally, the paper leaves the question whether the 20% threshold in the U.S. is too high compared to other countries. Most European and Asian companies require rights offering before the manager seeks outside funding that might dilute existing shareholders. Although the speedy procedure of private issuance has its benefits, the cost of dilution seems to be too high to justify the benefits in many cases and the high threshold of requiring shareholder approval might have been abused in many cases.

References

- Aghion, Philippe, and Patrick Bolton, 1992, An incomplete contracts approach to financial contracting, *The Review of Economic Studies* 59, pp. 473–494.
- Arena, Matteo P., and Stephen P. Ferris, 2007, When managers bypass shareholder approval of board appointments: Evidence from the private security market, *Journal of Corporate Finance* 13, 485–510.
- Baker, Malcolm, and Jeffrey Wurgler, 2002, Market timing and capital structure, *Journal of Finance* 57, 1–32.
- Barclay, Michael J., Clifford G. Holderness, and Dennis P. Sheehan, 2007, Private placements and managerial entrenchment, *Journal of Corporate Finance* 13, 461–484.
- Becker, Bo, and Per Stromberg, 2012, Fiduciary duties and equity-debtholder conflicts, *Review of Financial Studies* 25, 1931–1969.
- Brophy, David J., Paige P. Ouimet, and Clemens Sialm, 2009, Hedge funds as investors of last resort?, *Review of Financial Studies* 22, 541–574.
- Campbell, John Y., Jens Hilscher, and Jan Szilagyi, 2008, In search of distress risk, *Journal of Finance* 63, 2899–2939.
- Carhart, Mark M., 1997, On persistence in mutual fund performance, *Journal of Finance* 52, 57–82.
- Chaplinsky, Susan, and David Haushalter, 2010, Financing under extreme risk: Contract terms and returns to private investments in public equity, *Review of Financial Studies* 23, 2789–2820.
- Cohen, Randolph B., Christopher Polk, and Tuomo Vuolteenaho, 2003, The value spread, *Journal of Finance* 58, 609–642.
- Cuñat, Vincete, Mireia Gine, and Maria Guadalupe, 2012, The vote is cast: The effect of corporate governance on shareholder value, *The Journal of Finance* 67, 1943–1977.

- DeAngelo, Harry, Linda DeAngelo, and Karen H. Wruck, 2002, Asset liquidity, debt covenants, and managerial discretion in financial distress: The collapse of L.A. Gear, *Journal of Financial Economics* 64, 3–34.
- Dewatripont, Mathias, and Jean Tirole, 1994, A theory of debt and equity: Diversity of securities and manager-shareholder congruence, *The Quarterly Journal of Economics* 109, pp. 1027–1054.
- Gilson, Stuart C., 1989, Management turnover and financial distress, *Journal of Financial Economics* 25, 241–262.
- Gormley, Todd A., and David A. Matsa, 2011, Growing out of trouble? corporate responses to liability risk, *Review of Financial Studies*.
- Grossman, Sanford J., and Oliver D. Hart, 1982, Corporate financial structure and managerial incentives., In: McCall, J.J. (Ed.), *The Economics of Information and Uncertainty*. University of Chicago Press, pp. 107-140.
- Hertzel, Michael G., and Richard L. Smith, 1993, Market discounts and shareholder gains for placing equity privately, *Journal of Finance* 48, 459–485.
- Jensen, Michael C, 1989, Eclipse of the public corporation, *Harvard Business Review* 67, 61–74.
- Jensen, Michael C., and William H. Meckling, 1976, Theory of the firm: Managerial behavior, agency costs and ownership structure, *Journal of Financial Economics* 3, 305–360.
- Jung, Kooyul, Yong-Cheol Kim, and Rene M. Stulz, 1996, Timing, investment opportunities, managerial discretion, and the security issue decision, *Journal of Financial Economics* 42, 159–185.
- Keys, Benjamin J., Tanmoy Mukherjee, Amit Seru, and Vikrant Vig, 2010, Did securitization lead to lax screening? evidence from subprime loans, *The Quarterly Journal of Economics* 125, 307–362.
- Listokin, Yair, 2008, Management always wins the close ones, *American Law and Economics Review* 10, 159–184.

- Myers, Stewart C., 1977, Determinants of corporate borrowing, *Journal of Financial Economics* 5, 147–175.
- Ohlson, James A., 1980, Financial ratios and the probabilistic prediction of bankruptcy, *Journal of Accounting Research* 18, 109–131.
- Park, James L., 2012, Equity issuance and returns to distressed firms, Unpublished working paper. University of British Columbia, Vancouver.
- Roberts, Michael R., and Amir Sufi, 2009, Control rights and capital structure: An empirical investigation, *Journal of Finance* 64, 1657–1695.
- Shumway, Tyler, 1997, The delisting bias in CRSP data, *Journal of Finance* 52, 327–340.
- , and Vincent A. Warther, 1999, The delisting bias in CRSP’s Nasdaq data and its implications for the size effect, *Journal of Finance* 54, 2361–2379.
- Wruck, Karen Hopper, 1989, Equity ownership concentration and firm value: Evidence from private equity financings, *Journal of Financial Economics* 23, 3–28.
- Wu, YiLin, 2004, The choice of equity-selling mechanisms, *Journal of Financial Economics* 74, 93–119.

Table I: Summary Statistics

The table presents summary statistics of discounted common equity issuance and the issuer characteristics. Discount is the difference in issuance price relative to the day previous to the close of the equity issuance. Fraction placed is the amount issued calculated to apply the 20% rule. Use of proceeds is divided into debt related and specific project stated use of proceeds and are denoted by indicator functions I_{Debt} and $I_{Specific}$, respectively. CHS is the distress measure from Campbell, Hilscher, and Szilagyi (2008). $CASHMTA$ is cash and short-term investments over market equity and total liabilities. $BURN$ is the geometrically decreasing average of net income ($NIMTAAVG$) divided by $CASHMTA$ when $NIMTAAVG$ is negative, and zero otherwise. MB is the market-to-book measure and Size is market equity measured in 1,000 millions of dollars. $I_{Covenant Violation}$ is an indicator function which is one if debt covenants is triggered, and zero otherwise. Inst. Ownership and Managerial Shares are the proportion of institutional ownership and managerial ownership and are from Thomson Reuters. Private Placement data is from PlacementTracker.

