

Unsuccessful Equity Crowdfunding Offerings and the Persistence
in Equity Fundraising of Family Business Startups

ALICE ROSSI

alice.rossi@unibg.it

Department of Management, Information and Production Engineering

University of Bergamo

Viale Marconi, 5 - 24044 Dalmine (BG), Italy

TOM VANACKER

tomr.vanacker@ugent.be

Faculty of Economics and Business Administration

Ghent University

Sint-Pietersplein 7, 9000 Gent, Belgium

t.vanacker@exeter.ac.uk

University of Exeter Business School

University of Exeter

Rennes Drive, Exeter, EX4 4ST, United Kingdom

SILVIO VISMARA*

silvio.vismara@unibg.it

Department of Management

University of Bergamo

Via dei Caniana, 2 – 24127 Bergamo, Italy

Accepted at Entrepreneurship Theory and Practice

* Corresponding author

Acknowledgments: We thank three anonymous *ETP* reviewers, Fabio Bertoni, Katja Bringmann, Fabrice Hervé, Elodie Manthé, Armin Schwienbacher, Xavier Walthoff-Borm, Heidi Vander Bauwhede, Diego Zunino, and participants at the 2021 Entfin Annual Meeting, the Paris Webinar on Financial Technology and Crypto and Ghent University, for helpful comments. Alice Rossi acknowledges support from Ghent University in the form of a visiting period as an incoming Ph.D. student at the Faculty of Economics and Business Administration.

Unsuccessful Equity Crowdfunding Offerings and the Persistence in Equity Fundraising of Family Business Startups

Abstract

Little is known about what happens after an *unsuccessful* equity crowdfunding campaign. Taking a socioemotional wealth perspective, we hypothesize that family business startups are more likely to eventually still raise equity financing relative to non-family business startups. Moreover, while family business startups are initially less likely to provide voting rights, we hypothesize that they are more likely to offer shares with voting rights after an unsuccessful campaign. Using data on the UK equity crowdfunding market, we find support for our hypotheses. This study adds novel insights into the nexus between equity crowdfunding and family business literature.

Keywords: Equity crowdfunding; Entrepreneurial finance; Corporate governance; Voting rights; Family business startups

1. Introduction

Entrepreneurs often require access to essential external resources to exploit entrepreneurial opportunities (Clough et al., 2019; Cosh et al., 2009; Drover et al., 2017a). In recent years, entrepreneurs have increasingly relied on equity crowdfunding to access financial resources (Ahlers et al., 2015; Blaseg et al., 2021; Bruton et al., 2015; Drover et al., 2017b; Short et al., 2017) and extra financial resources, such as market feedback, referrals, prospective customer lists, and social promotions (Belleflamme et al., 2014; Stevenson et al., 2021). In the UK, for instance, equity crowdfunding platforms helped entrepreneurs raise over £2 billion (TechCrunch, 2020).

Founding and growing startups involve obstacles and failures along the way (e.g., Markman et al., 2005). Therefore, persistence is considered a key component of entrepreneurship (Cardon and Kirk, 2015; Shane et al., 2003) and it is critical that we understand what factors make entrepreneurs persistent in raising essential resources (such as equity capital), while others quit. In equity crowdfunding, persistence is important because over

half of the campaigns fail (Rossi et al., 2021). Extant research has made significant progress in understanding what happens to startups after their successful campaigns (Butticè et al., 2020; Coakley et al., 2021; Hornuf et al., 2018; Signori and Vismara, 2018; Walthoff-Borm et al., 2018b). However, we know little about what happens to startups after an *unsuccessful* equity crowdfunding campaign. A notable exception is Walthoff-Borm et al. (2018a), who show that about 40% of startups that had an unsuccessful campaign subsequently failed in the short-term. Although this percentage is high, it also suggests that some startups can absorb the negative shock of an unsuccessful campaign.

In this paper, we investigate *which startups* better absorb the negative shock of an unsuccessful campaign. We expect the owners of the startup—which overlaps with management or entrepreneurial teams as key decision makers (Cassar, 2004)—to play a fundamental role in determining different responses to unsuccessful business outcomes. Moreover, the equity crowdfunding context provides a unique “laboratory” to develop new theory and empirical evidence on this issue. First, contrary to other entrepreneurial finance markets (i.e., angel or venture capital), equity crowdfunding appeals to a more diversified set of startups, including those with non-scalable business models that operate in a multitude of industries, and not just ones that are knowledge-intensive (Johan and Zhang, 2020). These business characteristics are reflected in the types of ownership of firms that approach equity crowdfunding. Second, because of the opacity in other entrepreneurial finance markets, startups that are unsuccessful in raising financing often remain unobserved (Cosh et al., 2009). However, in equity crowdfunding, startups aiming to raise equity capital are observable on the platform at the launch of the offering, regardless of whether they are successful in raising their target amount of funds (Walthoff-Borm et al., 2018a). Overall, we have a unique opportunity to theoretically and empirically examine how heterogeneity in ownership has different effects after unsuccessful fundraising attempts.

To distinguish between startups that can better absorb the negative shock from the others, it is important to identify the type of ownership structure that is more likely to be persistent in securing equity capital, despite the initially unsuccessful campaign. One such ownership dimension could be family ownership. Despite family business startups' prominence on equity crowdfunding platforms, they have received limited attention in the equity crowdfunding context (Cumming et al., 2019). Theoretically, however, the family business literature highlights that family owners are uniquely concerned with the preservation of socioemotional wealth (SEW), or the non-financial aspects of the firm that meet the family's affective needs, next to financial wealth (e.g., Chrisman et al., 2018; Gómez-Mejía et al., 2010, 2018; Kotlar et al., 2018; Osakwe et al., 2022). Accordingly, despite negative outcomes, family businesses are expected to be more persistent in their behaviors than non-family businesses are (Fang et al., 2021; Symeonidou et al., 2021). We argue that accepting an unsuccessful campaign can be particularly difficult for family business startups because it could threaten startup survival, force them to abandon or scale down their original plans, and deal with a loss of family cohesion and reputation, all of which have detrimental effects on SEW. Hence, we hypothesize that despite a first unsuccessful attempt, family business startups are more likely to persist and have a greater likelihood of eventually raising equity capital.

Moreover, considering that family control is critical to the preservation of SEW (Berrone et al., 2012), the *possible* control dilution linked with equity offerings is likely to carry greater relative weight in family business startups than in non-family business startups. However, equity crowdfunding provides startups with the possibility of offering shares without voting (and preemptive) rights (Cumming et al., 2019, 2021b), a strategy that can be particularly interesting for family business startups because it does not involve control dilution. However, not providing voting rights is expected to decrease the likelihood of fundraising success

(Cumming et al., 2019). Thus, family business startups need to make a trade-off between gains and losses in SEW in terms of control dilution and the likelihood of fundraising.

We anticipate that initially, family business startups will more highly value the costs related to control dilution relative to non-family business startups because this aspect is critical to SEW preservation (Berrone et al., 2012). However, family business startups may be less concerned about the possible costs of this strategy or the decreased probability of funding success. One reason is that entrepreneurs are usually overconfident (Forbes, 2005) and expect bad outcomes to happen to others rather than to themselves. However, after experiencing an unsuccessful campaign the above trade-off can fundamentally change, especially for family business startups. More specifically, the concern that offering shares with voting rights reduces SEW can be outweighed by the damage to the SEW of the initial unsuccessful campaign. The cost of not providing voting shares through the higher possibility of another unsuccessful campaign could now become more salient for family business startups. Therefore, we hypothesize that after an unsuccessful campaign, family business startups are more likely to switch to offering shares with voting rights than non-family business startups are.

