The Choice between QIP and Rights Issue: Evidence from India

Global Business Review
16(5S) 155S–174S
© 2015 IMI
SAGE Publications
sagepub.in/home.nav
DOI: 10.1177/0972150915601260
http://gbr.sagepub.com

Pradip Banerjee[1]
Soumya Guha Deb[2]

Abstract

This article intends to study the market reaction to qualified institutional placements (QIPs) by Indian firms and the motivations of Indian firms behind issuing shares through QIP route vis-à-vis the rights issue route. In India, a large number of businesses are controlled by families. Therefore, rights issue would apparently seem to be a good avenue to raise additional capital and avoid the dilution of ownership. In this backdrop, using the data of firms issuing QIPs in India from 2007 to 2013, we examine the factors determining the decision for a company to go for a QIP or a rights issue. We examine the role of firm-level factors, such as, the concentration of promoter's shareholdings, several proxies, such as, size, age and book-to-market for information asymmetry and a number of other firm-level variables in determining such choice. We find that market reacts positively to QIP announcements for companies having low promoter holdings before the QIP. However, we do not find any evidence of certification role played by institutional investors for QIPs in India.

Keywords

Qualified institutional placement, right issue, monitoring hypothesis, certification hypothesis, seasoned equity offerings

Introduction

This article intends to study the market reaction to qualified institutional placements (QIPs) by Indian firms and the motivations of Indian firms behind issuing shares through the QIP route vis-à-vis the rights issue route. A listed corporation can issue additional shares to raise capital from the market by using several alternative routes. The three most common ways of issuing new shares are follow-on public offer (FPO), rights issue and private placements (PPs).[1] PPs in India are primarily of two types: QIP and preferential allotment (PA).[2] In the case of QIP, the company can raise equity directly from the qualified institutional bidders (QIBs). Rights issue is an age-old practice in India, but QIP was introduced only

[1] Associate Professor, Indian Institute of Management Indore, Indore, India.
[2] Professor (Finance), Xavier Institute of Management Bhubaneswar, Xavier University, Bhubaneswar, India.

Corresponding author:
Pradip Banerjee, Indian Institute of Management Indore, Rau-Pithampur Road, Indore 453 556, India.
E-mail: pradip2002@gmail.com

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about nine years ago. The Security and Exchange Board of India (SEBI)[3] for the first time allowed QIPs in India in May 2006 and came out with a full guideline of QIP investment for the first time in 2009.[4]

One major advantage of issuing QIP[5] is that the company issues fresh equity directly to the QIBs very quickly, rather than go through the lengthy process of rights issue and even more extensive process of FPOs.[6] There are several other advantages which make QIP issues a highly desired route to raise funds by the corporates in India. First, as compared to an FPO or a rights issue, a QIP does not require SEBI's approval. Second, the process involved in an FPO or a rights issue is more time-consuming than that of a QIP. According to Indian stock exchanges (both National Stock Exchange [NSE] and Bombay Stock Exchange [BSE]), QIP is the second fastest method of PP after PA, whereby a listed company can raise fresh equity capital or issue convertible securities to a chosen group of investors. Moreover, the procedural requirements for QIP are comparatively less cumbersome.

Third, amongst the PP routes, there is no lock-in period for QIPs, but in the case of PAs there is a one-year lock-in period.[7] Finally, in the case of QIP, the formula to arrive at a floor price is the average stock price of the last two weeks, but in the case of PA, it is the average stock price of last six months from the cut-off date. The cut-off date for the calculation of average stock price is the date which is 30 days prior to the date when shareholders' meeting is held and the decision of fresh equity issue is taken.

Several articles globally explore issues related to PPs. Wu (2004) documents the substantial amount of equity capital raised through PPs in the US. Many studies outside India document a positive and significant market reaction to PP (Hertzel & Smith, 1993; Wruck, 1989), which is quite in contrast to the negative and significant effect observed for new equity issues (Barclay & Litzenberger, 1988; Choe, Masulis & Nanda, 1993). This finding is contrary to the adverse selection problem of Myers and Majluf (1984), which states that new issues should be met with a negative reaction due to the information asymmetry between existing shareholders and new shareholders. Research studies suggest two major hypotheses to explain the positive effect: monitoring hypothesis (Wruck, 1989) and certification hypothesis (Hertzel & Smith, 1993). The monitoring hypothesis states that the institutions who subscribe to the QIP are active monitors and provide monitoring benefits. The certification hypothesis states that QIPs are basically certification mechanism adopted by firms with high information asymmetry problems.

The Indian firms are characterized by very high promoter's holdings and family control, unlike in developed economies, such as, the US or Europe (Claessens, Djankov & Lang, 2000; La Porta, Lopez-de-Silanes & Shleifer, 1999). Apparently, these family-controlled public firms would not be willing to dilute their control by issuing fresh equity in the form of FPO or QIP, which may dilute ownership and reduce control. The QIBs once becoming large shareholders, in their own interest, would most likely monitor and interfere in the activities of the firm which could be a threat to the degree of control by the promoter/family.

Given this backdrop and a rapidly increasing number of QIPs in India over the past few years, we felt it would be interesting to see whether monitoring hypothesis and/or certification hypothesis hold in the Indian context by examining the market reaction to the announcement of QIPs. To the best of our knowledge, no such work has been done in the Indian context on this important issue involving QIPs. In this article, we try to fill that gap. We also look at the determinants of the firm's choice between a rights issue and a QIP.[8] Our analysis consists of two parts: In the first part, we examine any abnormal returns (ARs) associated with the announcement of QIPs and identifying the firm-level attributes to capture the cause of these ARs, and in the second part we try to investigate what are the firm-level determinants of the choice between a rights issue and a QIP.

Previous literature (Cronqvist & Nilsson, 2005) related to PP shows positive ARs on announcements and argues in favour of the monitoring and/or certification roles of institutional investors. However, we

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do not find any evidence of monitoring/certification role played by institutional investors for QIPs, in Indian market. Our results show that market displays a negative reaction to QIPs announcements over the previous and subsequent 10-day period around the issue on an average**.** However, we find that for firms with low promoter holdings, there is evidence of a positive market reaction around the QIP issues. Promoters in India are generally dilution averse, and hence the market reacts positively to QIPs for companies which have low promoter holdings since the value of control benefits is often significant (Cronqvist & Nilsson, 2003; Dyck & Zingales, 2004; Nenova, 2003).

We also find that firms that already have high institutional holdings are more likely to opt for a QIP rather than a rights issue. This should imply that institutional investors in India typically prefer to invest in QIPs of firms with already high institutional holding, that is, QIBs in India exhibit a 'herd behaviour' while subscribing to QIPs.