	No. of Obs	Mean	Median	Std. Deviation	Min	Max
<i>Placement Characteristics</i>						
Year	2,470	2003.27	2003	3.50	1995	2010
Discount	2,470	0.15	0.13	0.11	0.00	0.88
Fraction Placed	2,470	0.14	0.13	0.08	0.00	0.40
<i>Use of Proceeds</i>						
I_{Debt}	2,470	0.09	0	0.29	0	1
$I_{Specific}$	2,470	0.36	0	0.48	0	1
<i>Distress</i>						
CHS	2,470	-6.70	-6.77	1.03	-9.08	-3.12
$CASHMTA$	2,470	0.09	0.06	0.09	0.00	0.38
$BURN$	2,470	-0.94	-0.27	3.51	-84.78	0
$I_{Covenant Violation}$	2,470	0.06	0.00	0.24	0	1
<i>Ownership Information</i>						
Inst. Ownership (%)	2,470	12.06	0.57	19.67	0	100
Managerial Shares (%)	2,470	2.81	0.22	7.98	0	85.55
<i>Firm Characteristics</i>						
MB	2,470	3.63	3.65	1.72	0.38	5.76
Size (1,000MM)	2,470	0.41	0.11	2.02	0.00	46.55

Table II: Distribution Discontinuity at the 20 Percent Threshold

The table reports estimates from ordinary least square regressions that regresses the number of observations (Y_i) of discounted privately placed equity in bin i using different equity issuance bin sizes (0.1% and 0.25%) for different ranges (0% to 40%, 10% to 30%, 15% to 25%, and 17.5% to 22.5%). I estimate seventh-order polynomials on either side of the 20% threshold allowing a discontinuity at 20%. The magnitude of the discontinuity, β , is estimated by the difference in these two smoothed functions evaluated at the cutoff. The data are re-centered such that the 20% threshold corresponds to “0,” so that the polynomials are evaluated at “0” both just above and below the 20% threshold. This allows β to be interpreted as the magnitude of the discontinuity compared to the mean, α , which is the estimate for the bin just below the 20% threshold. The permutation test allows for a discontinuity at every 0.1% increment from the 1% to 39% range. The permutation test tests the null hypothesis that the discontinuity at 20% is the mean of the 380 possible discontinuities from 1% to 39% range. The discounted common equity private placement observations are from PlacementTracker for the period from 1995 to 2010. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively, and the t -statistics are presented in parentheses.

$$Y_i = \alpha + \beta I_{fraction \geq 20\%} + \theta I_{fraction < 20\%} f(Fraction(i)) + \delta I_{fraction \geq 20\%} f(Fraction(i)) + \epsilon_i$$

Range (%)	Bin Size	$I_{Fraction \geq 20\%}(\beta)$	t -statistics	No. Bins	Adj R ²	Mean (α)
17.5 - 22.5	0.10	-43.90***	(-10.78)	50	0.87	48.97
	0.25	-84.93***	(-7.90)	20	0.86	95.84
15 - 25	0.10	-43.47***	(-11.29)	100	0.78	47.91
	0.25	-84.43***	(-9.66)	40	0.84	93.79
10 - 30	0.10	-34.38***	(-11.20)	200	0.73	38.18
	0.25	-72.27***	(-8.84)	80	0.80	81.53
0 - 40	0.10	-25.40***	(-11.38)	400	0.72	29.05
	0.25	-56.65***	(-9.39)	160	0.82	66.01
Permutation test (t -statistic)						
0 - 40	0.10		(-127.93)	380		

Table III: Announcement Day Returns by Fraction of Equity Placed

The table presents announcement day returns of discounted private placement issuing firms by bins of different issuance fraction. Panel A presents the mean difference of the 3-day cumulative abnormal return (CAR) between issuances above and below the 20% threshold. Panel B presents returns for bins by fractions centered around the 20% shareholder approval threshold while Panel C presents returns for non-overlapping bins. 3-day CAR is the sum of the ± 1 day announcement abnormal returns where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French's website. Discounted common equity private placement observations are from PlacementTracker. Returns are presented in percentages. The t -statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

Panel A. Mean Difference of CARs for Issuances above and below the 20% Threshold									
Range (%)	0 - 40	2.5 - 37.5	5 - 35	7.5 - 32.5	10 - 30	12.5 - 27.5	15 - 25	17.5 - 22.5	
Difference	2.55***	2.15**	2.19**	2.95***	3.13***	3.49***	4.03***	4.43***	
3-day CAR	(2.95)	(2.48)	(2.40)	(2.94)	(3.04)	(3.15)	(3.07)	(2.63)	
No. of Obs	2,470	2,319	2,060	1,731	1,399	1,048	695	363	
Panel B. CARs by Fraction of Equity Placed Centered around the 20% Threshold									
Range (%)	0 - 20	10 - 20	15 - 20	17.5 - 20	20 - 22.5	20 - 25	20 - 30	20 - 40	
3-day CAR	-0.91*** (-3.35)	-1.32*** (-3.36)	-1.43** (-2.47)	-1.82*** (-2.66)	2.61* (1.68)	2.60** (2.16)	1.80* (1.87)	1.64* (1.95)	
No. of Obs	2,062	1,131	536	281	82	159	268	408	
Panel C. CARs by Fraction of Equity Placed without Overlapping Bins									
Range (%)	0 - 10	10 - 15	15 - 17.5	17.5 - 20	20 - 22.5	22.5 - 25	25 - 30	30 - 40	
3-day CAR	-0.40 (-1.18)	-1.23** (-2.37)	-0.9 (-1.06)	-1.82*** (-2.66)	2.61* (1.68)	2.59 (1.40)	0.64 (0.42)	1.32 (0.73)	
No. of Obs	931	595	255	281	82	77	109	140	

Table IV: Discount-adjusted Announcement Day Returns by Fraction of Equity Placed

The table presents discount-adjusted announcement day returns of discounted private placement issuing firms by bins of different issuance fraction. Panel A presents the mean difference of the discounts-adjusted 3-day cumulative abnormal return (CAR_{adj}) between issuances above and below the 20% threshold. Panel B presents returns for bins by fractions centered around the 20% shareholder approval threshold while Panel C presents returns for non-overlapping bins. 3-day CAR is the sum of the ± 1 day announcement abnormal returns where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French's website. 3-day CAR is then adjusted by the discount amount and fraction of equity placed to adjust for dilution. Discounted common equity private placement observations are from PlacementTracker. Returns are presented in percentages. The t -statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

Panel A. Mean Difference of CAR_{adj} s for Issuances above and below the 20% Threshold										
Range (%)	0 - 40	2.5 - 37.5	5 - 35	7.5 - 32.5	10 - 30	12.5 - 27.5	15 - 25	17.5 - 22.5		
Difference	5.70***	4.80***	4.51***	5.08***	4.96***	5.16***	5.25***	4.93**		
3-day CAR_{adj}	(5.23)	(4.44)	(3.99)	(4.09)	(3.96)	(3.81)	(3.27)	(2.38)		
No. of Obs	2,470	2,319	2,060	1,731	1,399	1,048	695	363		
Panel B. CAR_{adj} s by Fraction of Equity Placed Centered around the 20% Threshold										
Range (%)	0 - 20	10 - 20	15 - 20	17.5 - 20	20 - 22.5	20 - 25	20 - 30	20 - 40		
3-day CAR_{adj}	0.51* (1.69)	0.66 (1.47)	1.09 (1.62)	0.92 (1.11)	5.84*** (3.05)	6.34*** (4.28)	5.63*** (4.74)	6.21*** (5.80)		
No. of Obs	2,062	1,131	536	281	82	159	268	408		
Panel C. CAR_{adj} s by Fraction of Equity Placed without Overlapping Bins										
Range (%)	0 - 10	10 - 15	15 - 17.5	17.5 - 20	20 - 22.5	22.5 - 25	25 - 30	30 - 40		
3-day CAR_{adj}	0.33 (0.90)	0.28 (0.48)	1.28 (1.19)	0.92 (1.11)	5.84*** (3.05)	6.88*** (2.99)	4.59*** (2.46)	7.33*** (3.14)		
No. of Obs	931	595	255	281	82	77	109	140		