To empirically test our hypotheses, we start with a population of 3,200 startups that launched an initial equity crowdfunding offering on the major UK crowdfunding platforms, Crowdcube, Seedrs, or SyndicateRoom, between February 2011 and October 2020. We construct a dataset using data from these crowdfunding portals augmented with data from Crunchbase and Orbis Europe. We focus on the population of 1,769 startups that had unsuccessful initial equity campaigns. Considering possible selection into the unsuccessful sample and systematic differences between family and non-family business startups, the results are consistent with our hypotheses. Specifically, family business startups are more persistent in raising equity capital than non-family business startups are. Family business startups have a 1.95-times higher hazard rate of raising equity after an unsuccessful equity crowdfunding

offering. Moreover, while family business startups are less likely to relinquish control (i.e., offer shares with voting rights) in initial offerings than non-family business startups are, they are 18.1% more likely to deliver voting rights in a later equity offering. These findings can be explained by framing family business startups' financing behavior after an unsuccessful equity crowdfunding offering, in terms of the preservation of SEW.

Our study contributes to three research areas. First, we contribute to the equity crowdfunding literature. While studies have investigated the post-offering outcomes of successfully funded startups (Butticè et al., 2020; Coakley et al., 2021; Coakley et al., 2022; Cumming et al., 2019; Hornuf et al., 2018; Signori and Vismara, 2018; Walthoff-Borm et al., 2018b), startups with failed campaigns have received scarce attention. Moreover, equity crowdfunding research has devoted limited attention to start-up ownership (Cumming et al., 2019; Cumming et al., 2021b; Kleinert et al., 2020). We provide a first-time glimpse into the role of startup ownership in the persistence of startups to secure equity capital after initially unsuccessful crowdfunding offerings. This is an important aspect because listing on an equity crowdfunding platform, whether successful or not, is only the first step towards the ultimate goal of pursuing new entrepreneurial opportunities and building enduring businesses (Signori and Vismara, 2018). Our findings highlight that, while some startups are liquidated after an unsuccessful equity crowdfunding campaign, other startups continue to raise equity capital.

Second, we contribute to the family business literature by investigating family business startups in entrepreneurial finance, particularly equity crowdfunding. A distinctive feature of family firms is that they assess strategic decisions concerning both financial and family oriented objectives, such as maintaining family cohesion and socioemotional wealth (Gómez-Mejía et al., 2007), preserving family reputation (Berrone et al., 2012), and employing family members (Kellermanns et al., 2008). Accordingly, extant literature has illustrated how such distinctive features influence the strategic decisions of *established* family firms, including the composition

of the board of directors (Wilson et al., 2013), acquisition behavior in publicly traded firms (Miller et al., 2009), adoption of governance mechanisms, and preferred types of external investors (Neckebrouck et al., 2021). However, family business literature has paid little attention to “family business startups” (e.g., Lumpkin and Bacq, 2021; Zahra, 2021). Our findings provide new insights into the uniqueness of family business startups relative to their non-family peers in their actions, including their persistence in raising equity capital and the structure of their new offerings following unsuccessful campaigns. Overall, we pave the way for future research by using the equity crowdfunding market as a new testing ground for family business research.

Third, we contribute to the research on entrepreneurial failure. Most studies in this area have investigated the conditions under which entrepreneurs can learn from and cope with firm failure (e.g., Hsu et al., 2017; Jenkins et al., 2014; Shepherd et al., 2009; Ucbasaran et al., 2010, 2013; Yamakawa et al., 2015). In the context of reward-based crowdfunding, Piening et al. (2021) find that the severity and persistence of failures are important predictors of entrepreneurs’ subsequent behavior. Importantly, an unsuccessful equity crowdfunding campaign does not automatically imply that a startup will go bankrupt. However, little attention has been devoted to heterogeneity in firm-level effects and reactions to unsuccessful business decisions. In this study, we shed new light on how different startups react differently to unsuccessful equity crowdfunding campaigns.

2. Literature and Hypotheses Development

Over the last decade, equity crowdfunding has emerged as a novel market that allows small investors to directly engage in financing entrepreneurial ventures. Extant studies have primarily investigated the factors that lead to funding success on equity crowdfunding platforms (e.g., Ahlers et al., 2015). Within this debate, the literature has identified equity retention (Ahlers et al., 2015; Vismara, 2016), risk information (Ahlers et al., 2015), comments on the platform

(Block et al., 2018), and professional investors' involvement (Vismara, 2018) as fundraising success factors. Other studies have focused on the funding dynamics during campaigns (e.g., Hornuf and Schwienbacher, 2018; Meoli and Vismara, 2021; Vismara, 2018). More recently, studies have begun to investigate the effects of successfully raising equity crowdfunding for follow-on fundraising, startup performance, and startup survival (e.g., Butticcè et al., 2020; Coakley et al., 2021; Coakley et al., 2022; Cumming et al., 2019; Hornuf et al., 2018; Signori and Vismara, 2018; Walthoff-Borm et al., 2018b).

Surprisingly, while over half of the campaigns are unsuccessful (Rossi et al., 2021), we know little about what happens after an unsuccessful equity crowdfunding campaign, except that it can significantly increase the odds of startup failure (Walthoff-Borm et al., 2018a). However, the factors that explain post-campaign outcomes for startups that experienced successful campaigns cannot be simply generalized to startups that experienced unsuccessful campaigns. Accordingly, we develop new theoretical insights into how startups react differently to unsuccessful equity crowdfunding campaigns. To do so, we consider heterogeneity in the ownership structure of startups because owners, which in this context overlap with management or the entrepreneurial team, will be the key decision-makers in small, privately held ventures (e.g., Cassar, 2004) that list on equity crowdfunding platforms.

Extant theoretical and empirical research highlights that while all firms have both financial and non-financial goals (e.g., Argote and Greve, 2007; Cyert and March, 1963), non-financial goals are considered a major contributing factor to the behavioral differences between family and non-family firms (e.g., Chrisman et al., 2013). Family firms are especially likely to emphasize the nonfinancial goals that generate SEW (Chrisman et al., 2018; Chrisman and Patel, 2012; Gómez-Mejía et al., 2010; Osakwe et al., 2022). SEW refers to the non-financial aspects of the firm that meet the family's affective needs, such as fulfilling the needs for belonging, affect, and intimacy; the discharge of familial obligations; and the capacity to act

altruistically toward family members using firm resources (Gómez-Mejía et al., 2007). If there is a threat to SEW, family firms are willing to make decisions that are not driven purely by financial logic; in fact, such decisions are viewed from the perspective of avoiding any loss in SEW (Berrone et al., 2012). For example, family firms may invest less in R&D (Gómez-Mejía et al., 2010) and engage less in diversification (Anderson and Reeb, 2003; Gómez-Mejía et al., 2010) if such decisions are required to attract outside managerial talent, thus reducing family control over the firm, which represents a loss in SEW.

While SEW issues have received ample attention in established family firms, these issues are relevant “across the life cycle of a family in its firm” (Miller and Le Breton-Miller, 2014: 714). For example, founders of family firm startups may want to establish a robust business that can be passed on to later generations. Many family business startups employ family resources and networks; thus, the family and the startups are deeply embedded (Zahra, 2021). Moreover, the local communities in which family business startups operate are often vitally important for them (Lumpkin and Bacq, 2021). Overall, family business startups often value non-financial goals over financial goals.

In what follows, we provide new theoretical insights on how family business startups will differ from non-family business startups in terms of their persistence in raising equity capital after a failed campaign and how they change the structure of their offering (i.e., providing voting rights or not) in subsequent equity capital increases.

2.1. Family business startups and persistence in fundraising after an unsuccessful equity crowdfunding campaign

We propose that after an unsuccessful campaign, issues related to the preservation of SEW and startup survival explain why family business startups have stronger incentives to secure equity capital than their non-family peers. First, family business startups are more persistent than non-family business startups in strategic decision-making, where strategic persistence is defined as

the continuation of patterns of resource allocation in key strategic dimensions over time (e.g., Finkelstein and Hambrick, 1990; Hambrick et al., 1993). Because strategic change usually involves a loss of SEW and is expensive, Fang et al. (2021) show that family firms have more persistent strategies, including financial strategies (i.e., leverage or the debt-to-equity ratio), than non-family firms. Startups may initially search for equity crowdfunding to decrease financial leverage and bring it back to a lower target level. However, after an unsuccessful equity crowdfunding campaign, financial leverage increases because there is no new equity infusion. This situation might be particularly problematic for family business startups because excessive financial leverage increases the risk of failure and may threaten family wealth, networks, and cohesion (Michiels and Molly, 2017). Accordingly, family business startups are expected to be more persistent in their search for new equity capital following unsuccessful equity crowdfunding campaigns.