The remainder of the article is organized as follows. The second section describes the review of literature. The third section defines the objective and hypotheses. The fourth section narrates the data, methodology and empirical set-up. The fifth section describes the analysis and findings and the sixth section concludes.

Review of Literature

Two most notable hypotheses in the context of issues involving QIPs are 'monitoring hypothesis' and 'certification hypothesis'. The monitoring hypothesis (Wruck, 1989) argues that institutional investors who have the willingness and ability to monitor the day-to-day management activities to enhance the value of the firm will take part in the PP process. In turn, taking part in this process, these institutional investors ensure or certify the valuation of the firm, named as certification hypothesis (Hertzel & Smith, 1993). Both these hypotheses find empirical support in the work done by Cronqvist and Nilsson (2005).

Alternative to QIPs, the firm may choose the rights issue in order to raise fresh equity capital. Hertzel and Smith (1993) examine the effect of asymmetric information on the choice between rights issue and PPs. They claim that if the degree of information asymmetry about firm value is high, the firm will choose PPs over the rights issue, because the institutional investors to whom PP is made can quickly identify the true value of the firm at little cost. They show that the direct cost of PP is higher (average discount of 20 per cent) than the other equity issue methods. Prior researches consider the effect of asymmetric information between more costly underwritten rights issues than less costly uninsured rights offerings (Eckbo & Masulis, 1992). They show when the asymmetry in information about the firm value is low, the firm will choose uninsured rights issue with low direct cost, when this is at intermediate levels firm will choose rights issue with underwriting option and here underwriter will play role of certifier.

The third hypothesis that got much less attention is 'managerial entrenchment'. Under this hypothesis, the management would sell the stock to the friendly investors who would not engage themselves much into monitoring. Dann and DeAngelo (1988) and Wruck (1989) find some evidence for this entrenchment effect. Barclay, Holderness and Sheehan (2007) find PPs are often offered to submissive investors, which in turn helps the management to strengthen their control on the firm.

A large number of studies have been conducted on market reaction to rights issues across the globe. In the US, several researchers have found that share price reactions to both underwritten offer and non-underwritten rights issues are negative (Barclay & Litzenberger, 1988; Eckbo & Masulis, 1992; Hansan, 1989). More recently, Kim and Purnanandam (2006) have shown that investors react negatively when

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they perceive that the corporate managers are engaged in value-destroying activities with the proceeds of the rights issue.

In the other markets, Balachandran, Faff and Theobald (2007) document an insignificant price reaction for fully underwritten rights issue and a significant negative price reaction for non-underwritten rights issue in Australian market. In China, Wang, Wei and Pruitt (2006) document significant positive ARs related to rights issue. Similarly, in Japan (Kang & Stulz, 1996), Switzerland (Loderer & Zimmerman, 1988) find positive ARs associated with announcement of rights issue. Tan, Chang and Tong (2002) report a positive correlation between the issue size and the ARs in Singapore market. Salamudin, Ariff and Nassir (1999) show during favourable economic conditions that the price reactions are positive for rights issues in the Malaysian market.

In the Indian context, the study conducted by Srinivasan (1993) and Rao (1994) before economic liberalization finds a positive and significant price reaction around rights issue offerings (Rao, 1994; Srinivasan, 1993). In the post-liberalization period, Marisetty, Marsden and Veeraraghavan (2006) find a positive but not a significant price reaction to the announcement of rights issue in general and when they study the family group affiliation, the announcement returns become negative and significant for the firms with high family group affiliation. In another study, Lukose and Rao (2003) report that the operating performance of the firms significantly declines after the rights issue and the decline is more severe for large firms and the firms with low director's holdings.

Objectives

Hypothesis on Announcement Effects of a QIP

In line with the findings of some of the studies mentioned in the previous section (Cronquist & Nilsson, 2003; Hertzel & Smith, 1993; Wruck, 1989), a positive and significant reaction to QIP announcements is expected in India, if monitoring and/or certification hypotheses hold. However, we believe that the certification and monitoring hypotheses may not hold in India as researches (Marisetty et al., 2006) show that Indian companies have high levels of promoter holdings. As per Jensen and Meckling (1976), high levels of promoter holdings may reduce information asymmetry and agency costs and hence reduce the importance of monitoring/certification for Indian companies. We expect, on the other hand, a negative reaction, in line with the argument made by Myers and Majiluf (1984), that managers are always having better information about the future prospects of the firm and will tend to issue new equity only when it is favourable for existing shareholders. However, the market participants would anticipate that and would result in a negative reaction on the announcement of fresh equity issue. Moreover, institutional investors typically tend to exhibit 'herd behaviour' while investing in firm equity, that is, they tend to prefer investing in equity of firms which already have a high institutional holding. If such a passive institutional motive is dominant in India, then it is unlikely that the monitoring /certification effects will be visible. Given these arguments, we frame our first hypothesis as follows.

Hypothesis 1

Null hypothesis: Institutional investors would be investing in those companies which already have high institutional holdings and show 'herd behaviour'; as a result no abnormal price reaction would be seen around the announcements of QIP.

Alternate hypothesis: Due to certification and monitoring effects in Indian context, positive and significant ARs can be seen around the announcements of QIP.

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Hypothesis on Firm-level Variables Affecting the Cumulative Abnormal Returns in QIP

We identify the following firm-level variables, which we believe are expected to have an impact on the cumulative ARs (CARs), if any, after the QIPs. We first define the variables and then present the argument in framing the corresponding hypotheses concerning each variable, hereunder:

1. Size of the firm as measured by the market capitalization of the firm in the month prior to the QIP announcement. We name this variable as *Mktcap*.
2. Age of the firm as measured by the number of years since incorporation of the firm to the QIP announcement. We name this variable as *Age*.
3. The company's future growth opportunities proxied by the firm's market-to-book (M/B) ratio: the book value of assets divided by market value of assets in the month prior to the QIP announcement. We name this variable as *BM*.
4. The promoter's holding in the firm measured by the percentage holding of promoters in the firm in the quarter prior to the quarter in which the QIP was announced. We name this variable as *promoters*.
5. The binary variable *bgroupdummy* that takes the value 1 if the firm belongs to a large business group, 0 otherwise.
6. 'Institutional ownership' in the firm measured by the percentage holding by the domestic institutional investors (DIIs), such as, banks and insurance companies, foreign institutional investors (FIIs) and mutual funds (MFs) in the firm, in the quarter prior to the quarter in which the QIP was announced. We name these variables as *DII*, *FII* and *MF*, respectively.
7. A binary variable *Aug08dummy* that takes the value of 1 if the QIP was done after August 2008, and 0 if before. The reason for including this variable is indicated below.