Table V: Logit Regression of Firms Issuing without Approval

The table presents the results of logit regressions predicting privately issued equity avoiding shareholder approval by issuing less than 20% of existing shares. The left hand side variable is one if the fraction of equity placed is less than 20% (i.e., shareholder approval is avoided,) and zero otherwise. Discounted private placement observations with fraction of equity placed between 17.5% and 22.5% are used for regressions (1) and (2), 15% to 25% for regressions (3) and (4), and 10% to 30% for regressions (5) and (6). The right hand side variables include measures of characteristics of the firm and the issuance. Distress measure *CHS* is from Campbell, Hilscher, and Szilagyi (2008). Distress_{High} and Distress_{Low} are indicator functions which are one if the firms are in the highest and lowest distress quartile, respectively. *CASHMTA* is cash and short-term investments over market equity plus total liabilities. *BURN* is the geometrically decreasing average of net income (*NIMTAAVG*) divided by *CASHMTA* when *NIMTAAVG* is negative, and zero otherwise. *ICovenant Violation* is an indicator function which is one if debt covenants is triggered, and zero otherwise. Debt related use of proceeds and specific use of proceeds are denoted by indicator functions *I_{Debt}* and *I_{Specific}*, respectively. Discount is the difference in issuance price relative to the day previous to the close of the equity issuance. Inst. Ownership and Managerial Shares are the proportion of institutional and managerial ownership. *MB* is the market-to-book measure and Size is market equity measured in millions of dollars. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively, and the *t*-statistics are presented in parentheses.

Range (%)	Logit($I_{\text{Fraction}(i) < 20\%} = \alpha + X_i B + \epsilon_i$)					
	17.5% - 22.5%		15% - 25%		10% - 30%	
	(1)	(2)	(3)	(4)	(5)	(6)
Distress (<i>CHS</i>)	-0.52*** (-3.52)		-0.40*** (-4.02)		-0.42*** (-5.65)	
Distress _{High}		-0.80*** (-2.64)		-0.56*** (-2.60)		-0.67*** (-4.22)
Distress _{Low}		-0.03 (-0.09)		0.11 (0.41)		0.34 (1.63)
<i>CASHMTA</i>	0.43 (0.27)	0.21 (0.13)	-1.18 (-1.04)	-1.28 (-1.14)	-1.17 (-1.34)	-1.22 (-1.41)
<i>BURN</i>	0.01 (0.23)	0.02 (0.53)	-0.02 (-0.45)	-0.01 (-0.22)	0.00 (0.09)	0.01 (0.27)
<i>ICovenant Violation</i>	0.40 (0.77)	0.20 (0.40)	0.11 (0.30)	-0.04 (-0.10)	0.01 (0.02)	-0.07 (-0.25)
<i>I_{Debt}</i>	-0.05 (-0.10)	0.03 (0.05)	-0.62* (-1.79)	-0.57* (-1.68)	-0.19 (-0.71)	-0.19 (-0.70)
<i>I_{Specific}</i>	-0.08 (-0.29)	0.01 (0.04)	-0.11 (-0.56)	-0.06 (-0.30)	-0.10 (-0.65)	-0.07 (-0.49)
Inst. Ownership	0.02** (2.01)	0.02** (2.10)	0.02*** (2.68)	0.02*** (2.94)	0.02*** (3.88)	0.02*** (4.10)
Managerial Shares	-0.01 (-0.81)	-0.01 (-0.85)	0.01 (0.50)	0.01 (0.60)	0.01 (1.20)	0.01 (1.21)
Discount	3.11** (2.24)	2.75** (1.99)	1.13 (1.27)	0.96 (1.08)	0.23 (0.36)	0.15 (0.24)
MB	-0.01 (-0.14)	-0.04 (-0.43)	-0.05 (-0.80)	-0.06 (-1.06)	-0.01 (-0.13)	-0.01 (-0.20)
Size	-0.50 (-1.41)	-0.45 (-1.55)	-0.00 (-0.07)	0.00 (0.03)	0.03 (0.48)	0.03 (0.53)
No. of Obs	363	363	695	695	1,399	1,399
Pseudo <i>R</i> ²	0.06	0.05	0.05	0.03	0.05	0.05

Table VI: Rate of Delisting following Private Placements

The table presents portion of firms that delist after a private placement. The period of (0, +180), (0, +365), and (0, +730) denote the period of six months, one year, and two years after the private placement. The table presents the rate of delisting below and above the 20% fraction issued for ranges of 17.5% to 22.5%, 15% to 25%, and 10% to 30%. The mean difference of the rate of delisting below and above the 20% fraction are present with statistical significance at the 10%, 5% and 1% levels denoted by “*”, “**”, and “***”, respectively. The *t*-statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses.

Range (%)	Rate of Delisting							
	17.5% - 22.5%		15% - 25%		10% - 30%			
	<20%	20% $\leq$	Diff	<20%	20% $\leq$	Diff	<20%	20% $\leq$
(0, +180)	0.00 (1.00)	0.05 (2.04)	0.05* (1.90)	0.00 (1.42)	0.04 (2.49)	0.03** (2.22)	0.01 (2.84)	0.03 (3.05)
								0.03** (2.45)
(0, +365)	0.05 (3.83)	0.12 (3.35)	0.07* (1.74)	0.04 (4.43)	0.13 (4.77)	0.09*** (3.16)	0.04 (6.68)	0.10 (5.47)
								0.06*** (3.27)
(0, +730)	0.15 (7.11)	0.22 (4.77)	0.07 (1.31)	0.14 (9.33)	0.25 (7.17)	0.11*** (2.75)	0.15 (13.84)	0.22 (8.78)
								0.08*** (2.75)
No. of Obs	281	85	366	536	159	695	1,131	268
								1,399

Table VII: Announcement Day Return of Firms that Issue without Approval

The table presents the ordinary least square regression of announcement returns of firms that issue equity privately without shareholder approval (i.e., fraction of discounted equity placed less than 20%). Private placements observations with fraction of equity placed between 17.5% and 20% are used for regressions (1) and (2), 15% to 20% for (3) and (4), and 10% to 20% for (5) and (6). The left hand variable is the 3-day announcement day CAR in percentages. The right hand side variables include measures of characteristics of the firm and the issuance. Distress measure *CHS* is from Campbell, Hilscher, and Szilagyi (2008). Distress_{High} and Distress_{Low} are indicator functions which are one if the firms are in the highest and lowest distress quartile, respectively. *CASHMTA* is cash and short-term investments over market equity plus total liabilities. *BURN* is the geometrically decreasing average of net income (*NIMTAAVG*) divided by *CASHMTA* when *NIMTAAVG* is negative, and zero otherwise. $I_{Covenant\ Violation}$ is an indicator function which is one if debt covenants is triggered, and zero otherwise. Debt related use of proceeds and specific use of proceeds are denoted by indicator functions I_{Debt} and $I_{Specific}$, respectively. Discount is the difference in issuance price relative to the day previous to the close of the placement. Ownership and Managerial Shares are the proportion of institutional and managerial ownership. *MB* is the market-to-book measure and Size is market equity measured in millions of dollars. The *t*-statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