Second, Walthoff-Borm et al. (2018a) suggest that startups that search for equity crowdfunding on Crowdcube might have few alternative means, because they usually lack internal funds and already have excessively high leverage ratios. For example, they show that about 55% of startups that search for equity crowdfunding have more debt than total assets, which means that they have no equity buffer due to large transferred losses. Additionally, an unsuccessful equity crowdfunding campaign entails negative feedback from the crowd, which may induce startups to scale down or abandon their growth projects. While limited financial resources and negative feedback could push startups to scale down or abandon their plans, this behavior is less likely for family than for non-family business startups. For family firms, this decision would entail a significant reduction in SEW because the family's cohesion and wealth can be tightly linked to the entrepreneurial project (e.g., Berrone et al., 2012; Lumpkin and Brigham, 2011; Sasaki et al., 2020). Accordingly, after an initially unsuccessful equity crowdfunding campaign, family business startups are expected to be more likely to persist in

their search for new equity capital than non-family business startups are, in order to attract the necessary resources to pursue their projects and obtain positive market feedback.

Last, an unsuccessful equity crowdfunding campaign could potentially threaten startups' survival. Indeed, Walthoff-Borm et al. (2018a) show that approximately 40% of startups fail in the short term after an unsuccessful campaign, while this is only 15% for startups with a successful campaign. This failure might be a consequence of an unsuccessful campaign and a related lack of financial resources (Cooper et al., 1994). For some entrepreneurs, this situation might result in a deliberate decision to stop the firm because it performs below a threshold and/or that it is no longer financially optimal to continue (Gimeno et al., 1997). However, for family business startups, such a purely financial view is less dominant; rather, they value the SEW related to continuing their business activities. Consistent with this view, family business startups have been shown to have lower performance thresholds than non-family business startups and commit more to a course of action, even when not financially optimal, to preserve their SEW (e.g., Symeonidou et al., 2021). Furthermore, family owners tend to concentrate equity holdings in a single firm (the family business) with relatively more information about return volatility, rather than holding a more diversified portfolio (Anderson et al., 2022). Given the information advantage about their family business, and the SEW related to firm control and family succession (Osakwe et al., 2022), family owners are less likely than nonfamily owners to exit the startup, even in the case of an unsuccessful campaign. Accordingly, family business startups have significant incentives to secure equity capital to increase the survival prospects of their startups. Thus, we hypothesize the following:

H1: After an unsuccessful initial equity crowdfunding offering, family business startups are more likely to persist and raise new equity financing than non-family business startups are.

2.2. Family business startups and the provision of voting rights in a new campaign after an unsuccessful campaign

When raising external equity, entrepreneurs attract funding by giving away their shares. Thus, entrepreneurs face a challenge, namely raising additional funds entails losing (partial) control of their startups.

To address this challenge, entrepreneurs might use several mechanisms to leverage control beyond their equity shares (Fattoum-Guedri et al., 2018). Such mechanisms often rely on creating a wedge between two fundamental assets, voting rights and equity shares. By disconnecting voting rights and equity shares, entrepreneurs can maintain (full) control while raising new funds by issuing new shares. An example of a control-enhancing mechanism is dual-class shares (Chemmanur and Jiao, 2012; Cronqvist and Nilsson, 2003)—i.e., two or more classes of shares with different voting rights, where founders have a class of shares that provide greater control and voting rights, while others are offered a class of shares with little or no voting rights.

In equity crowdfunding, entrepreneurs can implement control-enhancing mechanisms by issuing different classes of shares. Some platforms (e.g., Crowdcube) provide startups with the possibility of placing both Class A (carrying voting rights) and Class B (not carrying voting rights) shares directly with small investors. Owners of Class B shares do not have voting rights, but they do have equal rights to capital distribution and dividends. Accordingly, equity crowdfunding can be a suitable alternative for family business startups. Indeed, for family business startups, the desire for control is considered one of the most important non-financial goals related to the preservation of SEW (Berrone et al., 2012).

However, Cumming et al. (2019) investigated the delivery of voting rights to crowdfunding investors and found that a higher separation between ownership and control rights lowers the likelihood of attracting financing. Hornuf et al. (2021) focused on German

crowdfunding and found that crowd investors are asked to pay higher prices if they receive more cash flow and exit rights, consistent with the view that these rights are valuable to the crowd. Potential crowdfunding investors might be reluctant to invest in inferior voting shares because they anticipate the risk of expropriation and a potential rise in agency costs. Equity crowdfunding creates a setting where startups' original owners face a trade-off between control retention and a higher likelihood of succeeding in raising external equity capital on the platform.

In the initial equity crowdfunding campaign, in alignment with the SEW perspective and family business startups' primary focus on the preservation of control, they are expected to have a lower likelihood of providing voting shares. Because of the combination of family ownership, family control and family management (Osakwe et al., 2022), family business startups are loss-averse when it comes to threats to their SEW (and, especially, diluting family control), even when this means accepting a greater performance hazard (Gómez-Mejía et al., 2007). Therefore, we anticipate that they are less likely to deliver voting rights, although this could reduce the likelihood of successful fundraising. Moreover, at an initial equity crowdfunding offering, the expected cost of control dilution is expected to be high, especially for family business startups, whereas the expected cost of the higher likelihood of a failed campaign is lower. Indeed, most entrepreneurs are overconfident (Forbes, 2005) and do not expect failure (i.e., experience an unsuccessful campaign) to overcome them (Cooper et al., 1988).

However, when family business startups are confronted with an *unsuccessful* equity crowdfunding campaign, this trade-off can fundamentally change. As previously highlighted, the actual occurrence of an unsuccessful crowdfunding campaign might force family business startups to abandon projects, which threaten family cohesion, networks, and wealth. Accordingly, the financial costs and the damage to SEW of another (second) unsuccessful campaign are expected to become more visible and acute, making them more likely to adjust

their campaign and provide voting shares to increase the odds of fundraising. Furthermore, relative to other sources of external equity, equity crowdfunding is probably the only option that allows family business startups to fulfill their need to raise external equity with a relatively small control dilution. One reason is that the equity offered to crowdfunding investors is generally a small percentage of ownership, which allows families to retain a high level of ownership and control rights. Another reason is that family business startups have considerable discretion because they raise funding from small investors who may lack the knowledge, incentives, and/or power to monitor them (Ahlers et al., 2015).¹ This situation differs when firms need to approach professional investors, such as angel investors or venture capitalists.

Combined, startups need to trade off the benefits and costs of delivering voting shares. While voting shares increase the probability of a successful campaign, they entail control dilution. In an initial equity crowdfunding campaign, family business startups should be less likely to provide voting shares; they especially value the desire for control to protect their SEW, while entrepreneurs are often overconfident and underestimate the probability that failure will occur. However, as their initial campaign turns out to be unsuccessful, the trade-offs of family business startups can fundamentally shift. Family business startups are likely to become much more willing to provide voting shares that dilute control because another unsuccessful campaign can hamper family cohesion, wealth, and networks, which not only have negative financial effects but can also severely damage SEW. Thus, the following hypothesis is proposed:

H2: After an unsuccessful initial equity crowdfunding offering, family business startups are more likely than non-family business startups to switch to delivering shares with voting rights when raising equity financing.

¹ Moreover, the crowd often consists of a large number of uncoordinated people. As such, this situation entails that family control remains very likely. Even when the shares of the crowd are managed by a single nominee (as is often the case with, for example, Seedrs), the nominee does not take a seat in a board of directors (Walthoff-Borm et al., 2018b).

