Reforming private securities litigation in China: The stock market has already cast its vote

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A R T I C L E I N F O

A B S T R A C T

This paper employs a natural experiment research design to analyze the differences in the effects of the 2002 notice concerning private securities litigation issued by the Supreme People's Court on stock price performance in A/B-share markets. Using a sample of 162 twin A/B-shares issued by 81 listed firms, we find that the portfolio of B-shares, which are treated and held in large volumes, obtains a significant positive treatment effect of 2.08% relative to that of A-shares over a 3-day event window. The treatment effect indicates that the collective action problem undermines the compensatory function of the private enforcement system, which is the primary goal it was designed to achieve. In addition, we look into the determinants of the abnormal return between A/B-shares issued by the same firm and find that the efficiency of the regional court system is positively correlated with the magnitude of the abnormal return. Rational investors expect that the compensation from private litigation is determined by the costs of using the judiciary system.

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1. Introduction

Cross-country empirical studies have shown that both public and private enforcement of securities laws contribute to stock market development (La Porta et al., 2006; Jackson and Roe, 2009).[1] With better enforcement, outside investors are willing to pay more for equity assets, as a result of which more firms are able to finance their investments externally. Private enforcement through securities class litigation has already become an important external governance mechanism and has helped to regulate corporate officials (Thompson and Sale, 2003). Although there is much empirical evidence on private enforcement of securities laws in developed countries, such as the "Private Securities Litigation Reform Act of 1995 (PSLRA)", which was enacted to curb the widespread frivolous suits and agency problems of plaintiffs' attorneys, which significantly undermined the confidence in American securities markets (Choi, 2004),[2] much less is known about reforms conducted in transitional countries.

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[1] The enforcement of laws determines the probability that an offense is caught, which transfers the "law on the book" to *de facto* deterrence. An improvement in enforcement will raise the expected costs of crimes and, hence, decrease the number of offenses committed when other factors are held constant (Becker, 1968). In addition to enforcement, the "law and finance" scholarship also identifies that the "on the book" investor protection laws facilitate stock market development, see two survey articles, La Porta et al., 2008 and Xu (2011). However, Helland and Klick (2011) comment that the statistical identification is overlooked in this strand of literature. Licht et al. (2005) show that cross-cultural psychology could be an alternative explanation for both investors' and creditors' rights. Xu and Xu (2014) further apply the Bayesian model averaging algorithm to empirical macro-law-and-finance studies, and find that the empirical conclusion that "law matters" for stock market development is fragile.

[2] The Congressional override of President Clinton's veto of the PSLRA has brought about significant positive abnormal returns for those stocks of firms in high-litigation-risk industries (Spiess and Tkac, 1997; Johnson et al., 2000). Johnson et al. (2007) report that lawsuits against forward-looking statements are significantly reduced and there is a higher correlation between merit-related factors and securities class actions post-PSLRA. However, the reform is not entirely satisfactory in achieving its goals. First, Choi (2007) shows a side effect of the PSLRA in reducing potentially meritorious suits against smaller firms and those without pre-filing "hard evidence". Second, Choi et al. (2009) find that the PSLRA succeeds in discouraging the file of nonnuisance suits, but not nuisance ones. Finally, Choi et al. (2011) reveal that law firms actively make campaign contributions to officials with influence over state pension funds, which now serve as lead plaintiffs in a

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This paper adopts a natural experiment research design and investigates the differences in the effects of the Supreme People's Court of the People's Republic of China (SPC)'s *2002 Notice Regarding Accepting Tort Cases Arising from Stock Market False Disclosure* (henceforth, *SPC's 2002 Notice*),[3] which, for the first time, explicitly allowed private securities litigations[4] to be accepted, on stock price performance in A/B-share markets. Before *SPC's 2002 Notice* was enacted, listed companies in China faced no *de facto* threats of private litigation (Hutchens, 2003; Liebman and Milhaupt, 2008),[5] although the "law on the book" generally forbade misrepresentations and provided grounds for civil compensation.[6]

The securities litigation system designed by *SPC's 2002 Notice* is compensation-oriented and differs significantly from its American counterpart, which combines the functions of both deterrence and compensation (Cox, 1997; Coffee, 2006). First, an administrative prerequisite requires that private suits should be based on sanctions of public agencies, mainly the China Securities Regulatory Committee (CSRC), or courts' criminal judgments (Hutchens, 2003; Guo and Ong, 2009).[7] In addition, *SPC's 2002 Notice* aggravates the collective action problem in shareholder litigations and requires that they should be brought as individual or joint actions, instead of US-style class actions. Furthermore, the intermediate-level courts at the place where the defendant firms are located have territorial jurisdiction (Lu, 2003), which significantly increases plaintiffs' burdens to pursue such suits. Finally, although the culpable could be listed as the defendants, they rarely pay compensations out of their own pockets, leading to the problem of circularity.

A unique feature of Chinese stock markets is that a proportion of listed firms issue legally identical "twin A/B-shares", which offers an opportunity to examine the market responses to the private enforcement system in different institutional settings. The two types of shares are ordinary shares with the same voting rights and dividends (Chan et al., 2008). However, the transactions, dividend payments, trades, and quotes of B-shares are conducted in foreign currencies: Shanghai B-shares are traded in US dollars, and Shenzhen B-shares are traded in Hong Kong dollars, which leads to different investor structures in these two markets.[8] The majority of investors in the A-share market are "scattered households" (*San Hu*), who generally hold trivial interests in listed firms and adopt a speculative strategy (Hutchens, 2003; Mei et al., 2009). These retail investors suffer from the collective action problem and are "rationally apathetic" to the right to seek compensation. In contrast, investors in B-share markets comprise mainly foreign and domestic institutional shareholders, especially privately managed investment funds raising money from the wealthy in the grey market (Bohl et al., 2010), who would have enough incentives to overcome collective action problems and file private suits.[9] With litigation rights, institutional shareholders could also employ alternative strategies, such as striking settlement agreements with potential defendant firms, if the costs of going to trial are high enough.[10]

We therefore collect a sample of 162 A/B-shares issued by 81 listed firms that undertook their IPOs on the Shanghai Stock Exchange (SHSE) and Shenzhen Stock Exchange (SZSE) before January 1, 2002, and employ regression adjustments, which are shown to significantly reduce potential biases (Cochran and Rubin, 1973; Rubin, 1973; Ho et al., 2007). A significant positive abnormal return for B-shares relative to A-shares is documented, which is approximately 2.08% over the 3-day event window after controlling for market liquidity proxy, firm-specific characteristics and industrial dummies. We further find that the magnitude of the abnormal return between B-shares relative to A-shares issued by the same firms is determined by the level of regional judiciary efficiency where listed firms are located.[11]

Our research is closely related to two recent studies on the private enforcement system of Chinese stock markets. First, Humphery-Jenner (2013) conducted an event study on the promulgation of *SPC's 2003 Provisions* and argues that given the same regulatory regime, good laws aimed at curbing misrepresentations could cause negative impacts on the information environment of the stock market in China because the negative externality of a new law outweighs its positive externality.[12] Our results provide

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substantial number of cases. These contributions tend to undermine the PSLRA's efforts to mitigate the agency problems of plaintiffs' attorneys.