Range (%)	3-day $CAR_i = \alpha + X_i B + \epsilon_i$					
	17.5% - 20%		15% - 20%		10% - 20%	
	(1)	(2)	(3)	(4)	(5)	(6)
Distress (<i>CHS</i>)	1.31*		1.49*		1.31***	
	(1.72)		(1.86)		(2.75)	
Distress_{High}		2.77		3.35*		2.70**
		(1.47)		(1.84)		(2.21)
Distress_{Low}		-0.45		-0.21		-0.98
		(-0.31)		(-0.20)		(-1.29)
<i>CASHMTA</i>	-6.90	-6.93	-1.36	-1.30	-4.14	-4.17
	(-0.76)	(-0.77)	(-0.20)	(-0.19)	(-0.78)	(-0.78)
<i>BURN</i>	-0.02	-0.04	-0.07	-0.08	-0.02	-0.02
	(-0.16)	(-0.33)	(-0.68)	(-0.90)	(-0.13)	(-0.16)
$I_{Covenant\ Violation}$	-1.35	-0.94	-1.62	-1.19	-1.03	-0.87
	(-0.41)	(-0.29)	(-0.68)	(-0.52)	(-0.63)	(-0.54)
I_{Debt}	-2.87	-3.08	-2.24	-2.31	-1.02	-1.04
	(-1.26)	(-1.35)	(-1.28)	(-1.29)	(-0.91)	(-0.92)
$I_{Specific}$	2.88**	2.82*	2.02	1.94	0.86	0.81
	(1.98)	(1.92)	(1.59)	(1.55)	(0.97)	(0.93)
Inst. Ownership	-0.02	-0.02	-0.02	-0.03	-0.01	-0.01
	(-0.56)	(-0.52)	(-1.05)	(-1.22)	(-0.54)	(-0.65)
Managerial Shares	0.01	0.01	0.10	0.10	0.06	0.06
	(0.20)	(0.22)	(1.03)	(1.03)	(1.08)	(1.10)
Discount	-6.99	-6.54	-9.11	-8.68	-9.53**	-9.49**
	(-0.90)	(-0.85)	(-1.40)	(-1.36)	(-2.26)	(-2.25)
MB	-0.55	-0.50	-0.71*	-0.66*	-0.33	-0.30
	(-1.17)	(-1.10)	(-1.90)	(-1.76)	(-1.40)	(-1.26)
Size	-0.25	-0.78	-0.04	-0.04	-0.12	-0.12
	(-0.10)	(-0.28)	(-0.88)	(-0.96)	(-1.43)	(-1.50)
No. of Obs	281	281	536	536	1,131	1,131
R^2	0.03	0.03	0.03	0.03	0.02	0.02

Table VIII: Returns of Avoidance Firms by Distress, Use of Proceeds, and Discounts

The table presents the mean announcement day returns for subgroups of firms that issue discounted equity privately without shareholder approval (i.e., fraction of discounted equity placed less than 20%). The subgroups are formed by distress, specific use of proceeds, and discount. Distress measure *CHS* is from Campbell, Hilscher, and Szilagyi (2008). High distress and low distress are firm observations that are in the highest distress quartile and lowest distress quartile using the distress measure. There is a specific use of proceeds when the use of proceeds is explained in detail rather than stating working capital or a general use. High discount and low discounts are issuances that are in the highest quartile and lowest quartile, respectively. The 3-day announcement day CAR is the syn if ± 1 day announcement abnormal return where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French's website. Discounted common equity private placements observations with fraction of equity placed from 10% to 20%, 15% to 20%, and 17.5% to 20% are used. Private issuance observations with use of proceeds and discounts are from PlacementTracker. Returns are presented in percentages. Robust standard errors clustered at the firm level are used to calculate *t*-statistics presented in parentheses. Robust standard errors are clustered at the firm level. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

Range (%)	Returns	Distress		Specific Use of Proceed		Discount	
		High	Low	Yes	No	Low	High
17.5% - 20%	3-day CAR	-0.09 (-0.05)	-2.34** (-2.36)	-0.88 (-0.96)	-3.00*** (-2.94)	-0.78 (-0.86)	-2.78*** (-2.81)
	No. of Obs	65	63	156	125	134	147
15% - 20%	3-day CAR	0.64 (0.38)	-1.94** (-2.50)	-0.82 (-0.99)	-2.15*** (-2.78)	0.15 (0.17)	-2.85*** (-3.90)
	No. of Obs	132	127	292	244	255	281
10% - 20%	3-day CAR	0.71 (0.67)	-2.31*** (-4.29)	-1.13** (-2.01)	-1.57*** (-2.89)	-0.28 (-0.56)	-2.39*** (-3.94)
	No. of Obs	252	284	627	504	572	559

Table IX: Full Sample Announcement Day Returns

The table presents ordinary least square regressions of announcement day returns for the “full sample” including both premium and discounted issuance. The left hand side variable is the 3-day cumulative abnormal return (CAR) which is the sum of ± 1 day announcement abnormal return where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French’s website. The right hand side variables include characteristics of the private placement. Premium is the relative price of issuance to the market price the day before closing which is a negative number for discounted issuances and positive for premium issuances. Fraction placed is the fraction of newly placed shares compared to existing shares. $I_{Approval}$ is an indicator function that is one for discounted issuances with fraction of equity placed more than 20% (i.e., shareholder approval) and zero otherwise. $I_{Premium}$ is an indicator function which is one if the common equity is placed at a premium and zero otherwise. Premium $\times$ Fraction is the interaction terms of Premium and Fraction. Premium $\times$ Fraction $\times I_{Premium}$ is the interaction term of Premium, Fraction and $I_{Premium} > 0$. Private issuance observations are from PlacementTracker and are limited to issuance with fractions less than 40% of existing shares placed. Returns are in percentages. The t -statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

VARIABLES	3-day $CAR_i = \alpha + X_i B + \epsilon_i$							
	Discounted Issuance Sample			Discounted and Premium Issuance Sample				
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Fraction Placed	6.19 (1.59)	-7.09 (-1.41)	-12.62** (-2.15)	13.48*** (3.50)	20.83*** (3.78)	15.15*** (2.90)	6.34 (1.39)	0.09 (0.02)
Premium	4.12 (1.51)	3.78 (1.39)	9.26* (1.92)	13.08*** (3.40)	5.31 (1.23)	4.41 (1.03)	1.39 (0.32)	0.20 (0.05)
Premium $\times$ Fraction Placed (%)			-0.36 (-1.28)		0.77** (2.30)	0.89** (2.53)	0.07 (0.29)	0.20 (0.81)
$I_{Premium}$							1.45 (1.25)	1.66 (1.45)
Premium $\times$ Fraction $\times I_{Premium}$ (%)							2.01** (2.54)	2.01** (2.53)
$I_{Approval}$		3.90*** (3.45)	3.76*** (3.29)			2.76** (2.25)		3.02** (2.52)
No. of Obs	2,470	2,470	2,470	3,262	3,262	3,262	3,262	3,262
R^2	0.00	0.01	0.01	0.03	0.04	0.05	0.07	0.07

Table X: Pre-announcement and Post-announcement Day Returns

The table presents difference of cumulative abnormal returns of discounted common equity private placement issuing firms above and below the 20% threshold by bins of different issuance fraction in percentages. Panel A presents the mean difference of one month and one week pre-announcement day cumulative abnormal returns (CAR) between issuances above and below the 20% threshold. Panel B presents the mean difference for one week, one month, six month, and one year post-announcement day CARs between issuances above and below the 20% threshold. CAR is the sum of the event window abnormal returns where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French's website. Discounted common equity private placement observations are from PlacementTracker. The t -statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5% and 1% levels is denoted by “*”, “**”, and “***”, respectively.

