The Raymond Ackerman Family Chair

in Israeli Corporate Governance

Working Paper No. 033

The Choice Between Various Freeze-Out Procedures and Its Consequences

Beni Lauterbach

Bar-Ilan University

Yevgeny Mugerman

Bar-Ilan University

Barak Yarkoni

Tel-Aviv University

November 2020

THE CHOICE BETWEEN VARIOUS FREEZE-OUT PROCEDURES AND ITS CONSEQUENCES

by

Beni Lauterbach*, Yevgeny Mugerman**, and Barak Yarkoni***

November 2020

Abstract

We study freeze-outs in Israel where merger regulation is similar to the U.S., yet tender procedure is extremely simple and does not involve committees, boards, regulator or court intervention. Using a relatively large sample of 349 freeze-out offers in 2000-2019, we find that tender offers: 1) are the preferred technique; 2) are on average the cheapest for controlling shareholders; and 3) suffer from a relatively large (40%) offer rejection rate. This evidence appears different than the U.S. evidence on all counts, which illustrates that the tender offer venue is a delicate one that can be tuned in different directions. The tenderness of tender offers also explains why Delaware has often debated and amended its law and jurisdiction regarding freeze-out tender offers.

* *Corresponding author:* School of Business Administration, Bar-Ilan University, Ramat Gan 52900, ISRAEL, and ECGI. E-mail: beni.lauterbach@biu.ac.il
** School of Business Administration, Bar-Ilan University, Ramat Gan 52900, ISRAEL. E-mail: yevgeny.mugerman@biu.ac.il
*** Zvi Meitar Center for Advanced Legal Studies, Tel Aviv University, Tel Aviv 6997801, ISRAEL. E-mail: brkyrk@gmail.com

We have benefited from the comments of Sharon Hannes and Kobi Kastiel. All remaining errors are our own. Financial support by the Raymond Ackerman Family Chair in Israeli Corporate Governance is gratefully acknowledged.

THE CHOICE BETWEEN VARIOUS FREEZE-OUT PROCEDURES AND ITS CONSEQUENCES

Abstract

We study freeze-outs in Israel where merger regulation is similar to the U.S., yet tender procedure is extremely simple and does not involve committees, boards, regulator or court intervention. Using a relatively large sample of 349 freeze-out offers in 2000-2019, we find that tender offers: 1) are the preferred technique; 2) are on average the cheapest for controlling shareholders; and 3) suffer from a relatively large (40%) offer rejection rate. This evidence appears different than the U.S. evidence on all counts, which illustrates that the tender offer venue is a delicate one that can be tuned in different directions. The tenderness of tender offers also explains why Delaware has often debated and amended its law and jurisdiction regarding freeze-out tender offers.

JEL classification: G32; G34; G38

Keywords: Going private transactions; controlling shareholders; mergers; tender offers.

1. Introduction

Over the past two decades, delisting from the exchange has become a relatively popular choice for many public companies all over the world – see Figure 2 in Doidge, Karolyi and Stulz (2017). Several studies, such as Gao, Ritter and Zhu (2013), Kahle and Stulz (2017), and Doidge, Kahle, Karolyi and Stulz (2018) attribute this trend to a myriad of possible reasons including: 1) the increase in concentration of U.S. markets that made many small- and medium-size public firms less viable; 2) increasing regulatory requirements (SOX, for example); 3) the rise of the economy of scope, according to which small firms can become more profitable when merged into a large company that enables them to scale up more quickly and efficiently; and 4) the emergence of capital-raising alternatives for small- and medium-size private firms, for example, the surge in private equity funds. In sum, the net benefit of staying an exchange-listed firm has diminished, and various going private legal procedures have become popular.

Corporate law affords several possible venues by which a publicly listed company might go private. It can be acquired by or merged into a private company, or it can be taken private by its controlling shareholders (or other investors) buying all public shares and delisting the stock from the exchange. Merger and acquisitions are the most popular going private mechanisms in the U.S. – see Doidge et al. (2018), while freeze-outs (acquisition of all public shares by the controlling shareholders) are popular in markets with concentrated-ownership public firms – see Lauterbach and Mugerman (2020), for example.

We focus on freeze-out techniques. The two main freeze-out mechanisms are tender offers and mergers. In tender offers, controlling shareholders offer to buy all

minority shares at a price that is typically higher than the existing market price (a premium over market price). If enough minority shareholders tender their shares and the controlling shareholders reach a threshold holding (of 90% of firm equity, for example) the rest of the minority shareholders are forced to sell their shares to the controlling shareholders at the offer price.[1]

In the alternative (reverse triangular) merger venue, the public firm is acquired and merged into a company fully owned by the controlling company, and usually the acquisition price is negotiated by a special committee of independent directors (SC in short) and approved by a majority of the disinterested shareholders (majority-of-the-minority, or MOM in short). In the U.S., such a special committee and a majority of the minority vote exempt the firm from an entire fairness review by the court. Restrepo (2018) presents evidence suggesting that the SC + MOM combination is a fair replacement, i.e., yields similar results as the entire fairness procedure.

While the U.S. freeze-out merger regulation has remained relatively stable over the past two decades, with only the MFW case from 2013 (declaring that the SC+MOM are a formal substitute of an entire fairness review) as an exception,[2] U.S. tender freeze-out regulation and judicial treatment have been rather fluid if not choppy. In 2001 (Siliconix case), tenders were exempt from entire fairness, a decision partially reversed in 2002 (Pure Resources case) that recommended MOM as a safeguard against entire fairness, and in 2010 (CNX Gas case) that empowered the SC.[3] Later on, in 2014, the

[1] This second-stage coerced selling is executed using the short-form merger procedure.
[2] In re MFW S'holders Litig., 67 A.3d 496, 524–36 (Del. Ch. 2013), *aff'd sub nom.* Kahn v. M & F Worldwide Corp., 88 A.3d 635 (Del. 2014). .
[3] In re Siliconix Inc. S'holders Litig.,No. Civ. A. 18700, 2001 WL 716787 (Del. Ch. June 19, 2001); In re Pure Resources Inc., Shareholders Litigation 808 A.2d 421 (Del.Ch. 2002); In re CNX Gas Corp. S'holders

Delaware General Corporation Law (DGCL) have allowed a new "hybrid" technique based on Section 251(h) of DGCL. This new freeze-out technique, called sometimes an intermediate-form merger, is essentially a tender offer negotiated with a SC and approved by a MOM tendering their shares.[4] This new tender technique has since become the most popular tender technique – see Butwin, Kwon, Messina, Sullivan, Warner and Zhang (2019), for example.

Delaware's search for the optimal legal freeze-out tender procedure is not new. Ever since Grossman and Hart (1980) and Bebchuk (1987), Delaware is aware of the different character and perils of tender offers when compared to mergers. The purpose of our study is to add evidence on the efficacy and consequences of the tender freeze-out venue versus other possible freeze-out techniques. We study an economy where the bifurcation between the two traditional freeze-out techniques, mergers and tender offers, appears most extreme. In Israel, tender offers involve very little regulation and formalities. Controlling shareholders may announce a tender offer to the public with no prior Board of Directors' discussion, with minimal disclosure (a short document detailing offer terms and a few price history statistics), and with no court or regulatory intervention or prior consent. In contrast, the merger freeze-out procedure is much like the current one in the U.S., including special committee negotiations and a majority of the minority approval requirement. The almost free of hurdles Israeli freeze-out tender offer procedure should provide interesting evidence on the potential effects of an extremely lenient form

Litig., 2010 WL 2291842 (Del.Ch May 25, 2010).

[4] See the review and discussion in Sanchez, Razzano and McGurty (2014) who view 251(h) as a development in tender offer legislation. https://www.paulhastings.com/docs/default-source/PDFs/stay-current-251h-tender-offers.pdf.

of freeze-out tender offers' regulation. Our Israeli sample, comprising 349 freeze-out offers in 2000 - 2019, is also larger than that of any previous study of freeze-outs.

We find that most controlling shareholders elect the simple and quick tender offer venue for taking their company private. Tender offers are also on average cheaper for controlling shareholders than the alternatives, yet they suffer from a relatively large (40%) offer rejection rate. This Israeli evidence is different than the U.S. evidence of preference for mergers, and higher completion rates and somewhat higher premia in freeze-out tender offers (relative to freeze-out mergers) - see Restrepo and Subramanian (2015) Table 1 Panel B. We suggest that the lighter tender offer regulation standards of Israel are responsible for these findings. In Israel, due to the "soft" tender offer procedure (that does not require even a board discussion), some controlling shareholders may attempt to buy public shares at relatively low premiums, and the suspicious public responds by rejecting offers more often. In any case, our evidence demonstrates that the tender offer freeze-out procedure is a relatively flexible venue that needs to be tuned up carefully and perhaps continuously. This is our most important conclusion, and it explains Delaware's continuous quest for an optimal tender procedure.