[3] See *Zuigao Renmin Fayuan Guanyu Shouli Zhengquan Shichang Yin Xujia Chenshu Yingfa de Minshi Qinquan Jiufen Anjian Youguan Wenti de Tongzhi* (promulgated by the SPC, January 15, 2002, effective January 15, 2002) (P.R.C.). *SPC's 2002 Notice* only set out general features of the private litigation system, a subsequent provision, *2003 Provisions Concerning the Adjudication of Civil Compensation Securities Cases Based upon Misrepresentation* (henceforth, *SPC's 2003 Provisions*), was issued to provide detailed guidance to private securities litigation, see *Guanyu Shenli Zhengquan Shichang Yin Xujia Chenshu Yinfade Minshi Peichang Anjian de Ruogan Guiding* (promulgated by the SPC, January 9, 2003, effective February 1, 2003) (P.R.C.).

[4] The private suits governed by *SPC's 2002 Notice* include those against misrepresentations in the stock market and exclude those due to insider trading and market manipulation.

[5] Li Guoguang, the deputy president of the SPC, commented that none of the civil claims brought and filed in the people's courts between 1991 and 2002 due to misrepresentations, market manipulation, or insider trading was continued to the state of substantial hearings. See *Gaofa Fuyuanzhang Li Guoguang Xishuo Guojia Jinrong Anquan de Sifa Baozhang* [*Deputy President of the Supreme People's Court Li Guoguang Talks in Detail about Judicial Protection for the State Financial Safety*], NEWS WEEKLY, July 23, 2002, available at http://www.people.com.cn/GB/shizheng/19/20020723/782456.html (last access on 23/12/2014, in Chinese).

[6] See Gupiao Faxing yu Jiaoyi Guanli Zanxing Tiaoli [Tentative Regulations on Administration of the Issuing and Trading of Shares] (promulgated by the State Council, April 22, 1993, effective April 22, 1993) (P.R.C.).

[7] CSRC made a small number of enforcement actions. Chen et al. (2005) report that CSRC performed 169 regulatory actions against listed companies in 4 years post the *1999 Securities Law*, i.e., approximately 42 cases per year, which is confirmed by the study carried out by Liebman and Milhaupt (2008) on cases from 2001 to 2006. In addition, Huang (2013) shows that CSRC made 253 sanctions for misrepresentation from 2002 to 2011, amounting to approximately 25 cases annually. The limited outputs generate concerns that while such procedural hurdles may exclude frivolous suits, they may also screen out potential meritorious ones for compensation (Hutchens, 2003; Guo and Ong, 2009; Lu, 2003). However, Layton (2008) argues that the administrative prerequisites should bring value to listed firms, considering the capability of the judiciary system and the long history of public-oriented regulation.

[8] To be specific, we mean investors of tradable shares, which consist of "new shares issued in IPOs and seasoned cash offerings and those derived from tradable shares in rights offerings and stock splits" (Liao et al., 2014: 502). The tradable shares were held mainly by outside investors before the *Reform of the Split-Share Structure* beginning in 2005. Non-tradable shares were held mainly by the State and legal persons, who are also the controlling shareholders of listed firms.

[9] Institutional investors in American markets also leave money on the table, due to the failures in the notification process and monitoring of the custodian to file the claims (Cox and Thomas, 2002, 2005). However, the problem indentified may not matter in China, because the information for administrative sanctions and criminal judgments is available to the general public. Institutional investors are able to identify those cases satisfying administrative prerequisites.

[10] Firth et al. (2011b) survey the lawsuits involving listed firms and report that plaintiff firms suffer from negative abnormal return on the event date, which they ascribe to the daunting litigation costs offsetting the expected return from judgments.

[11] Regional judiciary efficiency also matters for the expected compensation of settlements because it relates to the comparative bargaining power of the two parties. The minimum benefits of injured investors are the expected compensation of going to trial, which equals the actual loss minus the costs of using the court system. If the regional court system is inefficient, going to trial could be expected to generate negative return for investors with small stakes. Anticipating this, rational defendant firms are unlikely to reach an agreement with aggrieved investors.

[12] The identification assumptions employed by Humphery-Jenner (2013) should be taken cautiously. First, Polinsky and Shavell (2000) conclude that public enforcement of the law is better than private enforcement when victims are not aware of who injured them. Following their thinking, Bhattacharya and Daouk (2009) acknowledge that public enforcement has advantages in protection against insider trading and private enforcement in securities fraud when infringers are known. Hence, *SPC's 2003 Provisions*, which aim at improving private enforcement against

some counter-evidence that the new private enforcement system at least delivers positive value to investors in the B-share market.

Second, Huang (2013) reports that only 25.7% (65/253) of eligible cases, *i.e.*, those cases with administrative sanctions or criminal judgments against misrepresentation, are brought to court. This ratio is extraordinarily low given that recovery should be straightforward in theory. Liebman and Milhaupt (2008: 943) comment that "the prospect of recovery is simply too small to justify the expense, time, and effort required to bring suit."[13] Aggrieved investors are rationally apathetic to the private litigation rights and "vote with their feet" because collective action problems are severe. Huang argues that the inefficient court system is the major barrier to the effective compensation of aggrieved investors. Our work provides evidence supporting his argument.

The article proceeds as follows: Section 2 discusses the institutional background of *SPC's 2002 Notice* and testable hypotheses. Section 3 presents the data, and Section 4 describes the results of our empirical analysis. Section 5 concludes our paper.