Range (%)	Mean Difference of CARs for Issuances above and below the 20% Threshold							
	0 - 40	2.5 - 37.5	5 - 35	7.5 - 32.5	10 - 30	12.5 - 27.5	15 - 25	17.5 - 22.5
Panel A. Pre-announcement CAR								
(-30, -2) CAR	3.19* (1.73)	2.68 (1.34)	1.81 (0.87)	1.92 (0.86)	2.29 (0.92)	1.24 (0.50)	-0.17 (-0.06)	2.10 (0.57)
(-7, -2) CAR	0.72 (0.80)	0.61 (0.63)	0.45 (0.45)	0.40 (0.37)	0.05 (0.05)	-0.73 (-0.77)	-1.17 (-1.01)	-0.90 (-0.60)
Panel B. Post-announcement Long-run CAR								
(+2, +7) CAR	0.08 (0.12)	-0.15 (-0.21)	0.03 (0.04)	0.06 (0.07)	0.52 (0.61)	0.46 (0.47)	0.59 (0.50)	1.15 (0.73)
(+2, +30) CAR	0.50 (0.35)	0.39 (0.25)	0.27 (0.17)	1.22 (0.72)	2.11 (1.14)	3.34 (1.58)	3.44 (1.36)	0.50 (0.15)
(+2, +180) CAR	-2.12 (-0.56)	-3.44 (-0.88)	-2.47 (-0.61)	0.24 (0.05)	-0.28 (-0.06)	-1.01 (-0.18)	-0.01 (0.00)	-0.66 (-0.07)
(+2, +365) CAR	2.83 (0.52)	-2.11 (-0.38)	-1.55 (-0.27)	2.88 (0.47)	1.88 (0.28)	3.85 (0.51)	2.83 (0.33)	4.30 (0.36)
No. of Obs	2,470	2,319	2,060	1,731	1,399	1,048	695	363

Figures

Figure 1: Distribution of Privately Issued Equity

The scatter plot presents common equity issuance by the fraction of equity placed and the premium/discount at issuance. The horizontal axis represents the fraction of newly placed shares to existing shares. The vertical axis represents the premium/discounts of issuance price of the private placement contract compared to market closing price of the day before the private placement contract. Histograms for each 0.25% width are presented towards the left and bottom of the scatter plot in percentages. The common equity issuance data are from the PlacementTracker database for the period from 1995 to 2010.

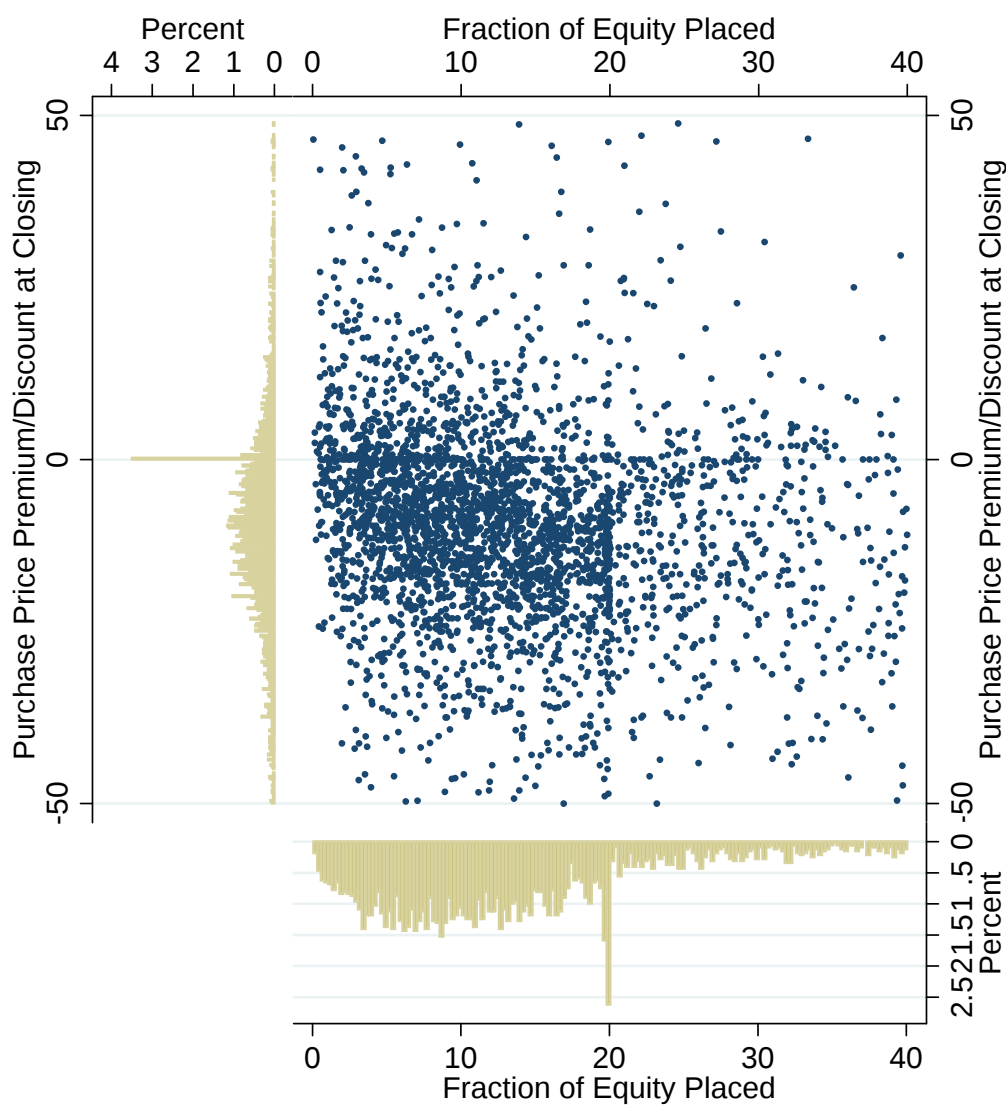


Figure 2: Distribution of Privately Issued Equity by Fraction of Equity Placed

The figure presents the cumulative distribution function (CDF) and the histogram of discounted common equity issuance by the fraction of newly placed shares to existing shares. Histograms for each 0.25% width are presented in the bottom panel in percentages. The common equity issuance data are from the PlacementTracker database for the period from 1995 to 2010.