We also split our sample into two, the first and second decade of the 21st century. The second decade manifests a significant drift towards the more meticulous procedures of mergers and court-directed Schemes of Arrangements, a convergence in the premiums paid in freeze-out tender offers and mergers, and a decrease in the overall number of freeze-out transactions. If these findings are a result of the regulatory reforms and steady advance in Israeli corporate governance over the past two decades, our study also contributes evidence on the externalities of improved corporate governance.

Section 2 presents a concise background on freeze-out offers, reviews the Israeli environment, and develops our hypotheses. Section 3 describes the sample and data. Section 4 reports our empirical results, and discusses their potential implications. Section 5 concludes.

2. Background

2.1. Freeze-out techniques and their consequences

2.1.1 Alternative freeze-out techniques in the U.S.

Over the past two decades the U.S. merger procedure of freeze-outs has remained fairly stable. The only significant change occurred in 2013 when in the MFW case it was determined that merger freeze-outs can be exempt from the stringent entire fairness review providing they employ two measures: 1) a SC (Special Committee of independent directors) negotiates merger terms with the controlling shareholders, and 2) a MOM (Majority of the Minority shareholders) ratifies the merger deal. This judiciary change was anticipated, as it was mentioned in dicta in 2005 in the Cox Communication case,[5] and deal makers had responded to it since 2005 (Restrepo and Subramanian, 2015).

In contrast, the U.S. tender offer procedure and legal treatment of freeze-out tender offers have been less clear and more fluid. This is because tender offers are in general a more flexible mechanism than mergers and can be misused – see Bebchuk (1987). In 2001, Delaware court decision on Siliconix determined that tender offers are not subject to entire fairness review. This court decision was criticized by Subramanian

[5] In re Cox Communications, inc. Shareholders litigation, 879 a.2d 604 (Del. Ch. 2005).

(2005), and was partly reversed in 2002 when in the Pure Resources case the court laid-out a list of pre-conditions for freeze-out tender offers, without which a tender offer would be considered coercive and subject to the entire fairness review. Then, in the 2010 CNX Gas case, the court elevated the status of the SC in tender offers, effectively granting it a veto power. Last, in 2013 the Delaware General Corporate Law (DGCL) was amended. It added DGCL section 215(h) that states that a tender offer accepted by a majority of shareholders (50%), can be followed by an immediate merger that does not require any shareholders' vote. In 2014, another amendment to the DGCL clarified that Section 251(h) also applies to freeze-out tender offers. This was an important change because prior to it, U.S. tender freeze-outs required controlling shareholders to reach a threshold of 90% of firm equity before they could successfully consummate the going private deal.

The changes in the judicial treatment of freeze-out tenders affected their relative attractiveness. Subramanian (2007) and Restrepo (2013) demonstrate how the Siliconix 2001 decision led to a surge in freeze-out tender offers relative to freeze-out mergers. Similarly, the 2013-14 change in the tender legal treatment was warmly embraced by the market – see Boone, Broughman, and Macias (2017).

Subramanian (2007) examines the deal structure choice, i.e., the choice between merger and tender freeze-outs. Running a Probit analysis, he finds that tender freeze-outs are more likely in larger deals and when controlling shareholders' pre-deal proportion in firm's equity is higher. In a later study, Restrepo and Subramanian (2015) do not find any relation of deal structure to deal size. Thus, the only solid evidence is that when pre-deal controlling shareholders proportion in firm's equity is larger, tender offer freeze-outs become more likely.

The logic that explains this deal choice finding is straightforward. Before 2014's adaptation of Section 251(h) to freeze-outs, controlling shareholders needed to reach a threshold of 90% of firm stock before being able to coerce completion of a tender freeze-out deal. Now, as controlling shareholders' stake in the firm increases, their distance to the 90% threshold shortens, that is they need less (and also a lower proportion of) minority shareholders to tender their shares in order to reach the threshold. Given that controlling shareholders naturally prefer the simpler and faster tender offer venue, their likelihood of choosing a tender freeze-out increases as their "distance to success" decreases (i.e., when their pre-deal holding proportion increases).

2.1.2. Economic consequences of the freeze-out deal structure

Subramanian (2005) elaborates the pros and cons of freeze-out deals. On the one hand, these transactions can serve legitimate business purposes. For example, buying out minority shareholders can facilitate synergies with other companies affiliated with the controlling shareholder, or may enable controlling shareholders to pursue their idiosyncratic vision that would probably be blocked by minority shareholders (Goshen and Hamdani, 2016). Further, delisting the company can save the compliance costs associated with being a publicly-traded company subject to onerous regulation, and it can conceal sensitive information about the firm from competitors and the public.

On the other hand, even when there is a genuine business rationale for taking the firm private, the controlling shareholders may exploit their informational advantage to time the offer and buy minority shares at a price that does not reflect their fair value (Bebchuk and Kahan, 2000). The law protects minority shareholders against expropriation by controlling shareholders in various ways some of which are detailed in

the previous subsection. However, traditionally, the legal protection procedure of freeze-out tender offers has been lighter because of the belief that tender offers are voluntary transactions, hence when a majority of shareholders tenders their shares they essentially vote to approve the deal.

The interesting economic variables to watch are thus the offer acceptance or completion rate, and the premium paid to minority shareholders upon freeze-outs. Regarding premiums, Subramanian (2007) reports that in 2001-2005 (post-Siliconix and pre-Cox period) premiums in freeze-out mergers tended to be higher than those of freeze-out tender offers (possibly because of the less demanding judicial review standards of tender offers at the time). However, following the Cox resolution in 2005 that signaled a "unified" approach to tenders and mergers, freeze-out merger and tender deal premiums and minority shareholders' gains (stock abnormal return) on offer announcement have converged (Restrepo and Subramanian, 2015). The above evidence is consistent with the thesis that the law and legal procedures protect minority shareholder from controlling shareholders' expropriation – when legal procedures are relatively loose, minority shareholder lose (receive a smaller premium).[6]

Regarding freeze-out offer acceptance rate, Restrepo and Subramanian (2015) report completion rates of 73% and 70% for merger freeze-outs before and after 2005 respectively. Completion rates for tender freeze-outs are in general higher – 87% and 77% before and after 2005 respectively. The higher completion rates of freeze-out tender

[6] At this junction, it appears worthy to note Restrepo (2018) who documents that the MFW's 2013 change in the freeze-out merger treatment (the drop of the entire fairness requirement for mergers that employ SC + MOM), did not change the premia paid to minority shareholders. Apparently, on average, SC+MOM provide a similar level of minority shareholder protection as the entire fairness procedure.

offers resemble the findings regarding regular mergers and tender offers. Offenberg and Pirinsky (2015) report completion rates of 89% and 79% for regular tender offers and mergers, respectively. Offenberg et al. (2015) explain that the higher completion rates may emanate from tender offers' relatively fast completion time, trimming down the risks of market condition changes and of material firm-specific news emergence. The period during which dissenting shareholders can organize is also cut. Hence, ceteris paribus, tender freeze-out deal completion becomes more certain.

2.2. The Israeli environment

Unlike in the U.S., the Israeli law does not require any board discussion or vote on going private tender offers. Boards are also not required to state that the offer price is fair. Further, controlling shareholders making a freeze-out tender offer have no extensive disclosure requirements, and make their offers directly to minority investors. Perhaps as an offset, Israeli law requires that controlling shareholders own at least 95% of the company's shares, before coercing the rest of minority shareholders to sell their shares.[7]

Some minor legal adjustments to going-private tender offers were introduced in 2011 by Amendment 16 to the Israeli Corporate Law. Before 2011, Israeli law granted appraisal rights to all minority shareholders, while after it only dissenting shareholders have appraisal rights. In addition, another clause of Amendment 16 demands a majority of the minority (MOM) approval (i.e., tendering) for successfully completing a freeze-out tender offer. The new MOM requirement constitutes only a trivial modification of the law because even before 2011 the Israeli law effectively demanded a majority of the

[7] By law, only single class shares trade in Israel. Therefore, 95% holdings in equity = 95% of the vote.

minority (MOM) approval for tender freeze-outs.[8] Thus, in our opinion, Amendment 16's modifications do not represent a significant change in the law treatment of freeze-outs.