Intuitively, the smaller the firm size, the higher the announcement effect of new private issues. The argument placed in favour of such a claim is that the smaller the firm size, the more the asymmetry in information about its future growth opportunities. If certification hypothesis holds true, PPs /QIPs should act as a cure for asymmetric information; and hence markets would react more positively to smaller issuers' announcements of QIP. Thus, the lower the size of the company, the higher would be the announcement effect of a QIP.

One popular argument is that the older the firm, the lower one would expect the degree of information asymmetry, as the firm would be around in the market for a longer period of time and would have the higher level of information dissemination. Hence, the higher the age of the firm, the lower would be the announcement effect of a QIP.

Future growth opportunities in a firm are typically *ex ante* in nature and uncertain. Hence, one may argue that firms with the higher growth opportunities can be associated with the higher level of information asymmetry. Using M/B ratio as a proxy for the firm's future growth opportunity, we thus conjecture that the higher the B/M ratio of the company,[9] the lower the announcement effect of a QIP.

In a QIP, the placement is being made to qualified institutional bidders (QIBs), who are institutional investors distinct from promoters. Hence, the QIP would dilute the control of promoters by diluting ownership. This would be especially true for family-controlled firms. Hence, a QIP may be disadvantageous to 'dilution-averse' promoters. Hence, we would expect that markets react positively if QIP is made by companies that have small promoters stake, that is, markets would react positively for cases, where despite having a lower control before the QIP, the promoters are not averse to having new institutional owners in the firm signifying their keenness in truly creating the value for the shareholders at large,

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without entertaining any vested interests for themselves. Hence, the lower the promoter's holdings, the higher the announcement effect of a QIP.

Marisetty et al. (2006) find that announcement returns for rights issues are negative and significant for those firms that are a part of a large business group. To check this and control for this, we include our binary variable *bgroupdummy* which takes the value of 1 if the firm belongs to a business group, and 0 otherwise.

We expect lower market reaction if institutional ownership in a firm is already high before the QIP representing already existing monitoring effect, or if markets do not view the QIBs to be effective monitors/certification agents. Thus, the higher the institutional holding before the QIP, the lower should be the announcement effect of a QIP.

The Security and Exchange Board of India amended the formula for QIP pricing in August 2008, allowing the price of the QIP to be based on the previous two weeks average share price. Before this change, the price was based on the higher of previous six months or two weeks average share price. This change was good for QIP investors, since now prices could be based on current market conditions. We thought that the QIP announcements made after August 2008 could react positively due to this change in pricing policy. To test for this, we include a binary variable *Aug08dummy*, which takes the value of 1 if the QIP was done after August 2008 and 0 otherwise.

Finally, we also wanted to explore whether the equity market performance of the firm, in the immediately preceding quarter, could have an effect on the market reaction on QIP announcement. Accordingly, we incorporated a variable, *Lastqret*, which is the return of the firm in the quarter prior to the quarter in which the QIP was announced.

In line with these arguments, we frame our next six hypotheses as follows:

Hypothesis 2

Null hypothesis: There is no relation between the size of the firm and the CARs around the QIP announcements.

Alternate hypothesis: Due to information asymmetry, the smaller the size of the firm, the higher would be the positive announcement effect of the QIP.

Hypothesis 3

Null hypothesis: The older the firm, the lower would be the positive announcement effect of the QIP.

Alternate hypothesis: There is no relation between the age of the firm and the CARs around the QIP announcements.

Hypothesis 4

Null hypothesis: The higher the BM ratio, the lower would be the announcement effect of the QIP.

Alternate hypothesis: There is no relation between the growth opportunity of the firm and the CARs around the QIP announcements.

Our next hypothesis is thus as follows:

Hypothesis 5

Null hypothesis: There is no relation between the proportion of promoter's holding and the CARs around the QIP announcements.

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Alternate hypothesis: Due to information asymmetry, the lower the promoter's holdings, the higher would be the announcement effect of the QIP.

In line with this argument, we frame our next hypothesis as follows:

Hypothesis 6

Null hypothesis: There is no relation between the proportion of institution's holding and the CARs around the QIP announcements.

Alternate hypothesis: Due to information asymmetry, the higher proportion of institution's holding prior to QIP announcement, the lower would be the announcement effect of the QIP.

Hypothesis 7

Null hypothesis: There is no relation between the QIP pricing mechanism and the CARs around the QIP announcements.

Alternate hypothesis: Due to the change in pricing policy by the regulator, the QIP announcements made after August 2008 would show positive reactions.

Hypotheses in Connection with the Choice between Rights and QIP

Promoter's holdings and the choice between QIP and rights issues: In line with our arguments provided against hypothesis 5, we expect more promoter's holdings for the firm going for QIP, since if promoters currently have low holdings and do not want to dilute their holdings further, they would choose a rights issue over a QIP.

Certification hypothesis and the choice between QIP and rights issues: As argued above, small firms are likely to have more information asymmetry. If according to the certification hypothesis, QIP is a route to minimize the impact of information asymmetry; smaller firms would be more likely to choose a QIP over a rights issue. Similarly, newer firms and firms with high but uncertain future growth prospects are likely to have more information asymmetry. Hence, the greater the firm age, the lower should be the probability of the firm choosing a PP, and the higher the M/B ratio of the firm, the greater the probability of the firm choosing the QIP route over the rights route.

Monitoring hypothesis and the choice between QIP and rights issues: If there are already institutional investors (FII, MF, DII) holding a fraction of the firm, then monitoring benefits already exist, and hence bringing in new institutional investors would not add much incremental monitoring benefits. Hence, according to the monitoring hypothesis, the higher the existing holdings of institutions, the lower the probability of the firm choosing a QIP over a rights issue. On the other hand, if institutional investors exhibit 'herd behaviour', then one would expect that more the prior institutional holding in the company's stock, more likely it is that the company will go for a QIP. This is because herding implies that institutions would be more inclined to invest in a firm which already has institutional investors.

In addition to the variables mentioned above, another variable *individual* is also included, which denotes the percentage holding of individuals in the firm in the quarter prior to the quarter in which the QIP was announced.

In line with these arguments, we formulate two more hypotheses as follows:

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Hypothesis 8

Null hypothesis: There is no relation between the firm sizes, age and growth opportunity for choosing QIP over rights issue.

Alternate hypothesis: Due to information asymmetry, the smaller firms, the younger firms and firms with the higher growth opportunity choose the QIP over the rights issue.