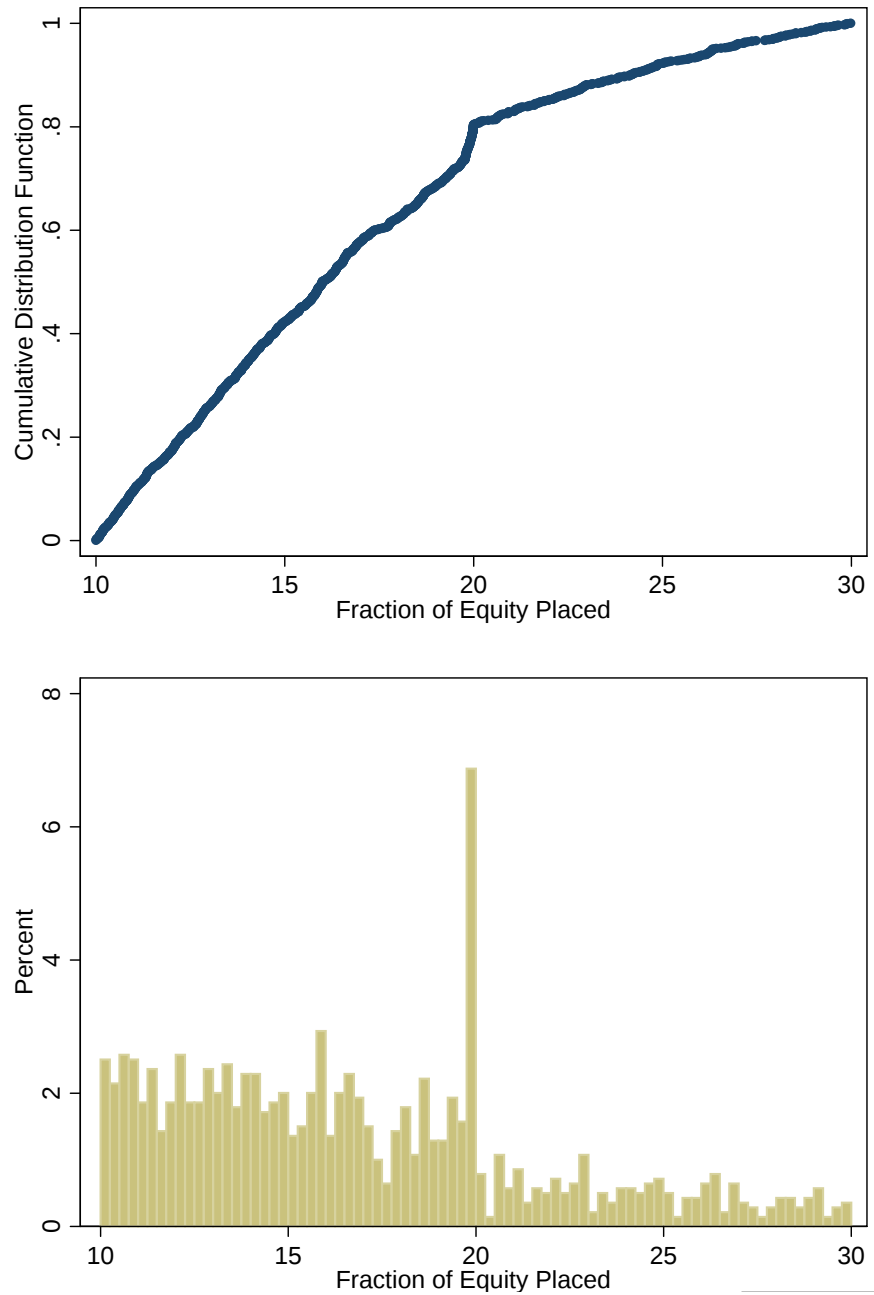


Figure 3: Number of Privately Issued Equity by Fraction of Equity Placed

The figure presents the number of discounted privately placed equity by fraction of equity issued. The number of observations are counted in a 0.1% bin for different ranges (17.5% to 22.5% in Panel A, 15% to 25% in Panel B, 10% to 30% in Panel C, and 0% to 40% in Panel D.) I plot the estimated distribution using a flexible seventh-order polynomials on either side of the 20% threshold for each range. Data are from the PlacementTracker database for discounted common equity issuance for the period from 1995 to 2010.

$$Y_i = \alpha + \beta I_{fraction \geq 20\%} + \theta I_{fraction < 20\%} f(Fraction(i)) + \delta I_{fraction \geq 20\%} f(Fraction(i)) + \epsilon_i$$