In comparison to tender offers, freeze-out mergers in Israel require a rigorous procedure much like that of the U.S. This includes special committees of independent directors' negotiations with controlling shareholders, board approval, a majority of the minority (MOM) approval and vast public disclosure. Table A.1 in the Appendix highlights the key characteristics of the tender and merger freeze-out procedures in the U.S. and Israel.

In addition, there exists a third freeze-out procedure – a court-directed agreement between the company and its shareholders using Article 350 of the Israeli Corporate Law. This procedure, conventionally referred to as a Scheme of Arrangements, requires a 75% super-majority vote approval by minority shareholders, and is governed by the court that hears dissenting shareholders and decides on the final terms of the transaction. Schemes of Arrangements are prevalent and serve diverse purposes in many law systems – see Payne (2014), for example.

Only a small minority of the firms elected this third freeze-out technique. For example, in 2010, out of the 14 freeze-out transactions initiated, 11 were tender offers, two were reverse-triangular mergers and one was conducted via the court-directed Scheme of Arrangement (Article 350, in short) procedure.

[8] The Israeli law does not allow controlling shareholders to hold over 90% of a public company's shares while it demands 95% holdings to affect the freeze-out. Thus, even before Amendment 16 at least half of minority shares needed to be tendered for a successful completion of a tender freeze-out offer. Talking to some legal experts, we heard that before 2011 there were a few cases where parties related to the controlling shareholders (for example firm's CEO) held some shares, and hence the controlling shareholders needed less than a majority of the true untainted minority. The Amendment blocks such rarely observed schemes.

Last, it is noteworthy that most (between 80% and 90% of) publicly traded firms in Israel, and all the firms in our sample have controlling shareholders. Typically, the firms in our sample had an initial public offer at the beginning of the 1990s when the Israeli stock market was booming. With time, the firms that did not grow opted out, as the costs of staying listed exceeded the benefits. The most popular delisting mechanisms in Israel were the going-private freeze-out deals. 2.3. Hypotheses development

2.3.1. Freeze-out deal structure

Based on previous literature (e.g. Subramanian, 2007) we propose

Hypothesis 1: Controlling shareholders' with relatively low pre-deal holdings will choose (or resort to) the more exacerbating merger freeze-out procedure.

When controlling shareholders have relatively low holdings, the relatively less demanding procedure of a tender offer is less attractive because they have to convince a large proportion of the minority to bid their shares. For example, if the controlling shareholder holds 50% of company shares, then a tender offer will be accepted only if more than 90% ($\frac{95-50}{100-50}$) of the minority shareholders will actively send a note of acceptance of the tender offer. In comparison, if controlling shareholders' pre-deal holdings are 80%, the acceptance rate guaranteeing offer success decreases to 75% ($\frac{95-80}{100-80}$).

2.3.2. Offer premium

Our hypotheses regarding offer premium and offer acceptance probability are based on the recognition that controlling shareholders are the ones who initiate the freeze-

out deal and choose its procedural form. In general, public investors are suspicious about freeze-out offers because they need to take into account the possibility that controlling shareholders time the offers, i.e. offer to purchase all shares when the stock is undervalued.

There are at least two factors that promote public suspicion. First, when a freeze-out offer is made after a period of stock underperformance, public's disquiet about the possibility of timing increases. Second, when there is less public information about the firm, because of its small size for example, information asymmetry between public and controlling shareholders as well as public apprehension are amplified. Thus, we propose

Hypothesis 2: Accepted offers' premiums are negatively correlated with firm size and pre-offer stock performance.

The premium paid to minority shareholders should also depend on deal structure. Tender freeze-outs in Israel are fast and involve little formalities. In contrast, merger and Article 350 freeze-outs involve a lengthy and ordinate process that affords minority shareholders' hold-outs and other measures that squeeze a higher premium from controlling shareholders. This implies

Hypothesis 3: In Israel, accepted offers' premiums are lower in tender freeze-outs (relative to other freeze-out mechanisms).

The above hypothesis is restricted to our sample because in the U.S. freeze-out tender procedures are more demanding, and in terms of minority shareholder protection are almost equivalent to merger freeze-out (the Delaware "unified" approach). In the U.S. other factors such as time to completion probably generate higher premiums in tender

offers relative to mergers (Offenberg and Pirinsky, 2015). This makes our Hypothesis 3 even more interesting because if confirmed it would show that the tender offer legal formulation has a non-trivial impact on its end results.

2.3.3. Offer completion rate

The special committee negotiations with controlling shareholders (in mergers) and court's intervention (in Article 350 freeze-outs) tend to calm down minority shareholders' suspicions, and increase their willingness to complete the freeze-out process. Likewise, controlling shareholders will choose a lengthy and costly freeze-out technique such as a merger or Article 350 freeze-out only if it enhances freeze-out success probability. Thus, both minority- and controlling-shareholders perspectives evoke

Hypothesis 4: In Israel, offer completion rates are lower for tender freeze-outs (relative to other freeze-out mechanisms).

Notably, Hypotheses 3 and 4 can also be developed under the premise that some controlling shareholders behave opportunistically. Given that tender offers' regulation in Israel is so light and given the minimum procedure that a tender offer requires, some controlling shareholders may be tempted to attempt freeze-out tender offers at unfair prices. If some of these opportunistic tender offer attempts succeed, some freeze-out tender offers are completed at below-par premiums, and the average premium of completed freeze-out tender offers becomes lower than its counterpart in merger freeze-outs (Hypothesis 3). It is also likely that some of the opportunistic unfair tender offers are identified and are rejected by the public. This should increase the overall rejection rate among tender freeze-out offers (Hypothesis 4).

Finally, freeze-out offer acceptance or completion rates may also depend on a set of other variables. First, offer acceptance rate could increase with offer premium. The more generous the offer is (higher premium) the better are its successful completion chances. Second, given the more abundant public information about large public firms, we expect minority shareholders to suffer from lesser information asymmetry regarding these firms. Thus, minority shareholders are probably less reluctant (rationally and psychologically) to agree to freeze-out offers from large firms. Third, when firm stock pre-deal performance is relatively poor, minority shareholders suspicion that controlling shareholders time the offer increases. Consequently, they tend to reject freeze-out offers that follow periods of abnormally low stock performance. Last, when controlling shareholders pre-offer holdings in the firm are relatively high, they need to convince less (and a lower proportion of) minority investors to accept their offer. This should make successful completion more probable.

The above discussion suggests

Hypothesis 5: The probability of successfully completing a freeze-out offer increases with stock pre-offer performance, firm size, controlling shareholders pre-offer holdings and the premium (over current market price) offered.

2.4. Contribution of the study

We contribute to the debate on the prudent form of freeze-out tender offers. Over the past two decades Delaware's law and jurisdiction have been somewhat hesitant about the desirable format of tender offers in general and freeze-out tender offers in particular. By examining a country where the freeze-out merger procedure is similar to that of the

U.S., yet the freeze-out tender procedure is markedly different, we provide evidence on how variations in the tender offer procedure might impact the ultimate consequences. Our results confirm the sensitivity of the tender procedure to its technical details, a sensitivity that justifies Delaware's continuous effort to tune up the tender offer law. Our evidence also affords some interesting observations on the efficacy of bifurcating freeze-outs into mergers and tender offers.

Another potential contribution of the study evolves from our comparison of the first two decades of this century. Over the past twenty years Israeli freeze-out regulation and jurisdiction have been rather stable. However, a series of broad corporate governance reforms and increased media attention to the topic have improved the corporate governance of Israeli firms. We examine how various freeze-out parameters such as deal structure, offer premium and offer completion rate have changed over time. If these changes were affected by the improved corporate governance, then our evidence documents some positive externalities of improved corporate governance. Possibly, the atmosphere generated by improved corporate governance affects business behavior in general.

3. Sample

3.1. Sample construction

All our data is collected from the Tel Aviv Stock Exchange (TASE) web site. We search Maya (TASE web site section that assembles all public company announcements) for freeze-out offers, and find 349 announcements of such offers in 2000-2019, including 289 tender offers, 40 reverse triangular mergers, and 20 court-directed Schemes of

Arrangements. From these offer announcements we extract information about the offer price and the controlling shareholders' holdings in the company on the eve of the offer. If the offer price is revised before the offer deadline, we use the revised offer price. The Maya section also serves to download the annual reports of the companies for the pre-offer year, from which we extract information on firm's size (total assets), net profit and total debt. From another section of the TASE web site we collect stock return data and our company industry classification.

The sample firms are relatively small, and almost all of them belong to the small firm (Yeter) index of TASE. They also do not represent well the industry distribution of TASE firms. The sample industry distribution is as follows (in parentheses we report the TASE corresponding figures): merchandising – 28% (14%), manufacturing – 22% (15%), real estate – 25% (21%), investment and holding – 17% (11%). Interestingly, our sample does not include any technology firm, and encompasses relatively few banks and financial services firms.