2. Institutional background and hypotheses

2.1. Institutional background

Listed firms in China faced few threats of private litigation before *SPC's 2002 Notice* was issued, although legal rules "on the book" generally forbade misrepresentations and provided grounds for civil compensation. Compensation for aggrieved investors was overlooked during this time. The SPC even promulgated the *Notice Concerning Temporarily Not Accepting Civil Compensation Cases Related to Securities* (*SPC's 2001 Notice*) on September 21, 2001,[14] instructing lower courts to refuse acceptance of civil compensation cases related to securities due to current legislative and judicial limitations.[15]

The deterrence function is assumed mainly by the public enforcer of securities laws, CSRC, which is responsible for investigating potential offenses of securities laws and imposes administrative liabilities.[16] However, CSRC appears to be short of disposable resources. According to disclosed data, the annual budget of CSRC was 134.84 million dollars in 2012,[17] whereas its American counterpart, the Securities and Exchange Commission (SEC), spent 1.29 billion dollars that year.[18] After adjusting to the stock market capitalization, the normalized budget of the SEC is approximately 69.09 dollars per million market capitalization, whereas for CSRC, the normalized budget is 36.47 dollars per million market capitalization.[19] Compared to the cross-country data reported by Jackson and Roe (2009), CSRC's annual budget of 16,319.98 dollars per billion dollars of GDP ranks relatively low in their sample. As a result of the limited budget, the regulatory output in China is small compared to that in the US. As reported in Table 3 of Jackson (2007: 280), the SEC imposed approximately 639 sanctions per year from 2002 to 2004. In contrast, CSRC enforced approximately 40 actions per year against listed companies post the *1999 Securities Law* (Chen et al., 2005; Liebman and Milhaupt, 2008).[20]

SPC's 2002 Notice was issued about four months after the promulgation of *SPC's 2001 Notice*, which completely changed its previous position and allowed courts to accept suits brought on the ground of misrepresentation,[21] provided that CSRC had administratively sanctioned the company,[22] *SPC's 2002 Notice* was unexpected by the market and an exogenous event because public agencies rarely negate their previous decisions within such a short time. In Chinese culture, inconsistent behaviors are considered to be humiliating and detrimental to public authority. Furthermore, *SPC's 2002 Notice* was not designed to cater to those firms issuing both A-shares and B-shares because various interested parties, such as law firms, investors and CSRC, all tried to lobby the SPC to change its decision.

The established private litigation system has the following features. First, due to administrative prerequisites, it is designed to compensate aggrieved investors rather than assume the functions of both deterrence and compensation. Additionally, the intermediate-level courts at the place where the defendant firms are located have territorial jurisdiction, which significantly increases the costs of pursuing civil compensation. Third, *SPC's 2002 Notice* pays no attention to the collective action problem in shareholder litigation. It instead aggravates the problem and requires that these suits should only be brought as individual actions or joint actions, not as US-style class actions. Hence, aggrieved investors need to opt into the proceedings. Finally, although those culpable could be listed as the defendants, they rarely pay compensations from their own pockets, which leads to the problem of circularity.

To shed light on the details of private securities litigations, we survey the cases of securities misrepresentations against 29 defendants brought to court from December 11th, 2013, to September

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misrepresentation, are more likely to generate net positive externalities. Second, *SPC's 2003 Provisions* promulgated on January 9, 2003 were actually passed at the 1261th Meeting of the Judicial Committee of the Supreme People's Court on December 26, 2002. It is possible that information is leaked to the market, which could contaminate the event. Finally, though Asian countries share many common characteristics, it is unlikely that Chinese state-owned enterprises are "similar in nature" to matched firms listed on the Hong Kong Stock Exchange, the Taiwan Stock Exchange, or the Korean Stock Exchange.

[13] See Hutchens (2003: 649–652) for descriptions on the time and monetary costs related to private litigations. He points out that even the minor requirement that plaintiffs' original national identification cards (*shenfen zheng*) or a notarized copy should be provided to the court could prevent a significant portion of aggrieved investors from pursuing the litigation.

[14] See *Zuigao Renmin Fayuan Guanyu She Zhengquan Minshi Peichang Anjian Zan Buyu Shouli de Tongzhi* (promulgated by the SPC, September 21, 2001, effective September 21, 2001) (P.R.C.)

[15] CSRC criticized *SPC's 2001 Notice* when it was promulgated, see Pistor and Xu (2005).

[16] The monetary fine imposed by CSRC is limited. For example, according to Article 177 of *1998 Securities Law*, issuers committing misrepresentations face monetary penalties ranging from 300,000 RMB to 600,000 RMB. However, the criminal penalties could be severe. As noticed by Chen et al. (2005), the culpable could be sentenced to death for cooking the books. CSRC also use the instrument of reviewing applications for public offerings to discipline listed firms (Clarke, 2010). An additional complement to CSRC's enforcement efforts is the action of stock exchanges, such as public criticisms, which impose significant reputational costs (Liebman and Milhaupt, 2008).

[17] See *The 2012 CSRC Annual Budget Report*. The budget is adjusted to dollars utilizing the exchange rate 6.2855 of December 31, 2012.

[18] The number is drawn from the SEC website under the account actual obligation; see http://www.sec.gov/foia/docs/budgetact.htm, last access 2014/10/10.

[19] The data for annual stock market capitalization are drawn from the website of the World Bank; see http://data.worldbank.org/indicator/CM.MKT.LCAP.CD?order=wbapi_data_value_2012+wbapi_data_value+wbapi_data_value-last&sort=desc (last access 10/10/2014). The market capitalization in 2012 for the US was 18,668,333 million dollars, whereas for China, the amount was 3697,376 million dollars.

[20] However, this number could underestimate the regulatory output of CSRC, as two sources of cases are not made public: CSRC does not disclose cases that result in no actions and those minor infractions handled by private caution and censure, for example, by issuing "correction orders".

[21] Hutchens (2003) notes that victims of concealed positive information are likely to fall out of legal protection because the causality between false disclosure and investors' losses is found only when they buy securities after the false disclosure is made and sell securities after the misrepresentation is publicly revealed.

[22] Article 5 of *SPC's 2003 Provisions* expands the ground for private litigation and includes those administrative sanctions made by other agencies that are empowered to impose administrative sanctions and criminal judgments determined by courts.