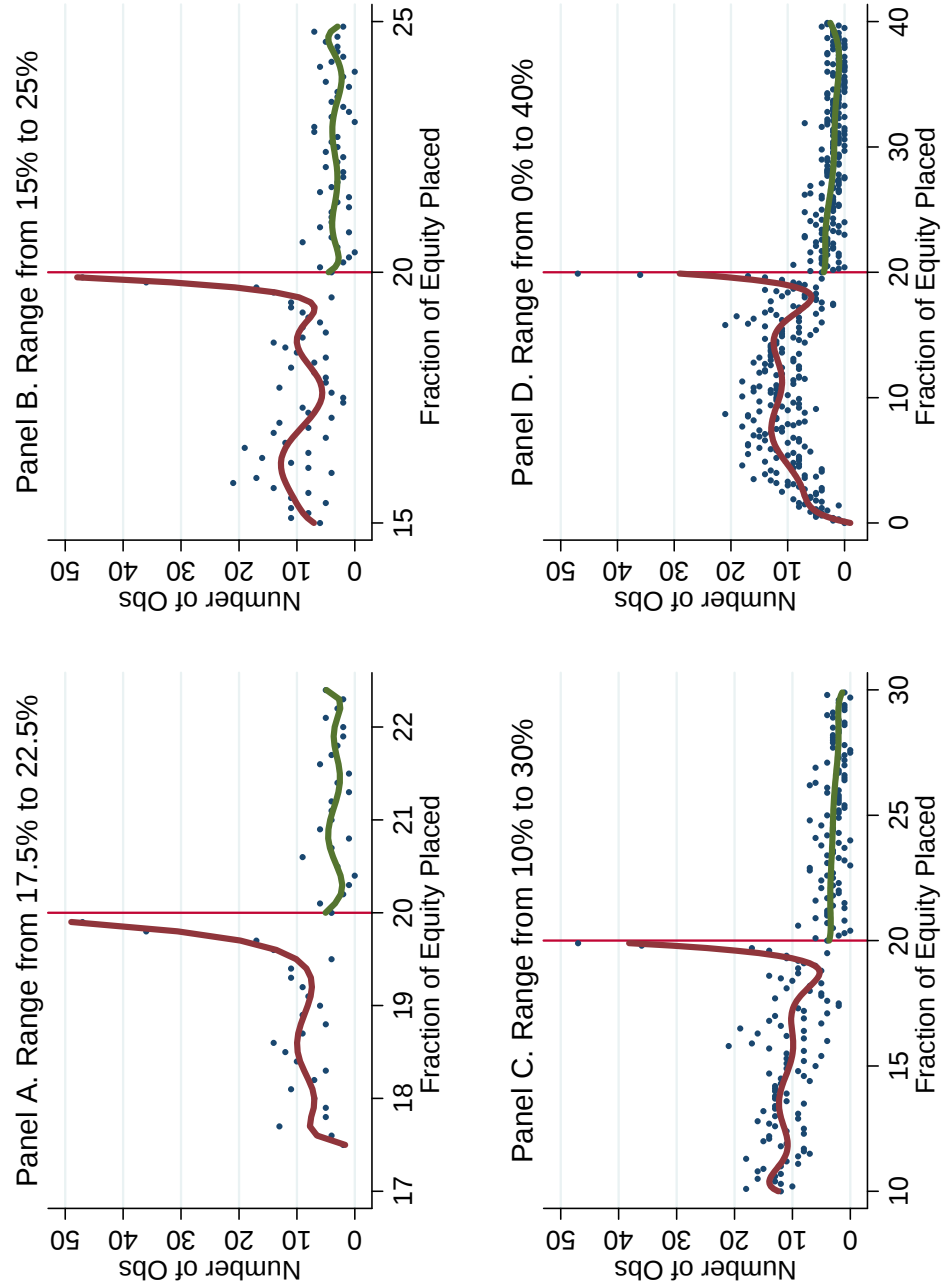


Figure 4: Distribution of Announcement Day Returns of Private Placements

The table presents mean abnormal returns of common equity private placements. The announcement day return is presented in Panel A for the full sample and in Panel B for separate regions by premium, discount, above, and below the 20% equity issuance fraction. Announcement day returns is the 3-day cumulative abnormal return (CAR) which is the sum of ± 1 day announcement abnormal return where returns are adjusted by coefficients estimated by regressing past daily returns on Market, HML, SMB, and Momentum factors from Ken French's website. Private issuance observations are from PlacementTracker and are limited to issuance with fractions less than 40% of existing shares placed. The t -statistics are calculated using robust standard errors clustered at the firm level and presented in parentheses. The statistical significance at the 10%, 5%, and 1% levels is denoted by “*”, “**” and “***”, respectively.

Panel A. Full Sample		Panel B. Sample by Region		
20%		20%		
Premium	0.79*** (2.84) No. Obs: 3,262	Premium	3.82*** (4.37) No Obs: 584	11.05*** (4.85) No Obs: 107
Discount		Discount	-0.90*** (-3.35) No Obs: 2,062	1.64* (1.95) No Obs: 408

Appendices

A Data Selection and Equity Issuance Fraction

To match PlacementTracker database with unique permnos, I first match all types of private placements with the trading symbol at closing and the current 6 digit cusip to CRSP database each year-month from January 1995 to December 2010. I keep permno matches if the observations match either symbol or cusip, or if observations have matches with both that agree. When I have multiple matches from either symbol or cusip, I use the permno that agrees with both, or the permno that matches the symbol. When I have multiple permnos that do not agree, I use the smallest permno. Finally, I recheck all matches by comparing company names from PlacementTracker against the matched company name from CRSP.

For the purpose of this study, I only keep common equity issuance including the ones that have attached warrants. The Frequently Asked Question (“FAQ”) section on the NASDAQ website clarifies different situations in applying the shareholder approval rule.²¹ I first drop observations that PlacementTracker indicates as including secondary offerings as these issuance do not count towards newly issued equity. NASDAQ might require shareholder approval of private placements to insiders. Therefore, I also drop shareholder approved issuances and manager participating issuances with issuance fraction below 20%. These screens are for cautionary purpose and do not affect the main results of the paper.

The treatment of warrants and aggregation of transactions are important in determining the number of shares placed at a discount. I follow the guidelines provided by NASDAQ to calculate the discount amount and to calculate the shares placed. Premiums and discounts are calculated relative to market price at closing. NASDAQ historically assigns a value of \$0.125

²¹I focus on NASDAQ regulations because 76% of my observations are from NASDAQ, 17% from NYSE MKT LLC (formerly AMEX) and 7% from NYSE. Similar regulations of the 20% rule exist on AMEX and NYSE exchanges. NYSE MKT LLC Section 713 and NYSE Rule 312 describe the 20% shareholder approval rule and the financial viability exception.

over the warrant's exercise price to compare to market price. I include shares of warrants that can be exercised less than \$0.125 above the closing price.

NASDAQ might also look back 6 months to aggregate similar transactions to determine whether the 20% threshold has been triggered. Although timing alone is not necessarily a determining factor, and there is no definitive time period as to whether transactions are aggregated. Generally, if there are no other linkage factors present, transactions more than six months apart would not be aggregated. Other considerations in the aggregation of issuances include whether the company was already planning the subsequent transaction, commonality of investors, contingencies between the issuances or transactions, commonality as to the use of the proceeds. When transactions are aggregated, the calculation of fraction of shares issues is based on the total shares outstanding on the closing of the first issuance.

Following this procedure, I aggregate discounted common equity shares that have been placed in the past 6 months to calculate the total shares of equity placed when the fraction placed is less than 20%. However, I use the non-aggregated fraction placed when calculating discount adjusted abnormal returns. I drop common equity issuances with past discounted convertibles or preferred shares placed at sample selection because of the possibility of aggregation and the difficulty to calculate the aggregate fraction of equity placed from the convertibles. Keeping these observations do not affect the main results of the paper.

To calculate the fraction of equity placed, I find the shares outstanding at the time of closing using CRSP-adjusted COMPUSTAT quarterly database. I first use number of shares outstanding from COMPUSTAT quarterly database. I adjust the shares outstanding if there is an update in the number of shares from CRSP daily database after the COMPUSTAT report date and before the closing.

Since many issuances are at fractions very close to the 20% threshold, there are possible errors due to additional shares placed between the last filing and the closing date. To be careful, I compare the calculated CRSP-adjusted COMPUSTAT shares outstanding with Placement-

Tracker. PlacementTracker collects shares outstanding data from the company's most recent 10-K or 10-Q file prior to the closing date. I also look at the first shares outstanding change from CRSP after the issuance and subtract the shares issued to generate shares outstanding before the issuance. I use CRSP-adjusted COMPUSTAT quarterly database for the reported shares outstanding and calculation of fraction of equity placed. I then drop observations if the shareholder approval categorization in terms of the 20% threshold does not agree with the categorization calculated by PlacementTracker or CRSP share change. Again, these observations do not affect my main results.

B Constructing *CHS* Measure

This section discusses the construction of the Campbell, Hilscher, and Szilagyi (2008) distress measure. The explanatory variables included in the measure are constructed as follows:

$$\begin{aligned}
NIMTA_{it} &= \frac{Net\ Income_{it}}{(ME_{it} + Total\ Liability_{it})} \\
TLMTA_{it} &= \frac{Total\ Liability_{it}}{(ME_{it} + Total\ Liability_{it})} \\
CASHMTA_{it} &= \frac{Cash\ and\ Short-term\ Investments_{it}}{(ME_{it} + Total\ Liability_{it})} \\
RSIZE_{it} &= \log \left(\frac{ME_{it}}{Total\ S\&P500\ Market\ Value_{it}} \right) \\
EXRET_{it} &= \log(1 + R_{it}) - \log(1 + R_{S\&P500,t}) \\
MB_{it} &= \frac{ME_{it}}{BE_{it}},
\end{aligned}$$

where ME_{it} is price time shares outstanding and book equity (BE_{it}) is initially constructed as Cohen, Polk, and Vuolteenaho (2003) have done. Following Campbell, Hilscher, and Szilagyi (2008), book equity is then adjusted by adding the 10% difference between market and book equity. For firms that still have negative values for book equity, I assign positive values of \$1 to ensure that they are in the right tail of market-to-book distribution rather than in the left tail. The volatility measure is the annualized 3-month return standard deviation, calculated by

$$SIGMA_{i,t-1,t-3} = \left(252 \times \frac{1}{N-1} \sum_{k \in \{t-1,t-2,t-3\}} r_{i,k}^2 \right)^{1/2}$$