3.2. Descriptive statistics

Table 1 presents descriptive statistics for our freeze-out sample. The sample comprises concentrated-ownership firms. At the end of the quarter preceding the offer, the mean (median) controlling shareholder holdings is 80.4% (84.2%) of firm's equity. These holdings appear somewhat higher than the typical holdings of controlling shareholders in Israeli public firms. The average control group holdings in Israeli firms that have controlling shareholders in a period (1999-2011) that overlaps most of our sample period (2000-2019) is about 75% – see Abudy and Lauterbach (2015). More importantly, there appear to be some pre-offer ownership differences between tenders and

other (merger + Article 350) freeze-outs. The mean controlling shareholders' holdings before the offer is 82.6% for tenders and 69.9% for the other freeze-out offers. These differences are expected (consistent with our Hypothesis 1), and will be examined more closely later on.

The average total assets of all sample firms is 1,139 million New Israeli Shekels (NIS), which given an average exchange rate of about 3.97 NIS per U.S. Dollar during the sample period, equals about 287 million U.S. Dollars. When we split the sample according to deal structure, tender offers appear associated with smaller firms. The mean total assets of firms with tender offers is 895 million NIS while the mean total assets of firms with other (merger + Article 350) freeze-out offers is 2,251 million NIS. Median total assets' differences are however much smaller and statistically insignificant.

Prior to the offer, the sample firms typically exhibit poor financial performance, with a mean (median) Return on Assets (net profits divided by total assets) of -1.8% (2.5%, respectively), and a below-market stock price performance. The mean (median) weekly net of market return of the sample firms in weeks -55 through -6 relative to the offer announcement is -0.27% (-0.14%). Poor performance is demonstrated by both tender and other freeze-out offer firms with no significant dependence upon deal structure. Insignificant differences are also found in firms' leverage (debt/total assets). The mean (median) leverage of our sample firms is 68.3% (65.5%).

(Insert Table 1 about here)

Table 1 also reviews the basic attributes of the freeze-out offers. In our sample, offer acceptance rate is 65% only. This relatively low completion rate is due to the 40% rejection rate of tender offers. Other (merger + Article 350) freeze-out offers' failure rate

is only 12%. The 40% tender offers' rejection rate is higher than in the U.S. – see, for example, the about 20% U.S. deal rejection rates reported in Table 1 of Restrepo and Subramanian (2015). It is also lower than the 11% and 15% rejection rates documented in Norway (Bøhren and Krosvik, 2013) and Italy (Bajo, Barbi, Bigelli and Hillier, 2013), respectively. In contrast, our sample merger (and Article 350) offers' failure rate of 12% appears much smaller than the about 30% failure rate in U.S. freeze-out mergers (Restrepo and Subramanian, 2015)

Next we examine the distribution of the freeze-out offer premiums. The mean offer price premium (over stock's price six trading days prior to the tender offer announcement) is 26.5% (the median is 18.8%).[9] Offer premia appear higher in merger (and Article 350) offers. The mean (median) premium offered in tender freeze-outs is 24% (18.2%), statistically significantly lower than the respective mean (median) premium of 38.7% (26.1%) recorded in other freeze-outs. This finding is consistent with our Hypothesis 3, and it will be further analyzed in the rest of our empirical work.

Last, we present descriptive statistics for accepted offers' premium only. Accepted offers' premiums appear slightly higher than offer premiums, yet they exhibit similar behavior and identical patterns.

[9] The choice of stock price on day -6 relative to the announcement is designed to moderate the bias introduced by potential information leakage in the days preceding the freeze-out offer announcement.

4. Evidence on Freeze-out Methods and Their Consequences

4.1. The choice between a tender offer and its alternatives

Table 2 reports the number of tender and non-tender freeze-out offers in the overall twenty years sample period and in each of the two decades it spans: 2000-2009 and 2010-2019. Tender freeze-out offers outnumber merger and Article 350 offers in the overall sample and in each of the decades. In the overall period, the proportion of tender offers in total freeze-out offers is 82.8% (289 out of a total of 349 offers). In the subperiods we observe some variation: the proportion of merger and Article 350 offers in total offers increases from 11.7% in the first decade to 25.2% in the second decade. The increase in the proportion of the more meticulous merger and Article 350 offers is statistically significant at the 1% level, using a z-test of proportion equality.

(Insert Table 2 about here)

The revealed preference of controlling shareholders to tender offers may have several roots. First, Offenberg and Pirinsky (2015) argue that investors like tender offers because of their faster completion time. A shorter time between the offer and its completion guarantees less market and firm specific surprises that can rescind the deal. Faster procedures also leave less time for dissenting minority shareholders to organize. In short, faster procedures increase the likelihood of deal completion, and save the time and energy spent in lengthy procedures. It is noteworthy though that unlike Israel most freeze-outs in the U.S. still take the merger route – see Restrepo and Subramanian (2015) and Butwin, Kwon, Messina, Sullivan, Warner and Zhang (2019), perhaps because the tender venue is associated with higher premiums.

Second, the freeze-out tender offer venue may be favorable among Israeli controlling shareholders also because it involves minimal formalities: no SC, no board discussion, and no regulatory or court intervention before the offer is made. Israeli controlling shareholders can publish a short document (of 3-4 pages) and wait (typically about three weeks) till the final tendering date.[10]

A third possible reason for tender offer extraordinary popularity among Israeli controlling shareholders is less rejoicing. The simple procedure of freeze-out tender offers in Israel may tempt some controlling shareholders to misuse it, i.e., attempt unfair freeze-out tender offers when company shares are undervalued. Using the terminology of Atanasov, Black and Ciccotello (2011) this constitutes an equity tunneling attempt. It is likely that occurrence of such opportunistic equity tunneling attempts also contribute to the revealed preference for the tender procedure in Israeli freeze-outs.

In this context, the drift towards the more rigorous freeze-out procedures observed in the later decade of our sample is interesting. As Table 2 shows, the number of freeze-out tender offers declined in the second decade of our sample period (relative to the first decade) while the number of non-tender offer freeze-outs increases between the first and second decade of our sample period. One possible explanation for it regards corporate governance improvements. In 2010 and 2011 there was a significant leap in Israeli corporate governance including (among other measures) opening a special section of the court specializing in business litigation, and amending the Corporate Law in the direction of significantly empowering minority shareholders (Amendment 16). Thus, despite the fact that the freeze-out procedures did not change, the atmosphere of improved corporate

[10] The Israeli regulation stipulates a minimal tendering period of two weeks.

governance might have persuaded some controlling shareholders to take the more considerate-of-minority-shareholders reverse triangular merger freeze-out course.[11]

It is interesting to test whether the drop in the number of freeze-out tender offers, from 182 in 2000-2009 to 107 in 2010-2019, a 41% decrease, is statistically significant. This is not obvious because the number of listed public companies in Israel also dropped between the first and second decade of the 21st century (the "listing gap" phenomenon). In the first decade, the average (across calendar years) number of listed public companies was 620, while in the second decade it was 499 only, a drop of about 20%. The average proportion of attempted tender freeze-outs in the first decade, 182/620 = 0.294, is still significantly higher than the respective average proportion in the second decade, 107/499 = 0.214. The p-value of the difference in proportions is 0.003. Thus, evidently, freeze-out tender offers became less popular in the second decade. The non-trivial decrease in the number and proportion of freeze-out tender offers may signal a decrease in exploitive tender offer attempts, and is also consistent with the suggested corporate governance improvement interpretation.

Table 3 tests our Hypothesis 1. Consistent with the hypothesis we find that when controlling shareholders' pre-offer holdings (in % of firm equity) are relatively high, they (the controlling shareholders) are more likely to choose the tender freeze-out venue. As explained in the development of the hypothesis, when controlling shareholders pre-offer stake in firm shares is relatively high, their "distance to success" in a tender offer shortens,

[11] The number of Article 350 (Schemes of Arrangements) declined between the first and second decades. Thus, the increase in non-tender-offer freeze-outs in the second decade is due to an increase in reverse triangular mergers. Reverse triangular mergers became relatively popular in the second decade also because Israeli courts expressed concerns and reservations regarding the application of Schemes of Arrangements (Article 350) in freeze-out transactions.

as they need a lower proportion of minority shareholders to tender their shares for successfully completing the tender offer. Thus, when controlling shareholders' stake in firm's equity increases, tender offer success probability increases, and controlling shareholders become more likely to choose the tender offer freeze-out route. Similar findings are documented in the literature (Subramanian, 2007), hence the confirmation of Hypothesis 1 is quite expected.