Hypothesis 9

Null hypothesis: There is no relation between the proportional institutional holdings for choosing QIP over rights issue.

Alternate hypothesis: Due to the higher institutional holdings, the monitoring benefits already exists and hence the higher the proportion of institutional holding, the lower would be the probability of the firm choosing the QIP route over the rights issue.

Data and Methodology

The Security and Exchange Board of India has allowed QIPs in India during 2006. We choose our study period spanning seven years from 1 January 2007 through 31 December 2013. Within this period, there were a total of 152 rights issues and 191 QIPs. However, the announcement date and daily stock price data are available for 125 rights issues and 163 QIPs, which is our final sample. Table 1 shows yearly sample distribution.

We collect the announcement dates of rights issues and QIPs from Bloomberg database. Daily stock price and market returns (S&P CNX Nifty as a proxy for market) are collected from the Centre for Monitoring Indian Economy (CMIE) Prowess database. Data on each firm's market capitalization, ownership structure, book value, listing history, issue size, group affiliation and industry classification are also collected from Prowess.

Tables 2 and 3 provide a breakdown of rights issue and QIPs in the sample by year of announcement along with the group ownership of the firms. The maximum number of rights issues in our sample is observed in 2007 (29 issues), and the maximum number of QIPs in 2010 (49 issues). In the final sample, 48 per cent and 51 per cent of the rights issues and QIPs, respectively, are by family-controlled firms. The rights issues and QIPs are categorized industry-wise and reported in Table 4. It can be seen that the

Table 1. Sample Distribution by Year

Year	Rights Issue	Total Issue Size (₹ million)	QIP Issue	Total Issue Size (₹ million)
2007	29	89,560.9	38	238,973.3
2008	21	262,227.4	6	34,185
2009	22	33,307.7	37	224,479.7
2010	22	133,074.6	49	168,670.8
2011	8	18,314.2	8	29,463.3
2012	13	43,070	8	19,425.5
2013	10	28,380	17	67,962
Total	125		163	

Source: CMIE Prowess.

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Table 2. Breakdown of Number of Rights Issues

Year	No. of Rights Issues	Family Group-owned Firm	Government-owned Firm	Foreign-affiliated Firm	Stand-alone Firms
2007	29	11	1	4	13
2008	21	10	0	2	9
2009	22	14	0	0	8
2010	22	11	2	0	9
2011	8	3	0	0	5
2012	13	6	0	0	7
2013	10	5	0	2	3
Total	125	60	3	8	54

Source: CMIE Prowess.

Table 3. Breakdown of Number of QIP Issues

Year	No. of QIP Issue	Family Group-owned Firm	Government-owned Firm	Foreign-affiliated Firm	Stand-alone Firms
2007	38	17	0	1	20
2008	6	3	1	0	2
2009	37	20	0	2	15
2010	49	23	0	0	26
2011	8	4	0	0	4
2012	8	4	0	2	2
2013	17	13	1	2	1
Total	163	84	2	7	70

Source: CMIE Prowess.

Table 4. Industry Classification of the Sample Firms

Industry	Rights Issue	QIP Issue
Air conditioners and refrigerators	1	0
Aluminium and aluminium products	1	3
Animation content provider	1	0
Auto finance services	1	4
Automobile ancillaries	6	2
Banking services	9	12
Beer and alcohol	1	3
Boilers and turbines	1	1
Books and cards	1	0
Business consultancy	1	4
Castings and forgings	3	1
Caustic soda	1	0
Cement	1	1
Ceramic products	2	1
Cloth	3	1
Commercial complexes	1	14
Commercial vehicles	2	1

(Table 4 continued)

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(Table 4 continued)

Industry	Rights Issue	QIP Issue
Computer software	2	6
Consumer electronics	1	0
Copper and copper products	1	1
Crude oil and natural gas	1	0
Cosmetics, toiletries, soaps and detergents	0	2
Cotton and blended yarn	1	1
Diversified	2	4
Diversified cotton textile	1	1
Drugs and pharmaceuticals	4	6
Dyes and pigments	1	1
Electricity generation	0	3
Exhibition of films	2	0
Ferro alloys	1	0
Generators, transformers and switchgears	1	0
General purpose machinery	0	1
Glass and glassware	2	1
Health services	1	2
Hotels and restaurants	4	1
Housing construction	0	3
Housing finance services	0	2
Industrial construction	1	3
Infrastructural construction	4	14
Infrastructure finance services	0	1
Investment services	3	1
Lubricants, etc.	1	0
Media broadcasting	3	2
Media content	3	1
Metal products	0	6
Misc. manufactured articles	1	0
Organic chemicals	1	3
Other agricultural products	1	2
Other asset financing services	7	2
Other chemicals	4	2
Other construction and allied activities	0	1
Other electronics	0	2
Other misc. services	2	2
Other non-metallic mineral products	1	1
Other recreational services	0	1
Other textiles	1	1
Paper and newsprint	2	1
Pesticides	0	2
Plastic films and flexible packaging	1	1
Plastic furniture, floorings and misc. items	3	2
Processed foods	0	1
Readymade garments	0	1
Retail trading	1	3
Rubber and rubber products	1	0
Shipping transport infrastructure services	0	2

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Industry	Rights Issue	QIP Issue
Steel	5	2
Steel pipes and tubes	0	2
Storage batteries	2	1
Sugar	4	1
Synthetic textiles	2	2
Telecommunication services	1	1
Tourism	1	1
Tractors	0	1
Trading	4	6
Transport logistics services	0	2
Tyres and tubes	2	0
Vegetable oils and products	1	0
Wires and cables	0	2
Wood	1	0
Total	125	163

Source: CMIE Prowess.

samples of both rights issues and QIPs stretch over diverse industries. The maximum number of rights issues (9) are observed in banking services industry, and the maximum number of QIPs are observed in infrastructural construction (14) and commercial complexes (14) closely followed by banking services (12) industries.

Measurement of Abnormal Return

We use the simple market model to measure the stock price reaction to the announcement of rights issue and QIPs. The daily closing price data are expressed in ₹. Using that, we compute the daily continuously compounded (cc) returns as follows:

$$R_t = \log(P_t/P_{t-1})$$

where R_t and P_t are the returns and the daily closing price, respectively, for the period t and P_{t-1} is the previous day's closing price. The daily market return was calculated in the similar fashion using the NSE's popular index 'S&P CNX Nifty' daily closing values.