14th, 2015, and collect information on 1603 plaintiffs and their attorneys.[23] Nearly all plaintiffs are individuals and no institutional investors in A/B-share markets are involved in these suits. Table 1 reports the distribution of the number of plaintiffs by represented law firms and defendants.[24] We admit that caution needs to be exercised in interpreting our data because the sample is small and the results of the private bargaining outside the courtroom are not available. Hence, only some preliminary statistical analysis is performed in this subsection. The number of defendants is small compared to that in the American markets, where 144 and 161 federal securities class actions against misrepresentations in financial documents were filed in 2012 and 2013, respectively.[25]

Even when satisfying administrative prerequisites, 170 plaintiffs lose their cases, which is due to the calculation of damages. In addition, 182 plaintiffs voluntarily drop their cases, although most of them have to pay the court costs. The data suggest that defendant firms adopt a screening strategy to solve disputes with retail investors. They wait until aggrieved investors bring actions to the court, which reveals the private information concerning their expected costs and benefits. Then defendants could settle with those active investors who, according to their evaluations, are highly likely to win the case.

Very few plaintiffs are legal entities, which could be ascribed to the significant costs of using the court system. They would seek alternative mechanisms, such as making private agreements with potential defendant firms. Regional judiciary efficiency is also related to the expected compensation from private bargaining because it determines the comparative bargaining power of the two parties. The minimum compensation is the expected gain from going to trial, which serves as a reference point for the agreement.

Entrepreneur lawyers unsatisfactorily solve the collective action problem, as shown in the last row of Table 1 that far fewer than 1% of shareholders of listed firms brought cases against defendants. A large number of harmed investors are "rationally apathetic" to the right granted by SPC's 2002 Notice, which leads to a shortage of demand for legal services. In addition, the last column reports that the market is highly concentrated and the top 3 law firms make up approximately 66% of the market for securities civil litigation. The "opt-in" feature imposes significant economic obstacles to gathering small claims together and limits the expected number of plaintiffs that could be represented by a given law firm.

The agency problem of plaintiffs' attorneys further compromises their role as representatives. Most minority investors do not have knowledge on the expected damages allowed, which leads to asymmetric information between shareholders and their attorneys. The claimed damages are consequently inflated both to encourage aggrieved investors to file suits and to generate larger contingent fees. However, the costs of inflated claimed damages are assumed by plaintiffs. The losing parties are liable for the prevailing parties'

court costs, which are calculated according to the claimed damage instead of the allowed one. If investors lose the case, they have to pay the court costs calculated with claimed damages, which are often not negligible. If they win the case, they also have to pay for the proportion of the court costs calculated according to the difference between claimed and allowed damages. The significant court costs further reduce the compensation and the incentives of injured investors to opt into the civil proceedings.

In sum, although SPC's 2002 Notice granted aggrieved investors with the right to seek compensation from those firms undertaking misrepresentation, retail investors seem to be apathetic to these rights. Entrepreneur lawyers fail to solve the collective action problem satisfactorily. On one hand, unlike US-style class actions, in which injured investors are automatically opted into the class and bounded by any agreements reached by the class and defendants unless they expressly opt out, aggrieved investors need to actively opt into securities litigations in China. On the other hand, the agency costs of plaintiffs' attorneys further reduce the expected compensation from the civil litigations. Hence, retail investors are unlikely to pay premiums for the right to seek compensation.

2.2. Hypothesis

Our research is based on the institutional setting in which a proportion of listed firms issued legally identical "twin A/B-shares", to which SPC's 2002 Notice is equally applied (Hutchens, 2003). A/B-shares are both ordinary shares with the same voting rights and dividends, but the transactions, dividend payments, trades, and quotes of B-shares are conducted in foreign currencies: Shanghai B-shares are denominated in US dollars and Shenzhen B-shares in Hong Kong dollars, which generates an interesting institutional variations that could be employed to test the market responses to the private enforcement system.[26] Due to daunting transaction costs, it is highly unlikely that investors could arbitrage between A/B-share markets during the event window. First, there was foreign exchange control in China, and buying foreign currencies was regulated at that time. In addition, short-selling was prohibited on both markets. Third, foreign investors were allowed to trade on only the B-share markets. Hence, investors could not short sell A-shares and buy B-shares issued by the same firm and earn the risk-free rate of return.

The majority of investors in the A-share market are "scattered households", who generally hold trivial interests in a listed firm and adopt a speculative strategy (Hutchens, 2003; Mei et al., 2009). As shown in the previous subsection, these retail investors suffer from collective action problems and are "rationally apathetic" to bringing private securities litigations, even with administrative sanctions. Given the significant costs, it would be less cost effective for them to pursue compensation than to sell the stock and "vote with their feet". Hence, the right to bring private litigation should be worthless to retail investors in the A-share market.

In contrast, both foreign and domestic institutional investors have greater stakes at risk in the B-share market. Bohl et al. (2010: 192) have noted that "wealthier Chinese are more likely to have the US dollar accounts necessary to engage in B-share trading", and they usually invest in the B-share market through privately managed investment funds. In their study on investors' trading

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Table 1
The number of plaintiffs by law firm and defendant.

Plaintiff's attorney	Baoan Hongji Real Estate Group Co., Ltd.	Jian Chen (indiv)	Foshan Electrical Lighting Co., Ltd.	Hanwang Technology Co., Ltd.	Hubei Wuchangyu Co., Ltd.	HuaWen Media Investment Group Co., Ltd.	Nanjing Textiles Import & Export Co., Ltd.	Ningbo Fubang Jingye Group Co., Ltd.	Shandong Jingbo Holding Co., Ltd.	Shanghai SK Petroleum & Chemical Equipment Co., Ltd.	INESA (Group) Co., Ltd.	Shenzhen Energy Group Co., Ltd.	Weifang Yaxing Chemical Co., Ltd.	Yan Xian (indiv)	GCL System Integration Technology Co., Ltd.	Xinjiang Chalkis Co., Ltd.	Yunnan Yuntou Ecology and Environment Technology Co., Ltd.	Miscellaneous	Total
Beijing Weiming LLP	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	12
Beijing Yingke LLP	6	0	64	11	0	0	5	0	0	0	0	0	0	0	2	0	27	0	115
Beijing Vlaw LLP	0	0	15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15
Guangdong Benben LLP	6	0	63	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	69
Guangdong Grand Leeson LLP	0	0	14	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14
Guangdong Int'l Business LLP	0	0	8	8	0	0	0	0	0	0	1	0	0	0	0	12	0	0	29
Guangdong Jing Tian LLP	0	0	13	0	0	0	0	0	0	0	0	9	0	0	0	0	0	0	22
Shanghai Jiesai LLP	19	0	354	5	0	0	4	0	9	3	71	0	1	0	5	38	1	0	510
Shanghai Orient Cambridge LLP	0	14	157	53	11	0	8	5	0	1	35	0	3	8	8	0	0	0	303
Shanghai Huarong LLP	0	0	96	6	0	0	6	47	0	12	3	0	1	0	47	0	24	2	244
Shanghai Huiye LLP	0	0	1	0	0	61	0	23	0	0	0	0	0	0	0	0	6	7	98
Shanghai Jialanda LLP	0	0	98	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	98
Zhejiang Yufeng LLP	0	0	15	5	0	0	0	0	0	1	0	0	0	0	0	0	0	0	21
Others	0	0	31	1	7	0	0	4	0	0	0	0	0	0	0	0	0	10	53
Total	31	14	930	89	18	61	23	79	9	17	110	9	5	8	62	50	69	19	1603
Percentage of total shareholders	0.04%	N.A.	0.60%	0.24%	0.06%	0.03%	0.19%	0.35%	0.14%	0.06%	0.17%	0.01%	0.02%	0.02%	0.11%	0.09%	0.46%	N.A.	N.A.