(Insert Table 3 about here)

Two explanatory variables in Table 3 appear statistically insignificant. Firm's size has an insignificant negative impact on the likelihood of choosing the tender offer procedure. More fundamental, the second decade dummy variable is negative and almost statistically significant (p-value of 0.11 in a two-sided test).[12] This illustrates that the second decade drift towards the more-structured (merger and Article 350) freeze-out procedures and our ensuing corporate governance improvement interpretation are only weakly supported by the data.

4.2. Offer premium

Table 4 reports means of the freeze-out offer premium and of the completed freeze-out deals in the overall sample and in its two decades. Because of the existence of outliers we prefer and present the means of the winsorized (at the 5% and 95% levels) premium. For brevity, the mean winsorized premium is referred to as the mean premium henceforth.

[12] If we re-define the alternative hypothesis as H1: D_2010<0 instead of H1: D_2010≠0, i.e. when the alternative hypothesis is that the corporate governance improvement decreases the likelihood of tender offers, then the p-value of the test is 0.055.

In the overall sample period, the mean premium in tender offers is 23.4%, statistically significantly lower than the mean premium in merger and Article 350 offers that is 34.3%. In the completed deals subsample, the mean offer premium disparity is even wider, 23.7% in tender offers versus 35.8% in non-tender offers. These findings are consistent with our Hypothesis 3 which proposes that because of the lengthy procedure of merger (and Article 350) freeze-outs and because of the formal negotiations with the special committee in non-tender procedures, minority shareholders will extract a higher premium in non-tender freeze-outs.

(Insert Table 4 about here)

Table 4 also presents subperiod evidence. In the first decade of the 21st century the wedge in mean premium between completed tender and non-tender freeze-outs is a whopping 20%, while in the second decade the corresponding wedge shrinks to 7.5%. Interestingly, the wedge narrowing is due primarily to a drop in the mean premium of non-tender procedures from 43% in the first decade to 32.5% in the second. These findings suggest that either controlling shareholders improved their negotiation skills in the second decade (reducing the premium paid to minority shareholders), or that the type of reverse-triangular merger candidates has changes over the decades.

Our Hypotheses 2 and 3 propose that premia depend on the deal structure, company size and the pre-offer abnormal returns of firm's stock. To test them, we run regressions of accepted offers' premium on these three explanatory variables and on a dummy variable for the second decade. We prefer accepted offer premium as the dependent variable because only accepted offers represent real deals where the prices and premiums are agreed and transacted upon. The alternative dependent variable, offer

premium, is a preliminary figure that can be noisy and far away from equilibrium prices. Nonetheless, similar results and identical conclusions are obtained when we use offer premium as the dependent variable.

Table 5 presents the results of our tests. Columns (1) and (2) report results of regressions employing all our four explanatory variables (with and without industry fixed effects). Only the effects of the tender offer dummy variable and the pre-offer abnormal stock return appear statistically significant at the 1% level. Columns (3) and (4) report parsimonious regression results (with industry fixed effects and with both industry and calendar-year fixed effects, respectively).

(Insert Table 5 about here)

Table 5 documents that when pre-offer firm stock's performance is poor, controlling shareholders need to pay a higher premium to minority shareholders for the offer to succeed. The rationale behind this finding is that when past stock performance is relatively poor, minority shareholders suspect controlling shareholder intentions, i.e., suspect that controlling shareholders are trying to buy firm's shares at a cheap price. To overcome this timing suspicion, controlling shareholders offer and pay higher freeze-out premiums. Notably, in the process of determining offer premiums there is a fundamental role to institutional investors' "voice" – see Lauterbach and Mugerman (2020).

There exists also a behavioral explanation for the pre-offer abnormal returns' negative correlation with accepted offers' premium. A continuum of behavioral studies, starting with prospect theory (Kahneman and Tversky, 1979) and including recently the cognitive dissonance thesis (Kaustia, 2010; Chang, Solomon, and Westerfield, 2016; Fischbacher, Hoffmann, and Schudy, 2017; Hamdani, Lauterbach, and Mugerman,

2020), all suggest that shareholders may use their share purchase price as a reference or even a reservation price. Poor stock performance before the offer forces controlling shareholders to raise the offered premium for the offer to succeed. (Remember that our Table 5 results refer to completed freeze-out premiums.) Another behavioral approach, based on investors' regret, proposes the pre-offer 52 weeks' high-price as minority investors' reference price – see Baker, Pan and Wurgler (2012). In such a case, poor pre-offer stock performance also dictates a higher premium for the offer to succeed.

The negative and statistically significant coefficient of the tender dummy variable in Table 5 regressions is a key finding of the study. In Israel, completed freeze-out deals executed via the tender offer route paid on average a 13%-16% lower premium than freeze-out deals completed via the merger route. This finding is contrary to U.S. findings where tender freeze-out premiums appear higher than merger freeze-out premiums – see Restrepo and Subramanian (2015) post-2005 evidence (in their Table 1 Panel B). Regular tender offer premiums in the U.S. are also higher than merger premiums – see Offenberg and Pirinsky (2015), for example.

According to Offenberg et al. (2015) the U.S. evidence is palatable – the faster procedure (tender offers) comes with the cost of a higher premium. Given such logic, our Israeli sample evidence that from the perspective of controlling shareholders the shorter tender offer procedure is cheaper (and not costlier) than mergers, appears puzzling. On reflection, we note that in Israel the tender offer procedure is riskier than the merger procedure. In Table 1 we record a 40% (12%) failure rate of freeze-out tender (merger) offers in our Israeli sample. In contrast, in the U.S. the failure rate of mergers exceeds that of tender offers. Hence, in both Israel and the U.S., controlling shareholders appear

to pay a higher premium when electing the "more certain" or higher-success-probability mechanism. This risk-based common explanation for Israel and U.S. evidence may represent a more fundamental cause than time for completion for the general issue of the choice and differences between tender offers and mergers.

4.3. Offer completion likelihood

Another fundamental issue is offer acceptance likelihood. First, we examine the univariate statistics. Table 6 documents that in the overall twenty years period freeze-out tender offer completion rate (59.9%) is significantly lower than merger+Article 350 completion rate (88.4%). This result holds in both decades of the sample, and it is even stronger in the second decade of the sample period where tender offer completion rate is 54.2% while merger+Article 350 completion rate is 91.7%, a remarkable difference of 37.5%.

(Insert Table 6 about here)

Our Hypotheses 4 and 5 suggest that completion likelihood depends on deal structure (tender offer or other), offer premium, firm size, stock pre-offer abnormal returns, and pre-offer level of controlling shareholders' holdings. Table 7 presents results of a Probit analysis of freeze-out offer completion, where the dependent variable equals 1 for successfully completed offers and equals 0 for failed offers.

(Insert Table 7 about here)

Columns (1) and (2) present the Probit fitted coefficients for the full model without and with industry fixed effects. Only deal structure (a dummy variable identifying tender offers), firm size and pre-offer controlling shareholders' holding appear

statistically significant at the 5% level. In Columns (3) and (4) we present the parsimonious Probit results with industry fixed effects and with industry and calendar year fixed effects.

Column (5) adds to the list of explanatory variables a dummy variable marking repeated freeze-out attempts for the same firm, i.e., a dummy variable that equals 1 for the second and third attempts to acquire the firm (and equals 0 otherwise). In repeated attempts both the control group and the public might be more knowledgeable and experienced. Hence, in repeated offers we anticipate and document in column (5) a higher freeze-out completion probability. Most important, the introduction of the repeated offer dummy does not impact the significance of the coefficients of firm size, pre-offer controlling shareholders' holding, and deal structure.[13]

The positive coefficient of firm size in Table 7 is expected. There is less information asymmetry between firm and public investors regarding larger firms. The milder information asymmetry in larger firms calms minority shareholders suspicions, and increases their confidence and willingness to make a deal with controlling shareholders.

The positive coefficient of pre-offer controlling shareholders' holdings is also expected. Higher holdings imply that controlling shareholders have to purchase less (and a lower proportion of) firm shares from minority shareholders for the offer to succeed. The easier task implies in turn a higher eventual offer success or completion rate.

[13] Adding the repeated offer dummy as an explanatory variable to the premium regression and to the deal structure choice Probit, yields statistically insignificant coefficients.

The negative and statistically significant coefficient of the tender offers dummy variable shows that in our sample the tender offer deal structure attains a significantly lower completion rate than its alternatives (merger and Article 350). This is a key finding, as it unveils a cardinal difference between the Israeli and U.S. results. In the U.S., the results are opposite – tender offers achieve a significantly higher success rate.