SIGMA is coded as missing if less than five nonzero observations exist over the 3-month period. In this case, it is replaced with its cross-sectional mean. Campbell, Hilscher, and Szilagyi (2008) construct a geometrically decreasing average of *NIMTA* and *EXRET*,

$$\begin{aligned} NIMTAAVG_{t-1,t-12} &= \frac{1-\phi^3}{1-\phi^{12}} (NIMTA_{t-1,t-3} + \dots + \phi^9 NIMTA_{t-10,t-12}) \\ EXRETAVG_{t-1,t-12} &= \frac{1-\phi}{1-\phi^{12}} EXRET_{t-1} + \dots + \phi^{11} NIMTA_{t-12}, \end{aligned}$$

where the coefficient $\phi = 2^{-\frac{1}{3}}$. When the variables are missing, past *NIMTA* and *EXRET* are also replaced with the cross-sectional means in calculating the average measures *NIMTAAVG* and *EXRETAVG*. However, the distress measure requires leverage, profitability, excess return, and market capitalization to be valid. All explanatory variables are cross-sectionally winsorized above and below the 5% level in order to eliminate outliers, except for *PRICE* (where the value is winsorized above \$15). I use the coefficients of the logit model that predicts the 12-month ahead financial failure as Campbell, Hilscher, and Szilagyi (2008). The distress measure is constructed by :

$$\begin{aligned} CHS = & -20.26NIMTAAVG + 1.42TLMTA - 7.13EXRETAVG + 1.41SIGMA \\ & -0.045RSIZE - 2.13CASHMTA + 0.075MB - 0.058PRICE - 9.16, \end{aligned}$$

C Announcement Day

Finding the announcement day for private placements is critical for this paper because it would be the first day information about the terms of the issuance is publicly announced. Generally, the proceeds, price of issuance, and use of proceeds are announced. These information are important to evaluate whether the issuance requires shareholder approval. PlacementTracker (PT) database includes closing day of the issuance for all observations. The closing day is also important because whether the issuance is at a premium or discount is relative to the

market price at closing. Additional to the closing date, PT starts to rigorously document the announcement dates starting 2003. Since many announcement dates are missing before 2003, I search and refine announcement dates for all observations.

PT defines the closing day as either the date when the purchase agreement/subscription agreement for the transaction was signed by both parties and/or the date the actual funding of the private placement took place, depending on what information was provided by the company in its public filing. PT defines announcement day (“PT announcement day”) as the date that the transaction was first announced to the public. This is usually taken from the initial press release but can also be taken from SEC filings as well. Out of 5,118 common equity issuance observations from the PT database, 2,973 have PT announcement days. To have a better picture of the distribution of announcement dates, I compare PT announcement day against the closing day. Out of 2,973 observations, 1043 are on the closing day, 612 are on the closing day, 29 are on the day before the closing day. Out of 2,973 observations, 2,058 are within three days of the closing day, 2,363 are within five days of the closing day, and 2,812 are within 30 days of the closing day.²²

Based on the distribution of announcement and closing dates from PT, I refine the announcement dates by searching the LexisNexis database for public announcement. I search all news articles available on LexisNexis. Since there are too many articles for each company, I need to either use additional screens for the searches when using a wider window, or use a narrow window to search all articles without any additional screens. I use the mix of these search methods to search and refine announcement days for this paper.

First, I search within one month before and after the closing day for all observations. If overlapping windows exist for firms with multiple issuances, I search up to the midpoint of the each issuance. Since the search window is relatively wide, I restrict my searches with (“private”

²² All numbers in this section are from the original PlacementTracker database for common equity issuance only. Observations are required to later have variables from CRSP and COMPUSTAT to be included in the final sample for this paper.

or “PIPE”) and (“issue” or “offer” or “placement”) in the same paragraph to make the search manageable. I find 3,040 announcement dates out of the initial 5,118.

Second, I redo the search within two days before and after the PT announcement days for observations I did not initially find an announcement date or the initially searched announcement date is after the announcement date given by PT. Since I use a narrower search window, I search without any word screens other than the company name. Out of 1,493 observations, I find 1,180 announcement dates. The reason these announcements were not found in the initial search is because the announcement did not use the words to match the screens. Many articles refer the private placement as simply investments, offering, funding, selling common equity etc. and sometimes even referred to private placements as public offerings.

Finally, I redo the search within two days before and after the closing day for observations I have not yet found an announcement day or the PT announcement day is after the closing date. I find 467 out of 3,215 observations. Most of the observations I do not find have announcements outside of this ± 2 day window. After these searches, I use the earliest date as the refined announcement date.

I end up with 4,271 announcement days out of the 5,118 observations. To see if it is reasonable to fill in missing announcement days with PT announcement day or closing day I look at the distribution of searched announcement dates with PT given announcement dates. For firms with PT announcement days, 90% of the announcement date is within one day of the given announcement day from PT. To compare announcement days to closing dates, for all 4,271 with searched announcement dates found, 1,381 are on the PT closing date, 2,651 are within one of the closing date, 2,827 is within two days of the closing date, and 3,504 is within five days of the closing date.

Out of the 847 observation I do not find an announcement date, 215 are replaced with the PT announcement day. To maximize observations, I use the closing day as the announcement day for the 632 observations that do not even have PT announcement days. I do this to

keep as many observations as possible because more observations help identifying distribution discontinuity and the above distribution shows that announcements are centered around the closing date. Not filling in the announcement dates with the closing dates lowers the power of tests but does not affect the main results of the paper. Also, expanding the announcement day cumulative abnormal return 3-day window to a 5-day window makes my main results even stronger.

Searching for initial shareholder approval date or voting proxy date instead of the announcement of the placement is an alternative but a difficult task. For most observations that require a shareholder approval, there is no public announcement of the approval or SEC filing on EDGAR because companies are not required to disclose approval. For a small amount of observation that have some documentation of plans to gain shareholder approval, the dates are generally on or after the announcement day of the private placements but before the actual registration of shares. Also, some articles mention using the financial viability exception instead of the approval or mention that the issuance was already approved but there is no public announcement or SEC filings on when or how it was approved. As a result, searching for initial proxy statements or announcement of the shareholder approval does not give enough valid observations.

As discussed in section V and Table X, looking at the difference in pre-announcement and post-announcement day returns of firms that gain and avoid approval do not result in significant difference closer to the 20% threshold. This non-result suggests three possibilities. First, approval happens after the announcement of the private placement and approval is a non-event because everyone expects it to get approved. This seems to be the most likely scenario. Second, approval happens before the announcement of the private placement but the approval is not publicly known. Finally, the approval happens before the announcement and is publicly known but the approval is a non-event until the private placement is publicly announced due to the uncertainty of closing of the private placement contract. In any of these three cases, the announcement day of the private placement is a valid date for the event study of this paper.