3. Data and Method

3.1. Empirical setting: The UK equity crowdfunding market

Equity crowdfunded startups get small contributions from a comparatively large number of individuals who invest in startups in exchange for shares (Ahlers et al., 2015). On the supply side, equity crowdfunding allows small investors to choose which startup to finance directly. However, relative to traditional public equity markets, equity crowdfunding is characterized by loose regulation and investor protection. As long as investors comply with investment limits based on personal income or net worth, crowdfunding investors have access to any equity crowdfunding offering selected by the platform (e.g., Rossi et al., 2021). On the demand side, equity crowdfunding provides an opportunity to raise external equity capital for startups that find it difficult to access traditional financing. Compliance costs and entry barriers are much lower than those for public offerings. Furthermore, because crowdfunding investors are likely to have low incentives and capabilities to evaluate investment opportunities, equity crowdfunding offers financing opportunities to traditional businesses that might be less attractive to traditional professional investors, who strictly prefer business models with high growth potential.

The UK has the largest equity crowdfunding market in Europe, both in terms of offerings and capital raised (CCAF, 2020). Since 2011, more than £2 billion has been invested in over 1,500 companies on equity crowdfunding platforms in the UK (TechCrunch, 2020). Beauhurst (2021) reports show that equity crowdfunding platforms have been operating as the most active UK equity investors in 2020 in terms of the number of deals, with 424 deals backed by the crowd.

Because the UK represents the largest equity crowdfunding market in the world, it provides researchers with a large population of startups that launched equity crowdfunding offerings (irrespective of whether the campaigns were successful). Other countries also have

equity crowdfunding markets, but the volumes are lower in terms of both the number of campaigns and capital raised. Even the US provides a more limited number of equity crowdfunding offerings than the UK (e.g., Rossi et al., 2021). Moreover, as most studies have used the UK empirical setting, either focusing on one platform in isolation (e.g., Butticiè et al., 2020; Cumming et al., 2019; Cumming et al., 2021a; Signori and Vismara, 2018; Vismara, 2016, 2018; Walthoff-Borm et al., 2018a, 2018b) or the market as a whole (e.g., Coakley et al., 2021; Coakley et al., 2022; Rossi et al., 2021), our focus on the UK further increases empirical consistency with previous research.

The UK equity crowdfunding market is dominated by three platforms: Crowdcube, Seedrs, and SyndicateRoom (Coakley and Lazos, 2021). Crowdcube pioneered the UK equity crowdfunding market in 2011 and was one of the first equity crowdfunding platforms in the world (Rossi and Vismara, 2018). From platform inception to October 2020, Crowdcube facilitated an increase of more than £1 billion with a community of one million members (Crowdcube, 2020). Seedrs made a crowdfunding debut in 2012 and hit £1 billion in total capital soon after January 2021 (Seedrs, 2021). SyndicateRoom has been operating as an equity crowdfunding platform from 2013 to 2019, during which time over £250 million of capital has been raised. In October 2019, the platform moved towards a new investment model and became a venture capital fund that no longer offers individual crowdfunding investment opportunities (Beahurst, 2020).

3.2. Sample

The sample construction process consisted of several steps. First, we use the websites of Crowdcube, Seedrs, and SyndicateRoom to identify and collect data on startups that launched a crowdfunding offering on these three platforms from February 1, 2011 to October 31, 2020. Collecting complete information on past equity crowdfunding campaigns from platform websites may be challenging (Butticiè et al., 2020; Walthoff-Borm et al., 2018a). Platforms do

not archive all past equity crowdfunding offerings on their websites, especially those offerings with an unsuccessful outcome. To ensure maximum data coverage, we monitored the platforms over time from the inception of the UK equity crowdfunding market. We initiated data collection in 2013 by collecting information on crowdfunding offerings directly from platform websites. Information about the few offerings launched before 2013 was collected using the Wayback Machine-Internet Archive.² Both Crowdcube and Seedrs allow entrepreneurs to launch different types of offerings, such as equity, convertibles, and debt (in the form of bonds). Since we focus on equity crowdfunding, we exclude 143 offerings that differ from equity offerings. As a result of this selection step, we identify a population of 4,083 equity crowdfunding offerings, irrespective of their fundraising outcomes.

Second, we exclude equity crowdfunding offerings by startups that have already launched equity crowdfunding offerings. Prior literature has differentiated between initial and seasoned equity crowdfunding offerings (e.g., Coakley et al., 2022; Signori and Vismara, 2018). Based on the information available on the webpage of each offering, we group offerings by issuing startups. Then, we classify an equity crowdfunding offering as “initial” if the issuing startup seeks to raise equity capital for the first time on a platform among Crowdcube, Seedrs, or SyndicateRoom. This step resulted in the identification of 3,200 initial equity crowdfunding offerings.

Finally, we differentiated between successful and unsuccessful initial equity crowdfunding offerings. The three platforms adopt an “all-or-nothing” funding approach (Belleflamme et al., 2014; Cumming et al., 2020), which allows entrepreneurs to receive funding only if the offering raises 100% of the target amount, namely, if the offering is successful. If the target amount is not met, investors receive their capital back. By looking at the amount raised at the closing date of each offering, we classified offerings based on their

² The Wayback Machine allows the user to see what websites looked like in the past (web.archive.org).

successful and unsuccessful outcomes. Consistent with our focus on the question of what happens after an unsuccessful offering, our final sample comprises 1,769 startups that tried to raise equity crowdfunding, but were unsuccessful at the initial offering.³ This evidence suggests that unsuccessful equity crowdfunding campaigns are common, representing approximately 55% of initial equity crowdfunding campaigns.

3.3. Outcome variables

To test our first hypothesis, we assess the post-offering outcomes of family and non-family business startups that launched an equity crowdfunding offering but were unsuccessful. Startups are monitored from the offering closing day to March, 2021 and are categorized into three post-offering outcomes, namely failure, new equity rounds, and active startups. Similar to Cumming et al. (2019) and Signori and Vismara (2018), we follow a hierarchical criterion: first, we identify those startups that failed after the initial equity crowdfunding offerings (*Failure*); then, among startups that did not fail, we identify those that still successfully attract equity financing after the unsuccessful initial equity crowdfunding offering, either in the form of equity crowdfunding or private equity (*New Equity Round*).⁴ Finally, we identify active startups as those that did not fail at the end of the observation window, but did not raise any external equity capital after the unsuccessful initial equity crowdfunding (*Active*).

Startups that failed after an initial unsuccessful equity crowdfunding campaign (*Failure*) were identified based on data obtained from the Orbis Europe database managed by Bureau Van Dijk, which draws its data from the Companies House for UK startups.⁵ Orbis

³ In the first step of our analysis, a selection regression between successful and unsuccessful offerings is performed to consider possible bias introduced by selection in the unsuccessful sample. For this purpose, we use a sample of 3,200 initial equity crowdfunding offerings, which includes both successful and unsuccessful offerings, as described previously.

⁴ We did not observe any startup that failed after raising follow-up capital. Hence, there is no overlap between the *Failure* and the *New Equity Round* outcome. Since the limited number of observations prevented us from modeling M&As as an outcome, we excluded the 44 startups targeted as M&A from our sample (16 of these startups launched an unsuccessful initial equity crowdfunding offering, while the remaining 28 launched a successful initial equity crowdfunding offering).

⁵ Companies House is a government agency acting as the official registrar of UK companies.

Europe also includes data on non-UK startups registered in other European countries. Orbis Europe also allows us to find data on a sample of 178 startups incorporated outside the UK. The Orbis Europe database also reports whether a startup is in default of payment or subject to insolvency proceedings, thereby allowing us to identify startups that are distressed or have ceased operating despite being formally active. Based on national identification numbers and startup names available on platform websites, we matched all startups that launched crowdfunding offerings with Orbis Europe. A “failure” is identified when a startup shows one of the following statuses: “bankruptcy,” “dissolved,” “in default of payment,” “in liquidation,” “inactive,” or “insolvency proceedings” in Orbis Europe at the end of the observation window.