The ensuing question is: Why do tender offers achieve such a low completion rate in Israel? We propose that the reason is the unique freeze-out tender mechanism in Israel. The little formalities of freeze-out tender offers in Israel encourage some controlling shareholders to give opportunistic freeze-out offers in an attempt to expropriate minority shareholders. As a response, minority shareholders tend to reject freeze-out tender offers more often than they reject reverse triangular mergers that employ a rigorous procedure much like that of the U.S. In sum, the "distortion" in the tender procedure in Israel is the culprit or most likely reason for the opposing findings in Israel and the U.S.

The diverging Israel and U.S. evidence is an indication that the tender offer procedure has a non-trivial impact on the tender consequences. Given this evidence, Delaware's law and jurisdiction constant adjustment of the tender offer procedure becomes understandable. The tender offer procedure must be tuned to achieve the desired end result. Furthermore, changes and developments in business and economic conditions probably require occasional adjustments in the tender procedure. This is perhaps the most important message of our study.

4.4. Freeze-out offers' litigation

It is interesting to inquire whether the light tender offer freeze-out procedure in Israel generates a wave of post-completion litigation (class action suits). We have reviewed Maya (the Tel-Aviv Stock Exchange web site section presenting all company announcements) and the NEVO legal database for data on freeze-out litigation. Table 8 summarizes our litigation evidence for 153 completed freeze-out tender offers and reverse-triangular mergers. No litigation is possible or found in Article 350 freeze-outs, as all the process is court-directed and "final".

(Insert Table 8 about here)

In the overall period we found only 14 litigations, 5 for mergers and 9 for tender offers. The litigation rate of about 9% is much lower than the litigation rate of 80% to 90% recorded in the U.S. – see Cornerstone Research (2019).[14] Also surprising, the tender offer litigation rate of 7.5% is about half of the mergers' litigation rate of 15.2%. Evidently, post-completion class action suits against tender offers occur relatively rarely. It appears that the quick and perhaps "sloppy" Israeli tender offer procedure does not raise serious post completion opposition, despite of the fact that the Israeli law grants explicit rights to challenge the tender freeze-out's consideration via an appraisal remedy. In contrast, the long and tolerant process of merger freeze-outs (including SC negotiations + MOM requirement) does not appease minority shareholders who submit lawsuits against it relatively frequently.

[14] This finding may be a result of Israel's less welcoming regulation of shareholders' class-action litigation, including the following items: 1) lead plaintiff must pay a court fee before filing the suit; 2) if litigation fails, lead plaintiff can be asked to reimburse defendant's legal expense; 3) plaintiffs' lawyers are awarded only when the class-action ends with a monetary compensation to shareholders.

One cynical interpretation of this finding is that a more considerate approach such as a merger also facilitates a more thorough discussion of the freeze-out related issues, a discussion that naturally generates more potential objections. In contrast, the relatively aggressive procedure of Israeli freeze-out tender offers makes it difficult for dissenting minority shareholders to sue because the plaintiffs have to collect and analyze all data by themselves - the tender offer itself provides little information and ammunition for would-be plaintiffs.[15]

The above "information available to potential plaintiffs" thesis also predicts that litigation about mergers would be better-reasoned than litigation regarding tender offers. This prediction appears consistent with the data. In four out of the five law suits against merger freeze-out the plaintiffs won. In comparison, only in four out the nine law suits against freeze-out tender offers the plaintiffs won.

Table 8 also facilitates some observations on the effect of Israeli corporate governance progress over time. In the second decade of the sample period (2010-2019), about 13% of freeze-out deals are litigated, whereas in the first decade (2000-2009) only about 6% of the deals were litigated. Furthermore, litigation success rate has increased dramatically from 20% in the first decade to about 77% in the second decade. This change appears to be the result of the establishment a section in the court specializing in business and economic affairs. This section of the court better understanding of freeze-out deals most probably led to the observed increased litigation and increased success rates.

[15] Other non-mutually exclusive potential reasons for the higher litigation rate of merger freeze-outs are: 1) mergers transaction are, on average, larger than tender offers, and minority shareholders' holdings are higher; therefore plaintiffs' lawyer can sue for larger amounts; 2) in mergers, if plaintiffs can show a flaw in the deal process, than the burden of proof shifts toward the defendant. In tender-offers' appraisal suits, the deal process in not evaluated.

The fact that relatively few completed tender offers are litigated is another reason for controlling shareholders to favor it. We have further examined what controlling shareholders do in case their freeze-out tender offer is rejected. For 59 of the 116 rejected tender offers, i.e., for about half of the rejected tender offers, we find that controlling shareholders return to the market with another freeze-out offer. Out of these 59 repeated offers, 51 take the form of a tender offer and 8 are reverse triangular merger attempts. Evidently, even after failing with a tender offer, controlling shareholders still prefer this route.[16]

The revealed preference for the tender offer venue in Israel and the rare minority shareholders' litigation against it probably explain why the Israeli tender offer freeze-out procedure is not amended. Ideally, if ex-post justice can be made, there is no reason for blocking an almost "unregulated" mechanism of freeze-out tender offers such as the Israeli one. In essence, the wide menu of freeze-out offer techniques available in Israel encourages deal making (at the cost of facilitating some potentially unfair deals), while Delaware's cautious "unified approach" to tender offers and mergers sacrifices some legitimate freeze-out deals in the purpose of fairness. Neither approach appears to us dominant. As usual, the optimal balance between free and fair deal making appears a matter of culture or taste.

[16] In rejected merger and Article 350 freeze-out offers we also note a tendency to repeat the original deal structure form. Out of the seven rejected offers, four return to the market with another merger attempt and only one returns with a tender offer.

5. Summary and Conclusions

The optimal procedure for tender offers has been debated extensively in the U.S., at least since Bebchuk (1987). Accordingly, Delaware's regulation and jurisdiction on the matter have been adjusted several times.

We study freeze-out offers in Israel in an attempt to examine how variations in the tender offer procedure might impact the outcome of the offers. In Israel, the merger freeze-out mechanism is almost identical to that of the U.S., including a special committee of independent directors negotiating deal terms with controlling shareholders and a majority of the minority requirement for offer completion. In contrast, the Israeli freeze-out tender offer mechanism is vastly different than in the U.S., as it requires no board or court discussion and is subject to minimal regulation. Israeli controlling shareholders publish a short (3-4 pages) offer to minority shareholders and wait till the end of the tendering period (two weeks at least).

We examine freeze-outs' deal structure choice, deal premium and deal success rate in Israel, and find them to be opposite to the U.S. evidence. In Israel most freeze-out offers take the form of tender offers, while in the U.S. most freeze-outs choose the merger route. In Israel premiums are higher for merger freeze-outs, whereas in the U.S. premiums appear to be higher in tender offers. Last, in Israel (U.S.), freeze-out offer failure rate is higher for tender offers (mergers, respectively).

The documented divergence of outcomes in Israel and the U.S. is probably the result of the different tender offer formulation. Thus, the central takeaway of our findings is that the formulation of the tender offer procedure has a strong impact on its

consequences. Tender offers are a delicate procedure that can be tuned in different directions. Accordingly, Delaware's relatively frequent adjustments of the takeover offer procedure may represent a genuine attempt to tune up the tender venue.

Appendix: A tabular review of the legal freeze-out procedures

Table A.1: A Comparison of the Legal Merger and Tender Offer Freeze-out Procedures in the U.S. and Israel

This table highlights the key characteristics of the merger and tender freeze-out procedures we study. The tabular presentation and comparison is inescapably sketchy and inexhaustive.

Characteristic	Merger (US)	Merger (Israel)	Tender offer (US)	Tender offer (Israel)
Threshold majority of shares needed for offer completion	50%	50%	50-90% (from 2014: 50%; Before that: 90%)	95%
Majority of the minority shareholders (MOM)	Yes (from 2013)	Yes	Yes	Yes (officially since 2011)
Board approval	Yes	Yes	Yes	No
Special committee (SC) negotiations	Yes	Yes (from 2011)	Yes	No
Fairness opinion	Yes	Yes	Yes	No[1]
Appraisal rights	Yes	No	Yes	Yes
Disclosure	Yes	Yes	Yes	No

[1] Not required by law, yet sometimes provided voluntarily.

References

Abudy, M., and Lauterbach, B. (2015). Changes in controlling shareholders' holdings: Do they entail financial tunneling? *Advances in Financial Economics* 18: 47-63.

Atanasov, V., Black, B.S., and Ciccotello, C.S. (2011). Law and tunneling. *Journal of Corporation Law* 37: 1-49.