Statistical Tests

In this study, we use the most commonly used event study methodology of Brown and Warner (1985). Two important dates related to rights issues and QIPs are the announcement date and the equity issue date. The announcement date is the date of the board meeting and the announcement of the equity issue for each sample company. Abnormal returns are calculated over the event window of [−10 to +10] trading days surrounding the announcement date for the QIP. The estimation windows used to calculate alpha and beta are the returns over days [−210 to −31] prior to the announcement date of QIP.

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The estimated market model uses close-to-close returns for each stock and is given by:

$$R_{it} = \alpha_i + \beta_i R_{mt} + \varepsilon_{it}, \tag{1}$$

where $R_{\text{mt}} = \ln(I_t/I_{t-1})$ is the log relative of the corresponding S&P CNX Nifty index, α_i and β_i are the regression coefficients for stock i, and ε_{it} is the regression error. For stock i and day t, the AR is,

$$\text{AR}_{it} = R_{it} - (\hat{\alpha}_i + \hat{\beta}_i . R_{mt}), \tag{2}$$

from which we obtain from the cross-sectional average AR for a sample of N stocks:

$$\text{AAR}_{it} = \sum_{i=1}^{N} \frac{\text{AR}_{it}}{N}, \tag{3}$$

and the associated cumulative average AR (CAAR) for event days t_1 (–10 days) through t_2 (+10 days):

$$\text{CAAR}_t = \sum_{t=t_1}^{t_2} \text{AAR}_t. \tag{4}$$

To construct the tests of significance relating to AARs and CAARs, I calculate the standard deviation of ARs for the period −210 days to −11 days for each company, which we deploy to obtain the standardized ARs (SAR) over days −10…+10 for each company. The test statistics for the average ARs and CAARs for N stock is given by, $Z_{\text{AAR},t} = \sum_{i=1}^{N} \frac{\text{SAR}_{it}}{\sqrt{N}}$ and $Z_{\text{CAAR},t} = \sum_{i=t_{1i}}^{t_{2i}} \frac{\text{SAR}_{it}}{\sqrt{T*N}}$, respectively, for $T = 1, \ldots, 21$.

Regression

To test for the effects of different firm characteristics on market reaction to the QIP, we run two separate ordinary least square (OLS) regressions with CAR(−2, 2) and CAR(−5, 5), respectively, as the dependent variables as given below. The independent variables are as follows:

Mktcap: This is the market capitalization of the firm in the month prior to the QIP announcement month.

Age: This is the number of years from incorporation of the firm to the QIP issue.

BM: This is the book value of assets divided by market value of assets. The book value of assets is measured by adding the book value of equity and debt, and the market value of assets is measured by adding the market capitalization and the book value of debt. The book value of equity and debt is measured at the end of the reporting year, and the market capitalization of the firm is measured in the month prior to the QIP month.

Promoters: This denotes the percentage holding of promoters in the firm in the quarter prior to the quarter in which the QIP was announced.

Bgroupdummy: This is a dummy variable that takes the value of 1 if the firm belongs to a business group, and 0 otherwise.

FII, MF and *DII:* These denote the percentage holding of FIIs, MFs and other DIIs (banks, insurance companies etc.), respectively, in the firm in the quarter prior to the quarter in which the QIP was announced.

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Aug08dummy: This is a dummy variable that takes the value of 1 if the QIP was done after August 2008, and 0 if before.

Lastqret: This is the return of the firm in the quarter prior to the quarter in which the QIP was announced.

$$CAR(-2,2)_i = \beta_1 + \beta_2 LastqRet_{i,} + \beta_3 MF_{i,} + \beta_4 DII_{i,} + \beta_5 Mktcap_{i,} + \beta_6 BM_i + \beta_7 Age_{i,} + \beta_8 Aug08dummy_{i,} + \beta_9 FII_{i,} + \beta_{10} Bgroupdummy_i + \beta_{11} Promoters_i + \epsilon_i \quad (5)$$

$$CAR(-5,+5)_i = \beta_1 + \beta_2 LastqRet_{i,} + \beta_3 MF_{i,} + \beta_4 DII_{i,} + \beta_5 Mktcap_{i,} + \beta_6 BM_i + \beta_7 Age_{i,} + \beta_8 Aug08dummy_{i,} + \beta_9 FII_{i,} + \beta_{10} Bgroupdummy_i + \beta_{11} Promoters_i + \epsilon_i \quad (6)$$

Univariate T-tests to Test Difference in Firm Characteristics between Companies that Opted for Rights Issue versus QIP

To test for differences in characteristics between companies that opted for a rights issue and those that opted for QIP, we test the difference in means of the variables: CAR (−2, +2), CAR (−5, +5), CAR (−10, +10), *LastqRet*, *FII*, *MF*, *DII*, *DII*, *Promoters*, *MktCap*, *BM*, *age*, individual holdings. The motivation behind choosing the above variables has been elucidated in the section 'Regression'.

Analysis and Findings

Abnormal Returns

Table 5A reports the ARs around the announcement of rights issue. The average ARs are high and positive from −2 to +2 days. The CAARs are positive and significant from −2 days to +4 days. The large positive returns prior to the announcement suggest either that the market participants learn about the forthcoming announcement date earlier, even before it is actually announced, or they anticipate that the event is about to happen. In either case, the positive returns suggest that the rights issue event is perceived as good news. But the average ARs turn out to be negative and significant for day +3 and consistently become negative and significant from day +5 to day +10 except day +8. These results clearly show that the investors perceived this event is a cosmetic one and a non-value additive one. Once the events are over, they quickly book the short-term gains arising out of the event.

Table 5B shows the AARs and *t*-statistics around the announcement date of QIP issue. The *t*-statistic of average AR is not positive and significant for any other day except on the announcement day. The AAR becomes negative for most of the days except day +1 and +7, but these negative returns are not statistically significant except day +8. The empirical analysis does not find support for the monitoring/certification hypothesis, since these would have predicted positive and significant ARs, rather the empirical findings lend contrary evidence to the hypothesis.