Startups that successfully attract equity financing after the unsuccessful initial equity crowdfunding offering (*New Equity Round*) are identified based on the information on equity rounds carried by each sample startup, obtained through equity crowdfunding platforms, Orbis Europe, and Crunchbase (e.g., Cumming et al., 2019; Signori and Vismara, 2018). Crunchbase is a database of entrepreneurial ventures operated by TechCrunch that records information about their characteristics and relevant events. The Crunchbase data are provided by investment firms and a community of contributors, such as executives, entrepreneurs, and individual investors. Since startups that receive equity capital have incentives to make this public, contributing to an increase in their visibility and a decrease in uncertainty about their quality, Crunchbase assures a large coverage of equity rounds. Furthermore, Crunchbase uses artificial intelligence and machine learning algorithms to validate data accuracy and employs data analysts to validate and curate manual data (Crunchbase, 2021). As a result, Crunchbase is an increasingly used data source in entrepreneurial finance (e.g., Cumming et al., 2016; Fisch and Block, 2021; Hellmann and Thiele, 2015).

To test our second hypothesis, we start by examining whether family business startups are less likely to deliver voting rights for the first unsuccessful campaign and then become more

likely to switch to providing voting rights when raising new equity after an unsuccessful equity crowdfunding campaign. First, we identify startups that deliver shares carrying voting rights in their initial equity crowdfunding offering. In equity crowdfunding, different classes of shares can be issued, depending on whether they carry voting rights. While the platforms Seedrs and SyndicateRoom always deliver voting rights to crowdfunding investors, the platform Crowdcube allows entrepreneurs to deliver either B-shares, with no voting rights attached, or A-shares, carrying voting rights (Cumming et al., 2019). Our first outcome variable is *Voting Rights Initial*, equal to one if voting rights are delivered to all investors and zero otherwise. Information on whether voting rights are delivered to crowdfunding investors is available on the project pages of platform websites. Second, Hypothesis 2 suggests that in raising equity after an unsuccessful initial equity crowdfunding offering, family business startups are more likely to deliver voting rights than non-family business startups. Thus, we identify startups that deliver voting rights in the subsequent successful equity rounds. *Voting Rights Second* is defined in the same way as *Voting Rights Initial* but refers to the second (now successful) equity offering. While the information on the different classes of shares delivered through second equity crowdfunding rounds is available on platform websites, for private equity rounds such information is available in the filing documents on Companies House.

3.4. Identification of family business startups

To test our hypotheses concerning the impact of family business startups on persistence in equity fundraising and voting rights delivery, we must distinguish between family and non-family business startups. In line with the family business literature (e.g., Kotlar et al., 2018), our analysis implements a dummy variable (*Family*) equal to one if there are at least two members of the top management team with the same surname. We obtained information on the top management team by scrutinizing the platform websites' team pages at the launch of the initial equity crowdfunding offering. We identified 301 family business start-ups in the sample.

Consistent with Cumming et al. (2019), we find that approximately 17% of unsuccessful campaigns relate to family business startups. Appendix A provides prototypical examples of family business startups active on equity crowdfunding platforms.

Family business startups can be defined based on family management (e.g., Daily and Dollinger, 1992), governance (e.g., Wilson et al., 2013), and ownership (e.g., Donckels and Fröhlich, 1991; Faccio and Lang, 2002). In our study, we employed a family management definition for two reasons. First, not all startups have created a formal board of directors at the launch of crowdfunding offerings (Cumming et al., 2021b). Specifically, 37% of startups in our sample have only one director. Thus, it is difficult to apply a family governance definition to the context of equity crowdfunding. Second, while our empirical definition starts from the family management perspective, family management and ownership almost entirely overlap in equity crowdfunding. We gathered the list of shareholders of each startup in our sample from Orbis Europe and found that owners with the same surname are all members of the top management team. There are only 11 out of 301 family business startups where the older member of the family owns the whole business. By excluding such startups from the sample when running our models, the results remained the same.

3.5 Control variables

We controlled for a series of variables related to the offering, measured at the launch of the initial equity crowdfunding offerings, and sifted through the presentation pages for each project made available on platform websites. We controlled for target capital (*Target*), measured in thousands of British pounds, and the percentage of equity offered (*Equity Offered*). The delivery of voting rights is identified by a dummy variable (*Voting Rights Initial*) equal to one if all investors are delivered with voting rights and zero otherwise. Furthermore, because offerings can be eligible for tax incentives according to the UK Enterprise Investment Scheme (EIS) or

the Seed Enterprise Investment Scheme (SEIS), we employ a dummy (*Tax Incentives*) that equals one if a startup is eligible for EIS or SEIS.

We also added controls related to startups collected from Orbis Europe. The quality of the startup crucially affects the likelihood of going through each post-offering outcome. Following Signori and Vismara (2018), we employed two variables to control for this effect. First, we controlled for the presence of non-executive directors given their potentially valuable advisory role, setting a dummy variable (*Non-Executive Directors*) equal to one if the startup appointed at least one non-executive director before the launch of the initial equity crowdfunding offering. Second, we capture intellectual capital by a dummy variable (*Patents*), which equals one if the startup possesses or has applied for a patent, and zero otherwise. As Orbis Europe only provides information on the number of patents, we manually searched for patent documents in Espacenet⁶ and considered only those whose application date was before the launch of the initial equity crowdfunding offering. We controlled for startup age (*Age*), measured at the offering launch as the number of years since formal incorporation, and startup size (*Total Assets*), measured as the natural logarithm of one plus the startup's total assets. Total assets refer to the value of the balance sheet the year before the offering, expressed in millions of British pounds.⁶ We also include a variable (*Directors*) that measures the number of board members appointed before the launch of the offering, controlling for the contribution of the board's human capital to the likelihood of going through each of the post-offering outcomes. As in Walthoff-Borm et al. (2018a), we control for startups' excessive debt by employing a dummy variable (*Excessive Debt Level*) equal to one when startups have more debt than total assets (and hence all equity has been absorbed by transferred losses). To control for startup quality and their propensity to fail, we include the credit score assigned to firms available on

⁶ For startups incorporated outside the UK, total assets are originally expressed in local currency. We convert such values to British pounds through Orbis Europe, by using exchange rates of the date in which the balance sheet is published.

the FAME database (*Creditworthiness*). This variable ranges from 0 to 100, with lower scores representing a higher likelihood of bankruptcy over the next 12 months. The rating is for a commercial product, so its exact calculation is proprietary information. As Peel (2019: 657) highlights, these credit scores are available “to subscribers to FAME (such as banks) and are also included in credit reports that can be purchased (e.g., by creditors or potential creditors) from Jordans Limited, a major UK business information provider.” We control for the possible effect of being in London by adding a dummy variable (*London*) if the startup was incorporated in London. Finally, we include the year of the offering launch, startup sector (1-digit SIC level), and platform dummies in our estimates. Appendix B describes all variables used in our estimates.

3.6. Econometric approach

3.6.1. Entropy Balancing

Family business startups might be more likely to obtain funding after an unsuccessful offering because they are different from non-family business startups in terms of specific characteristics. To adjust for differences between family and non-family business startups, we use entropy balancing (Hainmueller, 2012). Entropy balancing has important advantages over conventional matching procedures (such as nearest-neighbor matching or propensity score matching), leading to a higher degree of covariate balance and offering more accurate matching results (Hainmueller, 2012; Hainmueller and Xu, 2013). Furthermore, in contrast to traditional matching techniques, entropy balancing prevents the loss of information (no observations are discarded), thereby retaining efficiency for the subsequent analysis. In our study, family business startups are matched with non-family business startups that are similar in terms of age (years from the foundation of the startup), size (total assets), and industry (SIC 1 digit) at the time of the initial equity crowdfunding offering. The adjustment includes the first, second, and

third moments of covariate distributions. The weights obtained from entropy balancing were then included in each regression model.⁷

3.6.2. *Models*

We used a competing risks proportional hazard duration model (Fine and Gray, 1999), fitted using the maximum likelihood approach. This approach allowed us to determine the hazard rate for the post-campaign outcome scenario of interest in the presence of other possible competing scenarios.