Bajo, E., Barbi, M., Bigelli, M., and Hillier, D. (2013). The role of institutional investors in public-to-private transactions. *Journal of Banking and Finance* 37: 4327-4336.

Baker, M., Pan, X., and Wurgler, J. (2012). The effect of reference point prices on mergers and acquisitions. *Journal of Financial Economics* 106: 49-71.

Bebchuk, L. (1987). The pressure to tender: An analysis and a proposed remedy. *Delaware Journal of Corporate Law* 12: 911-949.

Bebchuk, L., and Kahan, M. (2000). Adverse selection and gains to controllers in corporate freeze-outs. In Morck, R., ed., Concentrated Corporate Ownership (*University of Chicago Press, Chicago*, pp. 247–59).

Bøhren, Ø., and Krosvik, N. (2013). The economics of minority freeze-outs: Evidence from the courtroom. *International Review of Law and Economics* 36: 48-58.

Boone, A., Broughman, B., and Macias, A. (2017). Shareholder decision rights in acquisitions: Evidence from tender offers. Indiana Legal Studies Research Paper No. 331. Available at SSRN: https://ssrn.com/abstract=2629424

Butwin, B., Kwon, U., Messina, M., Sullivan, K., Warner, D., and Zhang, R. (2019). A look at U.S. sponsor-backed going private transactions. Weil, Gotshal & Manges LLP. https://www.jdsupra.com/legalnews/a-look-at-u-s-sponsor-backed-going-48676/

Chang, T., Solomon, D., and Westerfield, M. (2016). Looking for someone to blame: delegation, cognitive dissonance, and the disposition effect. *Journal of Finance* 71: 267-302.

Cornerstone Research (2019). Shareholders litigation involving acquisition of public companies. https://www.cornerstone.com/Publications/Reports/Shareholder-Litigation-Involving-Acquisitions-of-Public-Companies-Review-of-2018-M-and-A-Litigation-pdf.

Doidge, C., Kahle, K., Karolyi, A., and Stulz, R. (2018). Eclipse of the public corporation or eclipse of the public markets? *Journal of Applied Corporate Finance* 30(1): 8–16.

Doidge, C., Karolyi, A., and Stulz, R. (2017). The U.S. listing gap. *Journal of Financial Economics* 123: 464-487.

Fischbacher, U., Hoffmann, G., and Schudy, S. (2017). The causal effect of stop-loss and take-gain orders on the disposition effect. *Review of Financial Studies* 30: 2110–2129.

Gao, X., Ritter, J., and Zhu, Z. (2013). Where have all the IPOs gone? *Journal of Financial and Quantitative Analysis* 48(6): 1663-1692.

Goshen, Z., and Hamdani, A. (2016). Corporate control and idiosyncratic vision, *Yale Law Journal* 125: 560-617.

Goshen, Z., and Wiener, Z. (2003). The value of the freezeout option. Columbia Law and Economics Working Paper No. 260. https://ssrn.com/abstract=217511

Grossman, S., and Hart, G. (1980). Takeover bids, the free-rider problem, and the theory of the corporation. *Bell Journal of Economics* 11(1): 42-64.

Hamdani, A., Lauterbach, B., and Mugerman, Y. (2020). Reservation prices in shareholders' response to freeze-out tender offers. *Journal of International Financial Markets, Institutions and Money* 64: 1–10.

Kahle, K., and Stulz, R. (2017). Is the public corporation in trouble? *Journal of Economic Perspectives* 31(3): 67-88.

Kahneman, D., and Tversky, A. (1979). Prospect theory: An analysis of decision under risk. *Econometrica* 47: 263-291.

Kaustia, M. (2010). Prospect theory and the disposition effect. *Journal of Financial and Quantitative Analysis* 45: 791–812.

Lauterbach, B., and Mugerman, Y. (2020). The effect of institutional investors' voice on the terms and outcome of freeze-out tender offers. *Quarterly Journal of Finance* 10: 1-33.

Offenberg, D., and Pirinsky, C. (2015). How do acquirers choose between mergers and tender offers? *Journal of Financial Economics* 116(2): 331-348.

Payne, J. (2014). Schemes of Arrangement: Theory, Structure, and Operation. Cambridge University Press.

Restrepo, F. (2013). Do different standards of judicial review affect the gains of minority shareholders in freeze-out transactions? A re-examination of Siliconix. *Harvard Business Law Review 3*: 321-359.

Restrepo, F. (2018). Judicial deference, procedural protections, and deal outcomes in freezeout transactions: Evidence from the effect of MFW. https://ssrn.com/abstract=3105169.

Restrepo, F., and Subramanian, G. (2015). The effect of Delaware doctrine on freeze-out structure and outcomes: Evidence on the unified approach. *Harvard Business Law Review* 5: 205-236.

Sanchez, C., Razzano, E., and McGurty, L. (2014). Tender offers: Past, present and future - the evolution of Section 251(h). Paul Hastings LLP. https://www.paulhastings.com/docs/default-source/PDFs/stay-current-251h-tender-offers.pdf.

Subramanian, G. (2005). Fixing freeze-outs. *Yale Law Journal* 36: 2-59.

Subramanian, G. (2007). Post-Siliconix freeze-outs: Theory and evidence. *Journal of Legal Studies* 36: 1-26.

Table 1: Sample Descriptive Statistics

The table presents means, winsorized means (5% on each side), medians, and standard deviations of different characteristics of our 349 freeze-out offers, partitioned by deal structure. Total assets, leverage, and ROA are from firms' annual reports at the end of the calendar year preceding the offer. To translate the figures into U.S. Dollars divide them by 4, given an average exchange rate of 3.97 New Israeli Shekels (NIS) per U.S. Dollar during the sample period (2000-2019). Control group holdings is the pre-offer proportion of firm's equity held by the control group. ROA is the ratio of net income to total assets. Pre-offer abnormal stock return is the mean net of market weekly return of the company's stock in weeks -55 through -6 relative to offer announcement, where the market is the Israeli small stock (*Yeter*) index return (almost all our sample stocks belong to this index). Offer premium is defined as (offer price/stock price A-6) -1, where stock price A-6 is stock price six trading days before the offer announcement date. In case the offer price is revised before decision date, we use the revised offer price in the numerator of the premium calculation formula.

	Number of observations	Mean	Mean [5,95]	Median	Standard deviation
Company characteristics					
Control group holdings (as a proportion of equity)					
All offers	349	0.804	0.809	0.842	0.123
Tender offers	289	0.826	0.828	0.854	0.097
Mergers + Article 350	60	0.699	0.719	0.718	0.172
Total assets (in thousands NIS)					
All offers	317	1,138,999	875,935	217,893	3,036,841
Tender offers	260	895,204	710,347	214,145	2,738,590
Mergers + Article 350	57	2,251,045	1,631,247	238,111	3,977,323
ROA (Net profit/Total assets)					
All offers	314	-0.018	-0.015	0.025	0.206
Tender offers	259	-0.014	-0.012	0.025	0.189
Mergers + Article 350	55	-0.036	-0.028	0.030	0.272
Pre-offer abnormal stock return					
All offers	255	-0.0027	-0.0024	-0.0014	0.0104
Tender offers	211	-0.0030	-0.0026	-0.0018	0.0108
Mergers + Article 350	44	-0.0013	-0.0011	-0.0009	0.007

Table 1: Cont.

Leverage (Debt/Total assets)					
All offers	316	0.683	0.668	0.655	0.416
Tender offers	260	0.689	0.678	0.658	0.387
Mergers + Article 350	56	0.658	0.621	0.608	0.533
Offer and deal attributes					
Deal completion rate					
All offers	349	0.65		1	0.48
Tender offers	289	0.60		1	0.49
Mergers + Article 350	60	0.88		1	0.32
Offered premium					
All offers	255	0.265	0.253	0.188	0. 245
Tender offers	211	0.240	0.234	0.182	0.248
Mergers + Article 350	44	0.387	0.343	0.261	0.428
Accepted offers' premium					
All offers	162	0.284	0.269	0.204	0.305
Tender offers	120	0.242	0.237	0.190	0.235
Mergers + Article 350	42	0.404	0.358	0.279	0.431

Table 2: The Choice between a Tender and Non-tender Freeze-out Procedure

The table reports the number and proportion of freeze-out offers by deal structure (tender and non-tender) and by period. We test the proportion difference between the decades (2000-2009 and 2010-2019) using a z-test of proportion equality.