Note: (a) Those defendants against which fewer than five suits are brought are classified into the group titled "Miscellaneous". (b) Those law firms representing fewer than 10 clients in total are classified into the group titled "Others". (c) The number of plaintiffs represented is counted according to law firms instead of lawyers. To avoid double counting, the information on the first instance and the second instance is recorded once. (d) To calculate the "Percentage of total shareholders", the number of shareholders disclosed in the annual report of the listed firms at the time when CSRC made the sanctions is used. It is worth noting that occasionally, the shareholders of the listed firms controlled by the defendants could bring cases instead of those of the defendant firms.

patterns, Chan et al. (2008: 177) confirm that stocks in the B-share market are held and traded in larger volumes than those in the A-share market because institutional investors trade in larger sizes in the B-share market.[27] Due to their higher expected return, institutional investors have stronger incentives to overcome the collective action problem and are expected to pursue civil compensation. Of course, they are not bound to use the court system if it is too expensive and could seek alternative mechanisms, such as negotiating settlement agreements with potential defendants. The expected compensation from the court system is important for the bargaining process because it is a reference point for the agreement. When other factors are constant, the compensation from a more efficient court will generate larger net expected benefits, which will grant injured shareholders stronger bargaining power. As a result, it is hypothesized that *SPC's 2002 Notice* had a disproportional positive impact on the B-share market. We therefore postulate that the private enforcement system is valued higher in the B-share market than in the A-share market.

Hypothesis 1. (*Collective action problem):* The portfolio of B-shares gains positive abnormal returns relative to that of A-shares issued by the same firm during the event windows because the collective action problem is better handled in the B-share market.

Huang (2013) demonstrates that only one-fourth of eligible cases are brought to court and argues that the costs due to an inefficient court system outweigh the straightforward recovery. According to Article 5 of *SPC's 2002 Notice*, courts at the place where the defendant firms are located have territorial jurisdiction. Listed firms usually have good relationships with the local government, which controls the court system. Hence, investors should be willing to pay lower premiums for B-shares of listed firms located in regions with lower court efficiency because they are likely to pay higher costs to obtain civil compensations.

Hypothesis 2. (*Court efficiency):* The magnitude of the abnormal returns of B-shares relative to A-shares issued by the same firm is positively correlated with the efficiency of the court in the region where listed firms are located.

3. Sample and empirical strategy

We mainly focus our investigation on a sample of listed firms issuing twin A/B-shares, which are legally identical. The following algorithm is adopted to select the sample shares. First, we collect data for all A/B-shares listed on the SHSE and SZSE, which undertook their IPOs before December 31, 2001, from Wind Information Co., Ltd., one of the major providers of financial data for listed firms in China.[28] Then, we exclude those stocks that suspended trading on January 15, 2002. Finally, those firms issuing only A-shares or B-shares are excluded. As a result, our main data set includes 162 A/B-shares issued by 81 listed firms. Table 2 reports the distribution of sample firms by industry and province. One potential caveat, which could compromise the external validity of our analysis, is that two thirds of our sample firms are located in Guangdong Province and the city of Shanghai, where the two exchanges are located.

In our natural experiment setup, B-shares expected to be affected significantly by *SPC's 2002 Notice* are the treatment group, whereas A-shares are the control one, which also serves as

the benchmark when estimating the abnormal returns. Hence, a dummy variable TREATMENT is created to indicate whether a given share is a B-share or A-share. If it is a B-share, we set TREATMENT to 1, and 0 otherwise. We use two different event windows, 1 day and 3 days [−1,1], where day 0 is January 15th, 2002, to calculate the cumulative return (CR), which is then employed as the dependent variables to test Hypothesis 1. In addition, to test Hypothesis 2, we use the cumulative abnormal return (CAR) as the dependent variable, which is estimated with the controlled share model as follows:

$$CAR_i = \sum_{T=-t}^{T=t} CR_{i,1} - \sum_{T=-t}^{T=t} CR_{i,0} \qquad (1)$$

where i stands for the ith firm, t equals either 0 or 1, and $CR_{i,1}$ and $CR_{i,0}$ represent the raw daily return of the B-share and A-share issued by the ith firm.

To adjust for differences in pre-treatment features, we also control for the following set of variables in our multivariate models. First, the A/B-shares issued by the same firm could differ in their liquidity, as a result of which the daily turnover ratio (TURNOVER) averaged over half a year prior to the event date, from July 15, 2001 to January 14, 2002, is included. In addition, given the fixed costs of filing the private litigation, only high expected value claims are worth pursuing (Choi, 2007). Hence, we include the market capitalization (MCAP) of listed firms. Third, those firms reporting higher profits in the previous year are more likely to have enough assets to pay for compensations to aggrieved investors. Consequently, we include the earnings per share (EPS) as reported in the 2001 semi-annual report. Fourth, the state owned enterprises might have particularly large influence on the local courts, which should increase the expected costs of private litigations and discourage investors from seeking compensation. We, therefore, include the percentage of shares held by the state in a given firm (STATE).