Regression of QIP Announcement Returns

Table 6 reports the results of regression of the CARs of the QIPs for two periods (−2, +2) and (−10, +10) on the variables specified earlier. In the CAR (−2, +2) regression, we find the coefficient of the promoter's

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Table 5A. Abnormal Returns Associated with the Announcement of Rights Issue

Days	Average Daily Abnormal Returns (AAR)	Daily *t*-Stat AAR	Cumulative Average Daily Abnormal Returns (CAAR)	Daily *t*-Stat CAAR
−10	−0.00266457	−0.41536	−0.00266	−0.41536
−9	−0.000636002	−0.19178	−0.0033	−0.42931
−8	0.005381687	1.037396	0.002081	0.248409
−7	0.003054386	0.606662	0.005136	0.51846
−6	0.007051795	1.307414	0.012187	1.048418
−5	0.004482532	0.838563	0.01667	1.299412
−4	0.00358028	0.829691	0.02025	1.516615
−3	0.000429605	0.183885	0.02068	1.483677
−2	0.011888043	2.34285***	0.032568	2.179774**
−1	0.007388038	1.598572	0.039956	2.573428***
0	0.006159861	1.400529	0.046116	2.875943***
1	0.00655194	1.514105	0.052668	3.19059***
2	0.005416167	0.931947	0.058084	3.202986***
3	−0.017522958	−3.54594***	0.040561	2.255294**
4	0.002663778	0.489206	0.043225	2.305133**
5	−0.011569234	−2.38479***	0.031655	1.635737
6	−0.009667428	−1.91274**	0.021988	1.122991
7	−0.007902373	−2.6962***	0.014086	0.455849
8	−0.004663077	−1.0219	0.009422	0.209251
9	−0.015627483	−3.22559***	−0.00621	−0.51731
10	−0.018057787	−3.56285***	−0.02426	−1.28232

Source: Authors' calculation.

Note: This table presents the daily AARs and the corresponding *t*-statistic for the AAR over the period t_{-30} to t_{+30} and for the full sample of 125 rights issue announcements over the period of 2007–2013. Market model is used to compute the ARs: $AR_{jt} = R_{jt} - (\alpha_j + \beta_j R_{mt})$. The table also presents the CAAR. The CAARs are statistically different using a standard *t*-test. *, ** and *** indicate significance at 10, 5 and 1 per cent, respectively.

Table 5B. Abnormal Returns Associated with the Announcement of QIPs

Days	Average Daily Abnormal Returns (AAR)	Daily *t*-stat AAR	Cumulative Average Daily Abnormal Returns (CAAR)	Daily *t*-Stat CAAR
−10	0.002895	0.998282	0.002895	0.998282
−9	−0.01091	−3.76424***	−0.00802	−1.95583*
−8	0.004222	1.456066	−0.0038	−0.75627
−7	0.001759	0.606487	−0.00204	−0.3517
−6	0.00238	0.82083	0.00034	0.052514
−5	0.005482	1.890785*	0.005823	0.819849
−4	−0.00048	−0.16388	0.005348	0.697091
−3	0.00277	0.955355	0.008118	0.989838
−2	0.001594	0.549594	0.009712	1.116426
−1	−0.00194	−0.66831	0.007774	0.847798
0	0.000779	0.26855	0.008552	0.889316
1	0.000155	0.053361	0.008707	0.866859

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Days	Average Daily Abnormal Returns (AAR)	Daily *t*-stat AAR	Cumulative Average Daily Abnormal Returns (CAAR)	Daily *t*-Stat CAAR
2	−0.0041	−1.41346	0.004609	0.440829
3	−0.00157	−0.54163	0.003038	0.280036
4	−0.0042	−1.44918	−0.00116	−0.10364
5	−0.00274	−0.94541	−0.00391	−0.3367
6	−0.00161	−0.55634	−0.00552	−0.46158
7	0.00044	0.151692	−0.00508	−0.41282
8	−0.00851	−2.9361***	−0.01359	−1.07539
9	−0.00281	−0.97049	−0.01641	−1.26517
10	−0.00224	−0.77337	−0.01865	−1.40345

Source: Authors' calculation.

Note: This table presents the daily AARs and the corresponding *t*-statistics for the AAR over the period t_{-30} to t_{+30} and for the full sample of 163 QIP issue announcements over the period of 2007–2013. Market model is used to compute the ARs: $AR_{jt} = R_{jt} - (\alpha_j + \beta_j R_{mt})$. The table also presents the CAAR. The CAARs are statistically different using a standard *t*-test. *, ** and *** indicate significance at 10, 5 and 1 per cent, respectively.

Table 6. Regression of QIP Announcement Returns

Panel A

Variables	Unstandardized Coefficients	Std. Error	*t*-Stat	Sig.
(constant)	0.050	0.022	2.307	0.023
LastqRet	0.001	0.002	0.744	0.458
MF	0.000	0.001	−0.210	0.834
DII	−0.001	0.001	−0.891	0.375
mktcap	0.000	0.000	−0.592	0.555
Bm	0.003	0.004	0.657	0.513
Age	0.000	0.000	−1.412	0.160
aug08dummy	−0.012	0.012	−1.007	0.316
FII	−0.001	0.001	−0.921	0.359
bgroupdummy	0.011	0.013	0.859	0.392
promoters	−0.001	0.000	−2.100	0.038**

Source: Authors' calculation.

Nzote: The table summarizes the results of regression on CARs (dependent variable) on days (−2, +2) around the announcement day of QIP issue. The independent variables included in the model are stock returns of last quarter, proportional holdings of MFs, proportional holdings of DIIs, market capitalization, book-to-market ratio, age of the firm, proportional holdings of FIIs, proportional holdings of promoters and average trading volume. Two dummy variables representing the QIP are done after August 2008 and the firms belong to any business group. $R^2 = 0.07$; *, ** and *** indicate significance at 10, 5 and 1 per cent, respectively.

Panel B

Variables	Unstandardized Coefficients	Std. Error	*t*-stat	Sig.
(constant)	−0.0979	0.0885	−1.1053	0.2711
LastqRet	−0.0026	0.0078	−0.3271	0.7442

(Table 6 continued)

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(Table 6 continued)

Panel B

Variables	Unstandardized Coefficients	Std. Error	*t*-stat	Sig.
MF	0.0028	0.0051	0.5611	0.5757
DII	−0.0040	0.0057	−0.6946	0.4886
mktcap	0.0000	0.0000	0.1388	0.8898
Bm	−0.0054	0.0158	−0.3388	0.7353
Age	0.0009	0.0010	0.8376	0.4039
aug08dummy	0.0865	0.0491	1.7619	0.0806*
FII	−0.0004	0.0024	−0.1643	0.8698
bgroupdummy	0.0476	0.0519	0.9170	0.3609
promoters	−0.0006	0.0012	−0.4822	0.6305

Source: Authors' calculation.