	Number of offers			Proportion of offers			
	2000-2019	2000-2009	2010-2019	2000-2019	2000-2009	2010-2019	*p-value* of differences between the decades
All offers	349	206	143	1	1	1	
Tender offers	289	182	107	0.828	0.883	0.748	0.001
Mergers + Article 350	60	24	36	0.172	0.117	0.252	

Table 3: A Probit Analysis of the Choice between Alternative Freeze-out Techniques

The table reports Probit analysis results. The dependent variable equals 1 if the freeze-out deal is structured as a tender offer, and equals 0 if it is a merger or employs Article 350. The total number of observations varies because certain industries (and years) perfectly predict outcome, i.e. have few observations, all of which employ the same deal structure. Log total assets is defined as a natural logarithm of firm's total assets (in thousand NIS) at the end of the calendar year preceding the offer. Control group holdings is the pre-offer proportion of firm's equity held by the control group. Second decade dummy equals 1 if the offer announcement date is in the second decade of the 21st century (2010-2019), and equals 0 otherwise (i.e., for 2000-2009). Standard errors are reported in parentheses. *** denotes significance at the 1% level.

	(1)	(2)	(3)	(4)	(5)
Log total assets	-0.017	-0.036			
	(0.046)	(0.051)			
Control group holdings	3.83***	3.77***	3.65***	3.88***	4.08***
	(0.64)	(0.67)	(0.67)	(0.65)	(0.77)
Second decade dummy			-0.30		
			(0.18)		
Calendar year fixed effects	No	No	No	No	Yes
Industry fixed effects	No	Yes	Yes	Yes	Yes
Number of observations	317	309	341	341	290
Pseudo R^2 (%)	13.3	16.0	16.5	15.7	24.0

Table 4: Freeze-out Offer Premiums

The table reports winsorized (5% on each side) means of the offered freeze-out premiums and of the completed freeze-out premiums in the overall sample and in its two decades, including a partition by deal structure – tender vs. non-tender offers. We compare these mean premiums across deal structures and across subperiods using t-tests, and report the p-values of the differences in the table.

	Offers				Completed offers only			
	2000-2019	2000-2009	2010-2019	*p-value* of differences between decades	2000-2019	2000-2009	2010-2019	*p-value* of differences between decades
All offers	0.253	0.236	0.275	0.21	0.269	0.259	0.281	0.60
Tender offers	0.234	0.218	0.261	0.17	0.237	0.231	0.250	0.65
Mergers + Article 350	0.343	0.405	0.314	0.38	0.358	0.430	0.325	0.33
p-value of differences between structures	0. 007	0.002	0.37		0. 007	0. 003	0.26	

Table 5: Determinants of the Premium Paid in Completed Freeze-out Deals

The table reports results of OLS regressions of completed freeze-out offers' premiums. Offer premium is defined as (offer price/stock price A-6) -1, where stock price A-6 is stock price six trading days before offer announcement date. In case the offer price is revised before decision date we use the revised offer price in the numerator. Winsorizing is performed on the overall raw premium data at the 5% and 95% levels. Amongst explanatory variables, Log total assets is the natural logarithm of the firm's total assets (in thousands of New Israeli Shekels) at the end of the calendar year preceding the offer; Control group holdings is the controlling shareholders' pre-offer holdings (fraction of firm's equity); Pre-offer abnormal stock return is the mean net of market weekly return of the company's stock in weeks -55 through -6 relative to offer announcement, where the market is Israeli small stock *(Yeter*) index return (almost all of our sample stocks belong to this index); Tender dummy equals 1 if the freeze-out deal is structured as a tender offer, and equals 0 if it is structured as a merger or employs Article 350; Second decade dummy equals 1 if the offer announcement date is in the second decade of the 21st century (2010-2019), and equals 0 otherwise (i.e., for 2000-2009). Industry fixed effects are according to Tel Aviv Stock Exchange industry classification codes (9 industries). Standard errors are reported in parentheses. *** denotes significance at the 1% level.

	(1)	(2)	(3)	(4)
Log total assets	0.003	0.008		
	(0.011)	(0.013)		
Tender dummy (tender = 1; merger + Article 350 = 0)	-0.15***	-0.16***	-0.13***	-0.16***
	(0.05)	(0.05)	(0.05)	(0.05)
Pre-offer abnormal stock return	-7.59***	-7.72***	-7.85***	-9.86***
	(2.09)	(2.14)	(2.14)	(2.31)
Second decade dummy	-0.02	-0.02		
	(0.04)	(0.04)		
Calendar year fixed effects	No	No	No	Yes
Industry fixed effects	No	Yes	Yes	Yes
Number of observations	160	160	162	162
Adjusted R^2 (%)	11.1	8.9	7.9	10.2

Table 6: Freeze-out Offers' Completion Rate

The table reports freeze-out deals' completion rates, partitioned by structure (tender vs. non-tender offers) and decade (2000-2009 vs. 2010-2019). Differences in completion rates are tested using a z-test of proportion equality.

	2000-2019	2000-2009	2010-2019	*p-value* of differences between decades
All offers	0.648	0.655	0.636	0.72
Tender offers	0.599	0.632	0.542	0.13
Mergers + Article 350	0.884	0.833	0.917	0.32
p-value of differences between structures	0.001	0.05	0.001	

Table 7: Analysis of Freeze-outs' Completion Probability

The table reports results of a Probit analysis. The dependent variable equals 1 if the offer is completed, and equals 0 if it fails. Amongst explanatory variables, Log total assets is the natural logarithm of the firm's total assets (in thousands of New Israeli Shekels) at the end of the calendar year preceding the offer; Offer premium is defined as (offer price/stock price A-6) -1, where stock price A-6 is stock price six trading days prior to offer announcement date (when offer price is revised before decision date we use the revised offer price in the numerator); Control group holdings is the controlling shareholders' pre-offer holdings (fraction of firm's equity); Pre-offer abnormal stock return is the mean net of market weekly return of the company's stock in weeks -55 through -6 relative to offer announcement, where the market is Israeli small stock *(Yeter*) index return (almost all of our sample stocks belong to this index); Tender dummy equals 1 if the freeze-out deal is structured as a tender offer, and equals 0 if it is structured as a merger or employs Article 350; Second decade dummy equals 1 if the offer announcement date is in the second decade of the 21st century (2010-2019), and equals 0 otherwise (i.e., for 2000-2009); Repeated offers is a dummy variable equal to 1 for the second and third offers of a firm that failed in its first offer (and equal 0 otherwise). Industry fixed effects are according to the Tel Aviv Stock Exchange industry classification (9 industries). Standard errors appear in parentheses. ** and *** denote significance at the 5% and 1% levels, respectively.

	(1)	(2)	(3)	(4)	(5)
Log total assets	0.127**	0.134**	0.115**	0.113**	0.118**
	(0.056)	(0.064)	(0.052)	(0.056)	(0.057)
Tender dummy (tender = 1; merger + Article 350 = 0)	-1.91***	-2.13***	-1.56***	-1.81***	-1.78***
	(0.40)	(0.43)	(0.30)	(0.34)	(0.34)
Offer premium	0.71	0.70			
	(0.42)	(0.44)			
Control group holdings	2.38***	3.17***	2.57***	3.02***	2.78***
	(0.87)	(1.02)	(0.79)	(0.88)	(0.89)
Second decade dummy	-0.19	-0.13			
	(0.18)	(0.19)			
Pre-offer abnormal stock return	12.79	5.12			
	(9.38)	(9.95)			
Repeated offers (dummy variable)					0.43*
					(0.22)
Calendar year fixed effects	No	No	No	Yes	Yes
Industry fixed effects	No	Yes	Yes	Yes	Yes
Number of observations	253	242	305	305	305
Pseudo R^2 (%)	13.8	16.7	11.7	16.4	17.3

Table 8: Freeze-out Offers' Litigation

This table summarizes the litigation evidence regarding completed freeze-out tender offers and reverse-triangular mergers, partitioned by structure (tenders vs. mergers) and decade (2000-2009 vs. 2010-2019). Completed deals that employ the Article 350 procedure (court-directed Scheme of Arrangement freeze-outs) are excluded because they cannot be challenged in court.

	2000-2019	2000-2009	2010-2019
All deals			
Number of completed deals	153	85	68
Number of litigated deals	14	5	9
Litigation rate	9.15%	5.88%	13.24%
Number of successful litigations	8	1	7
Mergers			
Number of completed deals	33	7	26
Number of litigated deals	5	0	5
Litigation rate	15.16%	0	19.23%
Number of successful litigations	4	0	4
Tender Offers			
Number of completed deals	120	78	42
Number of litigated deals	9	5	4
Litigation rate	7.50%	6.41%	9.52%
Number of successful litigations	4	1	3