Fifth, the efficiency of the judiciary system should correlate to the expected costs of bringing private securities litigation as suggested by Huang (2013). We thus employ the development index of the market intermediaries and legal environment in 2001 reported by Fan and Wang (2003) as a proxy for the efficiency of local courts (CE2001). Sixth, Firth et al. (2011a) find that listed firms having high leverage ratios are more likely to commit financial misrepresentations. Hence, we include the liability to asset ratio (LARATIO) as reported in the half year report in 2001. Seventh, we also control for two financial indicators, the price to book ratio (PB) proxy for growth opportunities and return on equity (ROE), as reported in the 2001 semi-annual financial report. Finally, industrial dummies are included to control for possible industry fixed effects. The descriptive statistics and definitions of these variables are reported in Table 3.

4. Empirical results

This section presents empirical outputs testing the hypotheses developed in Section 2. Section 4.1 tests Hypothesis 1 on the collective action problem, whereas Section 4.2 reports the empirical outputs testing Hypothesis 2 on the determinants of abnormal returns between A/B-shares issued by the same firm.

4.1. Collective action problem

Table 4 reports the OLS regression outputs with CRs as dependent variables utilizing our main sample of 162 stocks. Columns 2–3 present the basic regressions with 1-day and 3-day CRs against TREATMENT, industrial dummies and a constant term. On the event date, the group of B-shares gains approximately 1.21% more in market value compared to that of A-shares, significant at the 1% level,

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[27] Part of the difference in trading patterns could be ascribed to institutional factors. The minimum trading volume of B-shares is 1000 shares, approximately ten times greater than that of A-shares on the SHSE. However, the minimum trading volume of B-shares is 100 shares, the same as that of A-shares on the SZSE.

[28] We obtain the data for 1254 listed A/B-shares, among which 114 are B-shares and 1140 are A-shares.

Table 2
The number of listed firms by industry and province.

Provinces	Industries								
	Materials	Industries	Consumer discretionary	Consumer staples	Health care	Finance	Information technology	Utilities	Subtotal
Anhui	0	0	2	1	0	0	0	0	3
Beijing	0	0	0	0	0	0	1	0	1
Guangdong	2	5	5	1	1	7	1	1	23
Hainan	0	1	0	0	0	1	0	0	2
Hebei	0	0	0	0	0	0	1	0	1
Heilongjiang	0	0	0	0	0	0	0	1	1
Hubei	2	0	0	0	0	0	0	0	2
Hunan	0	0	1	0	0	0	0	0	1
Jilin	0	0	1	0	0	0	0	0	1
Jiangsu	0	1	2	0	0	0	0	0	3
Liaoning	1	2	0	0	0	0	0	0	3
Neimengru	0	1	0	0	0	0	0	0	1
Shandong	1	0	1	1	0	0	0	0	3
Shanxi	0	0	0	0	0	0	0	1	1
Shanghai	3	11	6	2	2	6	2	0	32
Tianjin	0	1	0	0	0	0	0	0	1
Zhejiang	0	0	0	0	0	0	1	0	1
Chongching	0	0	1	0	0	0	0	0	1
Subtotal	9	22	19	5	3	14	6	3	81

Note: The industry classification provided by WIND Information Co., Ltd. is adopted.

Table 3
Variable definitions and summary statistics.

Variable	N	Mean	Std. Dev.	Min.	Max.	Definition
Dependent variables						
$CR_{(0)}$	162	−1.94754	2.307006	−9.9776	1.6227	Raw cumulative share price return on the event day
$CR_{(−1,1)}$	162	−4.19158	4.076124	−27.0434	3.3898	Raw cumulative share price return over the 3-day event window
$CAR_{(0)}$	81	1.2137	2.4496	−3.9880	7.0768	Cumulative abnormal return of B-share to A-share issued by the same firm on the event day
$CAR_{(−1,1)}$	81	2.4204	3.8606	−6.7773	11.3610	Cumulative abnormal return of B-share to A-share issued by the same firm over the 3-day event window
Independent variables						
TREATMENT	162	0.5000	0.5016	0.0000	1.0000	Dummy variable (=1 for B-share, 0 otherwise)
TURNOVER	162	0.8313	0.4030	0.1186	2.6381	Average daily turnover ratio for a given stock over half a year prior to the event date
MCAP	162	3.5856	0.2206	3.1765	4.3129	Logarithm of market capitalization in million RMB for a given firm as of 14th Jan., 2002
EPS	162	0.0999	0.1473	−0.3170	0.9956	Earnings per share as reported in the 2001 semi-annual financial report
STATE	162	35.6096	21.9391	0.0000	73.5247	The percentage of shares held by the government
CE2001	162	7.0038	2.4228	2.2900	9.4200	The regional judiciary efficiency level as reported in Fan and Wang (2003)
LARATIO	162	47.2482	20.2561	8.8966	99.3211	The liability to asset ratio as reported in the 2001 semi-annual financial report
PB	162	5.001003	7.543794	0.8546	72.5278	The price to book ratio as reported in the 2001 semi-annual financial report
ROE	162	0.7508	20.9714	−181.3774	15.1682	The return on equity ratio as reported in the 2001 semi-annual financial report
TURNOVER(B/A)	81	0.1822	0.6093	−2.1592	1.5474	The Napierian Logarithm of the ratio between TURNOVER of B-share to that of A-share issued by the same firm
PB(B/A)	81	−0.5332	0.2132	−1.2285	−0.0209	The Napierian Logarithm of the ratio between PB of B-share to that of A-share issued by the same firm

as shown in the second column. The positive treatment effect for B-shares increases to 2.42% when the event window is set to 3 days. The results of basic regressions are consistent with Hypothesis 1, which states that investors in the B-share market value the right to seek civil compensation higher than those in A-share market do.

The literature has shown that the potential biases of the estimated treatment effects will be reduced if pre-event features are controlled for (Cochran and Rubin, 1973; Rubin, 1973; Ho et al., 2007). We thus first include the variable TURNOVER proxy for the difference in liquidity between A-shares and B-shares in our model specification. Domestic investors have been allowed to buy and sell B-shares since February 19, 2001, which lead to a sharp increase

in the trading volume in the B-share market. The average daily turnover ratio for B-shares is 0.87 and that for A-shares is 0.79. Additionally, we include MCAP, EPS, STATE and CE2001 to control for the firm-specific characteristics that could influence the expected costs and benefits of private litigations, the results of which are shown in Columns 4–5.