In our setting, we consider a new equity round as the event of interest with failure as the competing event. Active companies correspond to the right-censored observations. The time to the occurrence of the event is measured in months from the closing date of the initial equity crowdfunding offering, as reported on the platform websites. For failed companies, the event date is the failure date or commencement date of the first insolvency case if the startup is in administration or liquidation, according to the Orbis Europe database. For the equity crowdfunding rounds, we use the date of completion, as reported on the platform websites, or of the private deal, as recorded in Crunchbase. If a startup conducts multiple equity rounds, the outcome is determined by the first successful equity round.

Given that our analysis is conducted on startups that have experienced unsuccessful initial equity crowdfunding offerings, there is a possibility that the selection in the unsuccessful sample is not random. Consequently, the unobservable characteristics that determine a startup's initial unsuccessful offerings may be correlated with the likelihood of going through a specific post-offering outcome, thereby producing biased estimates. Following prior studies on post-offering outcomes of equity crowdfunding offerings (e.g., Cumming et al., 2019; Signori and

⁷ As an alternative to entropy balancing, we performed an additional analysis where weights are calculated by coarsened exact matching (Blackwell et al., 2009). This matching technique resulted in a final matched sample of 2,751 firms (449 startups were discarded), with an improvement in the in-sample multivariate imbalance from $L1 = 0.399$ to $L1 = 0.225$, showing a higher balance. Results remained qualitatively unchanged.

Vismara, 2018), we address this potential source of selection bias by adopting a two-step Heckman procedure (Heckman, 1979). In the first step, we model the probability of conducting a successful initial crowdfunding offering using probit regression with the success dummy (*Success*) as the dependent variable. Success is a dummy variable equal to one for startups that raise enough capital to reach the offering target in the initial equity crowdfunding offering and zero otherwise. In this step, all startups that launched their offerings on Crowdcube, Seedrs, or SyndicateRoom were included in our analysis. We include family ownership, characteristics of the offering and startup, year, industry, and platform dummies as the independent variables. The Heckman model requires exclusion restrictions to address potential sources of selection bias in the second step (Certo et al., 2016). Exclusion restrictions are included as independent variables in the first step to predict whether an observation appears in a sample (Angrist, 2001) and to compute an adjustment factor (inverse Mills ratio) that is then included in the second step (Bushway et al., 2007). Following prior research, we identify an exclusion restriction (*Competing Offerings*), defined as the natural logarithm of one plus the number of offerings active and available on the Crowdcube, Seedrs, and SyndicateRoom at the launch date of a specific offering (Cumming et al., 2019; Signori and Vismara, 2018; Vismara, 2018). This measure is an important determinant of offering success (Vismara, 2018), but is presumably uncorrelated with a startup's likelihood of going through a given post-offering outcome.⁸ In the second step, we model the determinants of post-offering outcomes while correcting for selection bias with the inclusion of the inverse Mills ratio (*IMR Success*), estimated in the first step, among the independent variables.

⁸ The exclusion restriction (*Competing offering*) in a two-step Heckman procedure should significantly influence the probability of an observation appearing in the sample (*Success*) but should be uncorrelated with the ultimate dependent variable of interest (*New Equity Round*). The correlation coefficient between *Competing offering* and *New Equity Round* is 0.03 and not statistically significant ($p=0.25$). In addition, Table 3 shows that *Competing offering* influences the probability of an observation appearing in our final sample ($\beta = -0.49, p = 0.00$). *Competing offering* is, therefore, a statistically appropriate exclusion restriction.

Our analysis further tests whether family business startups differ in the delivery of voting rights. Specifically, we first investigated the impact of family business startups on the decision to deliver voting rights in unsuccessful initial equity crowdfunding offerings. To do so, we used a probit model with *Voting Rights Initial* as the dependent variable. To assess whether voting rights are delivered in subsequent successful equity rounds, we focused on a subsample of 167 startups that raised equity after an unsuccessful initial equity crowdfunding offering. Controlling for the initial provision (or not) of voting rights, we estimated another probit model with *Voting Rights Second* as a dependent variable to examine whether family business startups are more likely to change their offering and provide voting rights.

4. Results

4.1. Descriptive statistics

Table 1 reports the descriptive statistics for the sample of 1,769 startups that launched an unsuccessful initial equity crowdfunding offering. As reported in the first two columns of Table 1, eventually 9% of startups successfully raise equity, while 39% fail after an unsuccessful initial equity crowdfunding offering. The percentage of startups that are family business startups is 17%. Concerning ownership and governance, 56% of startups deliver voting rights in their initial equity crowdfunding offerings, while equity offered is, on average, 14.35% (median=12.50). The average target is set at £236.30K (median=150). Most startups are eligible for tax relief (64%), while 9% of startups have non-executive directors on their boards. Only 6% of startups had patents before the launch of the initial equity crowdfunding offering (similar statistics are reported in previous studies, e.g., Rossi et al., 2021; Le Pendeven and Schwienbacher, 2021). The startups are on average 2.96 years old (median=2.00) and the average total assets is £143.81K (median=9.43). The average number of directors is 2.37 (median=2.00), 22% of startups show excessive debt levels, and 28% are based in London.

[Insert Table 1 here]

In the second part of Table 1, we present the descriptive statistics by distinguishing between family and non-family business startups. Our sample included 301 family business startups and 1,468 non-family business startup observations. Looking at post-offering outcomes, new equity rounds are more common among family business startups (12%) than among non-family peers (8%). Failures are less common in family business start-ups (29% vs. 41%). Concerning voting rights, 50% of family business startups initially deliver voting rights, while a larger proportion of startups initially deliver voting rights among non-family business startups (57%). The percentage of equity offered (14.69% vs. 14.28%) and the target capital set (£238.25K vs. £235.91K) by family business startups are similar to their non-family peers. In addition, the percentage of startups eligible for tax incentives was similar across the two groups (63% vs. 65%). Concerning startup characteristics, the main differences between family and non-family businesses relate to age, number of directors, level of debt, and startup location. Family business startups are, on average, older than nonfamily business startups (3.92 vs. 2.76 years). The average family business startup has three directors on the board, whereas non-family business startups have between two and three directors (2.25). Startups with excessive levels of debt are more frequent among family business startups (29%) than non-family business startups (21%). In addition, startups located in London were less common in the family business startup sample (20%) than in the non-family business startup sample (30%).

In the third part of Table 1, we compare startups across three post-offering outcomes: new equity rounds (167 observations), failure (700 observations), and active startups (902 observations). The proportion of family business startups is significantly higher among new equity rounds (22%) and lower among failures (12%). Startups delivering voting rights are more frequent among new equity round startups (65%) than across failed ones (52%). While the average percentage of equity offered in the initial offering is the highest among failed startups (15.88%), new equity round startups offer only 12.93% of equity on average. The target amount

is lowest across failed startups (£172.25K). The proportion of startups eligible for tax incentives is significantly larger among those that raise equity after the initial offering. Concerning the characteristics of startups, we find that the sample of startups that successfully raised equity after the initial offerings have the largest proportion of startups with patents (13%), the largest average number of directors on the board (3.38), and that most of them are based in London (38%). The sample of failed startups, instead, shows the smallest portion of startups with non-executive directors (6%) and patents (4%). Failed startups are the youngest startups, with an average of 2.11 years of age, and the smallest startups with average total assets equal to £59.06K. Additionally, failed startups have the lowest average number of directors (1.85), and only 25% are based in London.

Table 2 presents the correlations between the variables employed in our analysis, except for the year, industry, and platform dummies. The maximum variance inflation factor in all multivariate regressions reported is below 1.5, indicating that multicollinearity is not a concern (Neter et al., 1996).

[Insert Table 2 here]

Figure 1 provides details on the time horizon between the unsuccessful initial equity crowdfunding offering and subsequent equity financing. We find that most new equity rounds (85.2%) take place within two years of the initial unsuccessful offering, whereas only a few rounds take place after five years (0.03%). This is an important insight, because it suggests that raising new equity capital after an initial unsuccessful offering becomes less likely over time.