Note: This table summarizes the results of regression on CARs (dependent variable) on days (−10, +10) around the announcement day of QIP issue. The independent variables included in the model are stock returns of last quarter, proportional holdings of MFs, proportional holdings of DIIs, market capitalization, book-to-market ratio, age of the firm, proportional holdings of FIIs, proportional holdings of promoters and average trading volume. Two dummy variables representing the QIP are done after August 2008 and the firms belong to any business group. $R^2 = 0.049$; *, ** and *** indicate significance at 10, 5 and 1 per cent, respectively.

holdings variable is significantly negative. As noted earlier, a QIP may be disadvantageous to 'dilution-averse' promoters. Hence, we expect that markets would react positively if QIP is made by companies that have a small promoters' stake, that is, market reacts positively for cases where despite having a lower control before the QIP, the promoters are not averse to having new institutional owners in the firm signifying their keenness in truly creating the value for the shareholders. Hence, the lower the promoter's holdings, the higher the announcement effect of a QIP. It may be that markets do not expect new QIP investors to bring in more monitoring in firms with high promoter holdings, and hence the reaction of markets to QIP by firms with high promoter's holding is not significant.

In the CAR (−10, +10) regression, we find a significant positive coefficient on the dummy variable *aug08dummy.* But this is significant at 10 per cent level only. This result implies that the formula to arrive at QIP issue price has an impact on the announcement returns. The QIPs announced after August 2008 show a positive and significant price reaction as compared to the QIPs announced before August 2008, when the QIP issue pricing formula was different.

The regression result of the other variables on the CARs of the QIP announcements for two periods (−2, +2) and (−10, +10) does not show any significant impact, and their coefficients are not statistically significant. There are no visible effects of size, book-to-market or age on the QIPs announcement returns. Similarly, there is no effect of institutional ownership on the QIP announcement returns. Therefore, this result discards the certification and monitoring effect on QIP announcements.

Choice between QIPs and Rights

Table 7 reports the results of the *t*-test of difference of means between the sample of firms that went for QIP and the sample that went for rights issues.

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Table 7. *t*-Tests of Difference in Mean of Operating Characteristics between QIP Issuers and Rights Issuers

Variable	Group	Mean	Std. Deviation	Sig. (2-tailed)
CAR(−2, +2)	QIP	0.00	0.06	0.00***
	Rights	0.05	0.11	
CAR(−5, +5)	QIP	0.00	0.09	0.18
	Rights	0.03	0.19	
CAR(−10, +10)	QIP	−0.02	0.25	0.62
	Rights	−0.04	0.29	
LastqRet	QIP	0.59	2.91	0.74
	Rights	0.46	3.16	
FII	QIP	13.12	10.86	0.00***
	Rights	4.84	7.66	
MF	QIP	4.26	4.78	0.00***
	Rights	1.91	4.01	
DII	QIP	2.54	4.69	0.40
	Rights	3.06	4.59	
TotalDII	QIP	6.80	7.30	0.05**
	Rights	4.97	6.75	
Promoters	QIP	45.18	21.31	0.07*
	Rights	39.85	23.33	
MktCap	QIP	53,620.80	119,798.18	0.14
	Rights	29,421.11	130,002.10	
BM	QIP	1.10	1.65	0.03**
	Rights	0.76	0.13	
age	QIP	31.63	25.22	0.02**
	Rights	39.48	26.49	
Individual	QIP	15.63	11.39	0.00***
	Rights	28.50	17.79	

Source: Authors' calculation.
Note: Test for equality of means of financial and operating characteristics between the firms issue QIP and firms issue right shares. *, ** and *** indicate significance at 10, 5 and 1 per cent, respectively.

The average CAR (−2, +2) is significantly higher for rights issues than for QIPs. This directly contradicts the certification and monitoring hypothesis, both of which predicts higher CARs for QIPs.

QIP issuers have significantly higher FII and MF holdings in the quarter prior to the QIPs than rights issuers in the quarter prior to the rights issue. This evidence is directly contradictory to the monitoring role of institutional investors. If firms already have institutional investors (FII or MF) holding a fraction of the firm, then monitoring benefits already exist, and we expect these firms to go for rights issue. On the other hand, if institutional investors have a tendency to herd, they would subscribe to issues which have been already subscribed to, in the past, by other institutional investors. The latter seems to be the case here. QIPs also have significantly lower individual investor holdings than rights issuers. This is a corollary to the above result, where firms with more individual holdings would choose QIPs over a rights issue as it becomes easy for the management to take decisions in favour of issuing QIPs.

We find that firms issuing rights shares have significantly lower promoter's holdings in the quarter prior to the rights issue than QIP issuers in the quarter prior to the QIP. This shows that the promoters with low holdings are dilution averse and choose a rights issue over a QIP.

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QIP issuers have significantly lower age than rights issuers. This agrees with the hypothesis that firms with more information asymmetry would choose a PP or rights issue over a QIP. Since younger firms have more information asymmetry, they choose a QIP over a rights issue.

QIPs have significantly higher B/M ratio than rights issues in the quarter prior to the QIP than rights issues in the quarter prior to the rights issue. This contradicts the proposition that QIP firms have higher growth opportunities and thus more information asymmetry than rights issuers.

Thus, we find no support for the certification and monitoring hypotheses of PPs in the Indian context. Rather, 'herd behaviour' seems to be the reason behind institutional investments in QIPs. Indian promoters with low holdings seem to be dilution averse and prefer a rights issue over a QIP. We find very limited support for the hypothesis that firms with more information asymmetry would go for a QIP over a rights issue.

Conclusion

This study explores the stock price reaction to QIP issues by Indian firms and the motivations of Indian firms behind issuing shares through QIP route vis-à-vis the rights issue route. In this backdrop, we also examine the factors determining the decision for companies to go for a QIP or a rights issue. Previous literature has shown that PPs generally have positive ARs, and this has been attributed to the monitoring and/or certification roles of institutional investors. However, we do not find any evidence of monitoring/certification role played by institutional investors for QIPs in India, rather we find negative reaction to QIP announcements over the event window of (−10, +10). Promoters in India are generally dilution averse, and hence the market reacts positively to QIP announcements from firms which have low promoter holdings a quarter before the QIP announcements. The SEBI pricing formula change of August 2008 to make QIP offer prices closer to market prices has some weak correlation with the price reaction to the QIPs issues. Regarding the determinants of choice between a rights issue and a QIP, we find that those companies that already have high institutional holdings are more likely to opt for a QIPs rather than a rights issue. This would imply institutional investors in India tend to herd while subscribing to QIPs, and do not play monitoring or certification roles.

Acknowledgements

We are grateful to the anonymous referees for many insightful comments and extremely useful suggestions to improve the quality of the article. We also thank seminar participants at the India Finance Conference (2012) held at the Indian Institute of Management, Calcutta, for helpful comments. The remaining errors are ours.