The outputs remain similar to those of the basic regressions. In column 4, the treatment effect for the group of B-shares increases to approximately 1.30% on the event date and is highly significant (t-stat = 3.82). The variable TURNOVER is shown to have significant negative coefficients, which suggests that more liquid stocks actually gain less on the event date. Furthermore, consistent

Table 4
Regression outputs testing the collective action problem hypothesis.

Variable	$CR_{(0)}$	$CR_{(-1,1)}$	$CR_{(0)}$	$CR_{(-1,1)}$	$CR_{(0)}$	$CR_{(-1,1)}$
TREATMENT	1.21373[***]	2.420431[***]	1.295873[***]	2.454306[***]	1.183505[***]	2.084638[***]
	(0.342308)	(0.6094994)	(0.3375841)	(0.6042116)	(0.3537663)	(0.6068643)
TURNOVER			−1.036012[*]	−0.4272408	−0.9036373	0.2114237
			(0.5672843)	(0.9524042)	(0.6025543)	(0.8940987)
CE2001			0.0130168	0.0722295	0.0145969	0.0886853
			(0.0840954)	(0.1565225)	(0.082744)	(0.152693)
EPS			1.150675	3.902661[*]	0.5389276	1.702179
			(0.9096238)	(2.258654)	(0.9051433)	(2.216733)
MCAP			1.474869[*]	3.891488[***]	1.526744[*]	3.680032[***]
			(0.7760931)	(1.237036)	(0.8208349)	(1.302592)
STATE			−0.0118952	−0.0138908	−0.0162278[*]	−0.0224649
			(0.0079842)	(0.0138408)	(0.0085739)	(0.0142706)
LARATIO					0.0119285	0.0206633
					(0.0105708)	(0.0177688)
PB					−0.03436[**]	−0.1076038[***]
					(0.0140337)	(0.0225908)
ROE					0.0147266[***]	0.0481093[***]
					(0.0049895)	(0.0088076)
Constant	−1.571865[***]	−4.322515[***]	−6.373432[**]	−18.90978 [***]	−6.795192[**]	−18.57694[***]
	(0.4178163)	(1.024967)	(2.882236)	(4.722698)	(3.112863)	(5.082238)
Industrial dummies	Included	Included	Included	Included	Included	Included
Observations	162	162	162	162	162	162
R^2	0.1537	0.1397	0.2315	0.2246	0.2528	0.2984

Note: (a) The model is specified as follows: $CR_{(-t,+t)} = \alpha + \beta_0 \times TREATMENT + \beta_1 \times X + \varepsilon$, where "$X$" represents the vector of controlling variables. (b) The robust standard error is reported in parentheses.
[*], [**], [***] Indicate 10%, 5%, and 1% levels of significance, respectively.

with the findings of Choi (2007), larger firms indeed experience higher treatment effects on the event day as the coefficient of the MCAP is significant and positive. Although slightly insignificant (*p*-value = 0.138), the variable STATE has a negative coefficient, which is in accordance with the prediction that governmental connections should have negative effects on the expected net profits of private litigations. CE2001 is insignificant and indicates that it does not influence the absolute daily returns. In column 5, the coefficient for TREATMENT is increased to 2.45% during the 3-day event window (*t*-stat = 4.07). The liquidity proxy, TURNOVER, is no longer significant, but the MCAP proxy for the size of the firm and the EPS proxy for profitability are both significant and positive in magnitude.

Finally, we include controls for additional pre-event financial indicators, LARATIO, PB and ROE, the results of which are reported in Columns 6–7. Generally speaking, the empirical outputs are consistent with those reported in previous columns. The coefficients of TREATMENT are positive and significant, but adjusted downwardly. The variable MCAP is significant in both columns, which provides strong evidence for the size effects. The coefficients of STATE are negative. It is significant in Column 6, although the reported *p*-value in Column 7 is slightly larger than the 10% significance level (*p*-value = 0.118).

The significant and positive coefficients of the variable TREATMENT confirm Hypothesis 1, which hypothesizes that the group of B-shares gains a positive treatment effect relative to that of A-shares issued by the same firms. In the B-share market, investors face different payoffs from private litigations and have higher expected returns from seeking civil compensation because they hold and trade in larger volume. Thus, they are more likely to exercise the right to seek civil compensation granted by *SPC's 2002 Notice* and assign higher value to such rights.

4.2. Court efficiency hypothesis

In this subsection, we test Hypothesis 2, which supposes that the abnormal returns of B-shares relative to A-shares issued by the same firms are determined by the judiciary efficiency of the region where the listed firm is located. The dependent variables are CARs

calculated with Eq. (1), and thus, the sample size is reduced to 81 listed firms. In addition, we calculate the relative turnover ratio and price to book ratio[29] between B-shares and A-shares with the following Eqs. (2) and (3), respectively:

$$TURNOVER\left(\frac{B}{A}\right)_i = LN\left(\frac{TURNOVER_{i,1}}{TURNOVER_{i,0}}\right) \quad (2)$$

$$PB\left(\frac{B}{A}\right)_i = LN\left(\frac{PB_{i,1}}{PB_{i,0}}\right) \quad (3)$$

where $TURNOVER_{i,1}$ is the average daily turnover ratio for the B-shares issued by the ith firm over half a year prior to the event date, $TURNOVER_{i,0}$ is the average daily turnover ratio for the A-shares issued by the ith firm during the same period, and $PB_{i,1}$ is the price to book ratio of the B-shares issued by the ith firm, $PB_{i,0}$ is the price to book ratio of the A-shares issued by the ith firm, both of which are reported in the 2001 semi-annual financial report.

The empirical outputs are shown in Table 5. In Columns 2–3, we present the univariate regressions with 1-day and 3-day CAR against CE2001 and a constant term.[30] The outputs demonstrate that court efficiency is positively correlated with the magnitude of abnormal returns in the event period. CE2001 is significant in both regressions and its coefficients are 0.245 and 0.393 during the 1-day and 3-day event windows, respectively. The results indicate that listed firms located in regions with efficient judiciary system obtain higher positive abnormal return on the event date, which provide supporting evidence to Hypothesis 2 postulating that the efficiency of court systems determines the net expected benefits from civil litigations.

We next assess whether the results of univariate regressions are robust to the inclusions of multiple pre-event firm-specific characteristics. First, in Columns 4–5, we control for the difference in liquidity of "twin shares" and include the variable

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[29] The difference in price to book ratio between A-shares and B-shares results from the fact that B-shares are traded at a discount relative to A-shares.
[30] All of the industrial dummies are insignificant, and we hence exclude them from our model specification.