[Insert Figure 1 here]

4.2. Main results

Table 3 reports the results on how our independent variable *Family* relates to the post-offering outcomes and to the delivery of voting rights of equity crowdfunding offerings. To study post-offering outcomes, we implement a competing risk model for the new equity round (Model 2)

and failure (Model 3), and a selection model for (un)successful offerings (Model 1). To investigate the delivery of voting rights, we adopt two Probit models: first, we focus on the delivery of voting rights in the initial unsuccessful offering (Model 4); then, we consider the delivery of voting rights in the new equity round (Model 5).

Model 1, which identifies (un)successful offerings, allows for an analysis of the selection process. We found that our measure of competing offerings is negatively related to offering success ($p < 0.001$). Interestingly, we fail to find a difference in the success of family business startups and non-family business startups. We find that the delivery of *Voting Rights* increases the probability of a successful campaign ($p < 0.10$). Instead, equity offered has a negative and statistically significant coefficient ($p < 0.001$), indicating that equity retention increases the chances of offering success. *Startup Age* is negatively related to offering success, while *Tax relief*, *Directors*, *Creditworthiness* ($p < 0.001$), *Total assets*, and *London* ($p < 0.01$) are all positively related to offering success.

Model 2 presents evidence on the variables that increase the likelihood of still raising new equity financing following an unsuccessful initial equity crowdfunding campaign. *Family* is strongly positive in affecting this probability ($p < 0.001$). In terms of economic impact, family business startups have a 1.95-times higher hazard rate of raising new equity than non-family business startups do.⁹ This result supports Hypothesis 1, which states that family business startups are more likely than non-family business startups to raise new equity capital after an unsuccessful equity crowdfunding campaign.

Among the control variables, we found a positive effect of *Patents* ($p < 0.10$) and *Creditworthiness* ($p < 0.01$). In Model 3, we report our analysis of the likelihood of each startup to fail and provide evidence that family business startups have a lower likelihood of failure, as

⁹ A one-unit change in the independent variable changes the hazard ratio by $(e^\beta - 1)$. In this case, the hazard rate of family business startups is 95% higher than that of non-family business startups.

indicated by the negative and statistically significant coefficient of *Family* ($p < 0.05$). While *Tax relief* ($p < 0.10$) and *Total assets* ($p < 0.05$) have a positive impact, *Age*, *Creditworthiness* ($p < 0.001$), and *Directors* ($p < 0.10$) show a negative effect. *Excessive Debt Levels* positively impact the likelihood of failure, as indicated by the positive and statistically significant coefficient ($p < 0.05$).

In Model 4, where the dependent variable is the delivery of voting rights in the initial (unsuccessful) offering, we show that *Family* is negative and statistically significant ($p < 0.10$). This finding shows that family business startups are reluctant to dilute their control in their initial offerings. *Equity offered* and *Creditworthiness* show coefficients that are negative and statistically significant ($p < 0.05$), while *Tax Relief* ($p < 0.001$) and *Directors* ($p < 0.05$) are positive and statistically significant. Model 5 shows our results for the likelihood of delivering voting rights in subsequent new equity rounds. We found that *Voting Rights* has a positive and statistically significant effect ($p < 0.05$). This finding implies that once startups decide to deliver voting rights in the initial offerings, they persist in delivering voting rights in the following rounds. Moreover, controlling for this effect, we find that family business startups are more likely to deliver voting rights in that *Family* has a positive and statistically significant coefficient ($p < 0.05$). Thus, while family business startups are reluctant to deliver voting rights in the initial offering (which turned out to be unsuccessful), they are willing to do so when they raise follow-on equity after a failed campaign. In terms of economic impact, family business startups increased the probability of delivering voting rights when raising new equity by 18.1%. This result supports Hypothesis 2.

[Insert Table 3 here]

4.3. Robustness tests

Additional analyses were performed to demonstrate the robustness of our primary findings. These analyses are presented in Appendix C.

4.3.1. Assessing reverse causality

In the theory section, we argued that family business startups are likely to become more willing to provide voting shares that dilute control after an unsuccessful offering because it can increase the probability of raising money in the future, while another unsuccessful search for money would severely damage SEW. Thus, we implicitly assume that family business startups structure the new equity round as a reaction to an initial unsuccessful offering. However, it is also possible that family business startups can raise new equity simply because they deliver voting rights in the second equity round, and that this decision is not influenced by the outcome of the previous equity crowdfunding offering. To disentangle these two alternative explanations, we ask whether our results are unique to unsuccessful offerings or if they would be the same in successful offerings (note that when entrepreneurs target initial equity crowdfunding, they all do so in the hope of raising money; if not, they would probably not start a campaign in the first place, so, for entrepreneurs, it will be largely unexpected when they end up in the unsuccessful sample). In Appendix C and Table C1, we ran our models by using a sample of successful offerings. Contrary to our main analysis, Model 1 shows that, after a successful equity crowdfunding campaign, the impact of family business startups on new equity rounds is not statistically significant. Moreover, in a new equity round, family business startups are less likely to deliver voting rights than in non-family business startups (Model 4). Overall, the findings in the successful and unsuccessful samples are different, and the additional results indicate that family business startups react uniquely to unsuccessful equity crowdfunding offerings (an outcome that was probably unexpected to them) to preserve SEW.

4.3.2. Family business startups heterogeneity

By differentiating between the two groups of family and non-family business startups, we implicitly assume that all families in our sample have similar non-economic goals and SEW. However, not all family business startups are equal (e.g., Daspit et al., 2021). Differences in the

percentage of family ownership may influence preferences for pursuing SEW and the delivery of voting rights. For example, family-owned startups might be less likely to deliver voting shares relative to family business startups that have already opened capital to non-family members, as it may be harder for family business startups to dilute control for the first time than in later stages. To consider the possibility that the likelihood of delivering voting rights is affected by the percentage of family ownership¹⁰, we consider this source of heterogeneity and show that our results are confirmed when we replace the *Family* dummy with the percentage of shares owned by the family (Appendix C, Table C2).

Additionally, we provide descriptive statistics on family ownership and voting rights using the sample of startups that raised a second equity round (Figure 2). The figure shows that *all* family business startups with family ownership equal to or above 80% dilute control in the second equity round while not delivering voting rights in the initial equity crowdfunding offering. Therefore, our results are stronger when the percentage of family ownership is larger, leading to a higher likelihood to dilute control to prevent negative financial effects associated with a second unsuccessful equity raising.

[Insert Figure 2 here]

4.3.3. *New equity rounds from equity crowdfunding platforms only*

Equity crowdfunding is not the only option available for startups to raise capital after initial unsuccessful offerings. Among the 167 firms that raise new equity capital, 66 do so from angels investors or venture capitalists. Accordingly, our main analysis considers new equity financing raised either on crowdfunding platforms or by professional investors. When startups raise equity capital from professional investors, it is not surprising that startups deliver voting rights

¹⁰ Family ownership is measured at the launch of the initial crowdfunding offering and is stable over time, as no external equity is raised, and no family owners are abandoned or entered into the startup between the initial and the new equity round. In the sample of family business startups, the percentage of family ownership is on average 80.8% (median=90%), the average number of family owners is 2.08 (median=2), while the average number of nonfamily owners is 1.08 (median=0). Information on family ownership was collected through multiple sources, including Orbis, CompaniesHouse, and platform websites.

because of the superior bargaining power of these investors in the allocation of cash flow and control rights (Cumming, 2008; Cumming and Johan, 2008). To consider the possibility that family business startups are still more likely to deliver voting rights when they continue to search for equity capital on crowdfunding platforms, we restrict our definition of new equity rounds to include only new equity crowdfunding offerings (Appendix C, Table C3). We find evidence that family business startups have a 2.31-times higher hazard rate of raising new equity on crowdfunding platforms than non-family business startups. In doing so, family business startups amend the structure of their offering by being 58.5% more likely to provide voting rights in subsequent crowdfunding offerings than non-family business startups.

Furthermore, we examine whether family business startups make other changes to the structure of their offerings by switching crowdfunding platforms, adjusting the percentage of equity offered, and the amount of target capital. We find that startups tend to decrease their initial level of equity offered and target capital as they launch a subsequent equity crowdfunding round. However, we find no evidence of a significant difference in behavior between family and non-family business startups.