Notes

1. While FPOs are secondary equity offers to the general public at large, the rights issues are such offers to the existing shareholders to purchase additional shares on a pro rata basis of their existing holding. Private placement, on the other hand, is the issue of new shares to a small number of institutional investors.
2. In the case of preferential allotment, the shares are allotted on a preferential basis to selected group of investors, usually institutional investors. Generally, private placement is done by unlisted companies, while preferential allotment is done by listed companies.
3. SEBI is the equity market regulator in India.
4. Chapter VIII of SEBI (Issue of Capital and Disclosure Requirement) Regulation 2009.
5. Only listed companies (either listed in the NSE or BSE) having a listing history of at least one year can raise funds through QIPs. QIBs include banks, mutual funds, insurance companies, foreign institutional investors, venture capital funds, pension funds and provident funds.

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6. There is a difference between QIP and preferential allotment. In the case of preferential allotment, the subscribers are related to the promoters, but in the case of QIP, there should not be any relationship between QIBs and the promoters.
7. Lock-in period is the period during which the holder of the share is not allowed to sell his/her share in the secondary market.
8. In India, Section 81 of Companies Act 1956 states that any company that goes for a seasoned equity issue must offer the issue first to the existing shareholders, as a rights issue, in order to protect the interest of existing shareholders. If the right issue is renounced, then the company can go for QIP or other forms of secondary issues. Otherwise, the board has to pass a special resolution in the shareholder's meeting with two-thirds of the majority in favour of not to offer right share in the first place and can directly go for QIP. This law also motivates us to analyze the firm-level determinants that drive the choice between QIP and rights issue.
9. We measure the book value of assets by adding the book value of equity and debt, and market value of assets is measured by adding the market capitalization and the book value of debt. The book value of equity and debt is measured at the end of the reporting year, and market capitalization of the firm is measured in the month prior to the QIP month.

References

Balachandran, B., Faff, R., & Theobald, M. (2007). Rights offerings, renounceability and underwritten status. Working paper, Monash University, Melbourne.

Barclay, M.J., Holderness, C.G., & Sheehan, D.P. (2007). Private placement and managerial entrenchment. *Journal of Corporate Finance*, *13*(4), 461–484.

Barclay, M.J., & Litzenberger, R.H. (1988). Announcement effects of new equity issues and the use of intraday price data. *Journal of Financial Economics*, *21*(1), 71–99.

Brown, S., & Warner, J. (1985). Using daily stock returns: The case of event studies. *Journal of Financial Economics*, *14*(1), 3–31.

Choe, H., Ronald, W.M., & Nanda, V. (1993). Common stock offerings across the business cycle: Theory and evidence. *Journal of Empirical Finance*, *1*(1), 3–31.

Claessens, S., Djankov, S., & Lang, L.H.P. (2000). The separation of ownership and control in East Asian corporations. *Journal of Financial Economics*, *58*(2), 81–112.

Cronqvist, H., & Nilsson, M. (2003). Agency costs of controlling minority shareholders. *Journal of Financial and Quantitative Analysis*, *38*(4), 695–719.

———. (2005). The choice between rights offerings and private equity placements. *Journal of Financial Economics*, *78*(2), 375–407.

Dann, L.Y., & DeAngelo, H. (1988). Corporate financial policy and corporate control: A study of defensive adjustments in the assets and ownership structure. *Journal of Financial Economics*, *20*(1), 87–127.

Dyck, A., & Zingales, L. (2004). Private benefits of control: An international comparison. *Journal of Finance*, *54*(2), 537–600.

Eckbo, B.E., & Masulis, R.W. (1992). Adverse selection and the right offer paradox. *Journal of Financial Economics*, *32*(3), 293–332.

Hansan, R.S. (1989). The demise of the right issue. *Review of Financial Studies*, *1*(3), 289–309.

Hertzel, M., & Smith, R.L. (1993). Market discounts and shareholder gains for placing equity privately. *The Journal of Finance*, *48*(2), 459–485.

Jensen, M., & Meckling, W. (1976). Theory of the firm: Managerial Behavior, agency costs and ownership structure. *Journal of Financial Economics*, *3*(4), 305–360.

Kang, J., & Stulz, R. (1996). How different is Japanese corporate finance? An investigation of the information content of new security issues. *Review of Financial Studies*, *9*(1), 109–139.

Kim, E., & Purnanandam, A. (2006). *Why do investors reacts negatively to seasoned equity offerings*? Working paper, University of Michigan, US.

La Porta, R., Lopez-de-Silanes, F., & Shleifer, A. (1999). Corporate ownership around the world. *Journal of Finance*, *54*(2), 471–517.

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Loderer, C., & Zimmermann, H. (1988). Stock offering in a different institutional setting: The Swiss case, 1973–1988. *Journal of Banking and Finance*, *12*(3), 353–378.

Lukose, P.J., & Rao, S.N. (2003). Operating performance of the firms issuing equity through rights offering. *Vikalpa*, *28*(4), 25–40.

Marisetty,V.B., Marsden, A., & Veeraraghavan, M. (2006). Price reaction to right issue in the Indian capital market. SSRN Working paper, Retrieved 9 March 2014, from http://ssrn.com/abstract=984805

Myers, S., & Majluf, N. (1984). Corporate financing and investment decisions when firms have information that investors do not have. *Journal of Financial Economics*, *13*(2), 187–221.

Nenova, T. (2003). The value of corporate voting rights and control: A cross-country analysis. *Journal of Financial Economics*, *68*(3), 325–351.

Rao, S.N. (1994). The adjustment of stock prices to corporate finance policy announcements. *Finance India*, *8*(4), 941–953.

Salamudin, N., Ariff, M., & Nassir, A. (1999). Economic influence on right issue announcement behavior in Malaysia. *Pacific-Basin Finance Journal*, *7*(4), 405–427.

Srinivasan, R. (1993). Security price behavior associated with right issue related events. Doctoral Dissertation, Indian Institute of Management, Ahmedabad.

Tan, R., Chang, P., & Tong, Y. (2002). Private placements and right issues in Singapore. *Pacific-Basin Finance Journal*, *10*, 29–54.

Wang, J., Wei, K.C., & Pruitt, S. (2006). An analysis of the share price and accounting performance of rights offerings in China. *Pacific-Basin Finance Journal*, *14*(1), 49–72.

Wruck, K.H. (1989). Equity ownership concentration and firm value: Evidence from private equity financings. *Journal of Financial Economics*, *23*(1), 3–27.

Wu, Y.L. (2004). The choice of equity selling mechanism. *Journal of Financial Economics*, *74*(1), 93–119.

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