Table 5
Regression outputs testing the court efficiency hypothesis.

	$CAR_{(0)}$	$CAR_{(-1,1)}$	$CAR_{(0)}$	$CAR_{(-1,1)}$	$CAR_{(0)}$	$CAR_{(-1,1)}$	$CAR_{(0)}$	$CAR_{(-1,1)}$	$CAR_{(0)}$	$CAR_{(-1,1)}$
CE2001	0.245264**	0.3930957**	0.2307658**	0.3784904**	0.2225717**	0.3422343*	0.2846137***	0.418756**	0.2442264**	0.3328647
	(0.103587)	(0.1791056)	(0.1068921)	(0.1829177)	(0.1078999)	(0.1803831)	(0.1011579)	(0.1964777)	(0.1120288)	(0.2015181)
TURNOVER (B/A)			−0.6154129	−0.6199523					−0.574813	−0.377921
			(0.4678056)	(0.6362394)					(0.5220549)	(0.68628)
MCAP					1.295927	2.921245*			1.038273	3.087565*
					(1.31989)	(1.631505)			(1.338936)	(1.604999)
EPS					2.168463	2.923781			1.595103	3.1702
					(1.468871)	(2.275297)			(1.562925)	(2.567481)
STATE					−0.0046332	−0.0102842			0.0062424	−0.005796
					(0.0133372)	(0.0203214)			(0.0155087)	(0.0239907)
LARATIO							−0.0193386	−0.0110858	−0.018031	0.0015122
							(0.0134453)	(0.021517)	(0.0139167)	(0.0197831)
PB(B/A)							0.7625371	0.5957403	0.8846481	0.4990285
							(1.309432)	(1.987354)	(1.419989)	(2.23926)
ROE							−0.0019949	−0.0057989	−0.008836	−0.014023
							(0.0066444)	(0.0098428)	(0.006236)	(0.009981)
Constant	−0.5040573	−0.3327432	−0.2904017	−0.1175116	−5.043353	−10.37666	0.5421066	0.3332983	−3.166242	−10.81782*
	(0.7157893)	(1.395711)	(0.747523)	(1.406961)	(4.536107)	(5.962706)	(1.005026)	(1.510122)	(4.833871)	(5.934551)
Industrial dummies	Not included	Not included	Not included	Not included	Not included	Not included	Not included	Not included	Not included	Not included
Observations	81	81	81	81	81	81	81	81	81	81
R^2	0.0592	0.0612	0.0824	0.0707	0.0991	0.1130	0.0869	0.0653	0.1315	0.1219

Note: (a) The model is specified as follows: $CAR_{(-t,+t)} = \alpha + \beta_0 \times CE2001 + \beta_1 \times X + \varepsilon$, where "X" represents the vector of controlling variables. (b) The robust standard errors are reported in parentheses.
*, **, *** Indicate 10%, 5%, and 1% levels of significance, respectively.

TURNOVER(B/A). CE2001 still has significant positive coefficients, the magnitudes of which are similar to those reported in Columns 2–3. However, the coefficients of the variable TURNOVER(B/A) are insignificant in both regressions and present no significant effects on the CARs.

Second, the variables that are proxies for the potential benefits and costs of pursuing the securities litigation are included. Choi (2004) notes that due to significant fixed costs involved in these litigations, only firms above a minimum size will be sued, either frivolously or meritoriously. Hence, we include MCAP to control for such size effects. In addition, those firms suffering from annual losses may lack the assets to pay the civil compensation, as a result of which we include EPS, a proxy for the profit level of the listed firms. Finally, it could be extremely costly for aggrieved investors to seek compensation from state owned enterprises, which usually have good relationships with local governments, and hence enjoy special advantages in lobbying local courts. Consequently, we include the variable STATE to control for the potential adverse effects from the governmental connection. The results are shown in Columns 6–7. Again, CE2001 has positive and significant correlations with the CARs. The only variable that has a significant relationship with the dependent variable is MCAP, the coefficient of which is positive in magnitude as shown in Column 7.

Third, we control for the financial indicators of a given firm and include variables LARATIO, PB(B/A) and ROE, the results of which are reported in Columns 8–9. The coefficients of CE2001 are consistent with those reported in the previous regressions, and their significance even increases in both regressions. However, none of the financial indicators have a significant relationship with the dependent variables. Finally, we run a "horse race" and include all of these variables in the model specification. The results are presented in Columns 10–11. In Column 10, CE2001 is shown to have a coefficient of 0.244 and is significant at the 5% level. The remaining controlling variables are all insignificant. In addition, the coefficient of CE2001 is approximately 0.333 in Column 11, but is slightly insignificant with a *p*-value of 0.103. Furthermore, MCAP has a significant and positive relationship with the CAR over a 3-day event window.

The findings in Table 5 provide supporting evidence for Hypothesis 2 and the arguments made by Huang (2013) that

inefficient court system prevents aggrieved investors from seeking civil compensation. According to the coefficient of CE2001 in the last column of Table 5, a one-point improvement in the indicator for court efficiency constructed by Fan and Wang (2003) will bring an approximate 0.333% increase in the CAR over a 3-day event window. Given the same *de jure* rules, rational investors expect the variation in *de facto* protection due to the quality of regional court system. They are willing to pay premiums for those rights that could be enforced cheaply. Hence, efficient court system could bring additional value to the government-lead enforcement system of securities law in China.

5. Conclusion

SPC's 2002 Notice was designed primarily to compensate aggrieved investors suffering from misrepresentations by listed firms. However, the compensatory function is poorly achieved because retail investors suffer from the collective action problem, which is due to the overwhelming costs of using the Chinese court system. In this paper, we demonstrate that the private enforcement rights are valued higher by investors in the B-share market, where the majority are institutional investors, including foreign institutional investors and privately managed investment funds, which hold and trade in large volumes. In addition, we find that regional judiciary efficiency is positively correlated with the magnitude of abnormal returns between B-shares and A-shares issued by the same firms during the event periods after controlling for various pre-event firm-specific characteristics. Rational investors expect the variation in the *de facto* protection. Investors of B-shares issued by the firms in regions with more efficient court system are willing to pay higher premiums for the right to seek civil compensation, because they anticipate that the right could be enforced.

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