4.3.4. The ownership of startups

We control for further sources of heterogeneity in startups' ownership by incorporating additional control variables into our model. First, non-family business startups may include lone-founder or founder teams (e.g., Kotlar et al., 2018; Miller et al, 2011). We consider this additional heterogeneity and study startup owners by differentiating between family, lone-founder, and founder teams (Appendix C, Table C4, Panel A). We did not find any significant effect of single founders on the likelihood of raising new equity finance and voting rights delivery, while results concerning family business startups confirm our previous findings.

Second, some campaign startups are already backed by early-stage equity investors, such as angel investors or venture capitalists (e.g., Kleinert et al., 2020; Signori and Vismara,

2018). Specifically, 7% of startups in our sample attracted equity financing by a business angel or a venture capitalist prior to the launch of the equity crowdfunding offering. As such startups may exhibit different outcomes or behaviors due to the selection and value-adding activities of such investors, we examine the impact of early-stage equity on our outcome variables (Panel B in Table C4). Unsurprisingly, we document a positive effect of early-stage equity on the likelihood of raising follow-on equity. More importantly, the results of family business startups are confirmed once again.

Last, startups may have a female founder. Previous research has highlighted the potential of crowdfunding to democratize the financing of underrepresented categories of entrepreneurs, such as women (e.g., Cumming et al., 2021a). When controlling for female founders (Panel C in Table C4), the results on the effects of family business startups on post-offering outcomes and voting rights delivery are confirmed.

5. Conclusions

This study investigates what happens after an unsuccessful equity crowdfunding campaign, using as an empirical setting the population of 1,769 startups that had an initial unsuccessful equity crowdfunding offering on the UK crowdfunding platforms Crowdcube, Seedrs, and SyndicateRoom during 2011–2021. We provide evidence of how family business startups approach equity crowdfunding and, more broadly, digital finance markets. Our results show that family business startups are more likely to raise equity after an unsuccessful equity crowdfunding campaign, and, in doing so, they are more likely to switch to offering shares with voting rights.

5.1 Contributions

First, this study contributes to the equity crowdfunding literature. We extend this literature by providing first-time evidence of startup behavior following an initial unsuccessful equity crowdfunding campaign. In doing so, we shifted the literature from an exclusive focus on

successful campaigns (Signori and Vismara, 2018) to the investigation of unsuccessful offerings. We provide novel insights on how heterogeneity in the ownership structure of startups explains unique differences in fundraising after unsuccessful campaigns. We show that the evidence from unsuccessful campaigns does *not* necessarily generalize to successful campaigns. Ultimately, this evidence stresses the importance for future research to examine unsuccessful campaigns in much more detail. More broadly, we triangulated the perspectives of crowdfunding, startup ownership (i.e., family business startups versus non-family business start-ups), and corporate governance (i.e., the provision of voting shares or not). The fact that so little research has focused on ownership, which largely overlaps with the entrepreneurial team, in the equity crowdfunding context is remarkable. Indeed, owners and/or entrepreneurs are the key decision-makers in startups (Cassar, 2004) and the equity crowdfunding context provides discretion to entrepreneurs to differently structure their offerings, providing more or less rights to the crowd of investors, which can have important governance implications (Cumming et al., 2021b).

Second, we contribute to the family business literature, which has so far paid little attention to family business startups and their connection to digital finance markets (e.g., Michiels and Molly, 2017). We provide evidence and examples of the (unexpected) presence of family business startups in equity crowdfunding. Family business startups account for 19% of successful crowdfunding offerings and 17% of unsuccessful offerings. Focusing on the latter, we show that family business startups are about twice as likely to raise equity after an unsuccessful equity crowdfunding offering. We argue that SEW considerations explain the persistence of family business startups in equity crowdfunding. Furthermore, we characterize family business startups in terms of how they structure their offerings. Although family business startups are initially less likely to dilute their control by sharing voting rights with external investors, they subsequently accept the delivery of voting rights to secure funding. This is an

interesting insight that might stimulate future theorizing about the characterization of family business startups and their use of alternative digital forms of financing in family business research.

Finally, we extend the research on entrepreneurial failure by providing insights into the heterogeneous firm-level reactions to unsuccessful financing decisions. Few insights on this matter exist in the entrepreneurial finance literature because failed financing events are often unobservable in other contexts (i.e., entrepreneurs that fail to raise venture capital are not recorded in commercial databases) (Cosh et al., 2009). As discussed, our approach focuses on the peculiarities of family business startups and their persistence in searching for equity after a failed campaign. Remarkably, our results show that 90% of startups that launched an equity crowdfunding campaign after an initial failure were successful, suggesting that the crowd is willing to provide finance to entrepreneurial teams who demonstrate persistence and continue to search for equity.

5.2 Limitations and Additional Avenues for Future Research

This study has some limitations that open avenues for future research. While we provide new insights into the uniqueness of family business startups relative to non-family business startups in equity crowdfunding, we do not consider several aspects related to the financing behavior of family business startups. Future work will need to investigate how family business startups are financed and the factors that drive family business startups to search for equity crowdfunding. For example, the choice to raise capital through equity crowdfunding might be impacted by family business startups with different levels of resource availability and their existing capital structure (Rong et al., 2022). Another aspect that could be important is that equity crowdfunding allows family business startups to raise equity without necessarily giving away voting rights.

Moreover, the investigation of family-owned startups in the context of equity crowdfunding provides an opportunity to study how family business startups communicate with

crowds before and after the offering. Future research may explore how family business startups combine costly signaling and other forms of communication, such as startup characteristics that are not observable in quantitative records (Cumming et al., 2020; Johan and Zhang, 2020). While entrepreneurs who do not communicate with potential investors send out undesirable signals on start-up quality, sharing qualitative business information can also be cheap talk, as it is not directly verifiable. Whether qualitative family-related information facilitates communication between families and crowdfunding investors, leading to better fundraising outcomes has not yet been investigated.

Further studies regarding family heterogeneity are also needed. In recent years, the number of studies investigating family firm heterogeneity has grown, leading to insights that family firms differ from one another in their economic growth and SEW (e.g., Daspit et al., 2021). Future work will need to provide further insights into how financing decision-making in family business startups on equity crowdfunding platforms is affected by variations in the importance attached to SEW, generational involvement, the role of women and other underrepresented groups in entrepreneurship (e.g., Cumming et al., 2019), as well as differences in family age, wealth, and risk aversion (Anderson et al., 2022).

We provide evidence on how startups react to an unsuccessful equity crowdfunding offering, but we do not quantify the consequences of an unsuccessful offering as reflected in the costs for the startup. According to Ucbasaran et al. (2013), failure costs are financial, social, and psychological. Startups launching an equity crowdfunding campaign face financial costs associated with campaign preparation and planning (e.g., business planning and marketing expenses) as well as social costs, as an unsuccessful offering can damage a startup's reputation. Negative feedback from an unsuccessful offering may also have an impact on the emotional and motivational costs for entrepreneurs. However, negative crowdfunding feedback contains information that might be useful in rethinking entrepreneurial teams' investment strategies,

thereby providing real option value. More insight is needed regarding the nature of the costs associated with an unsuccessful offering and the extent to which entrepreneurs can learn from it.

Our analysis suggests that future research should consider crowdfunding learning outcomes and that families learn from an unsuccessful equity crowdfunding campaign, as they are willing to switch to deliver voting rights in subsequent equity raising to increase the probability of success. It would be interesting to investigate whether and how entrepreneurs learn from the crowdfunding experience regarding how to better interact with external investors. Future studies could adopt a broader array of campaign characteristics and investigate the differences between initial and subsequent campaigns in an attempt to detect potential learning paths.

5.3 Practical implications

Our study has important practical implications on both the demand and supply sides of capital. Our findings invite capital providers to carefully consider startup ownership characteristics such as family ownership when considering investments in equity crowdfunding. Importantly, we document that investments in equity crowdfunding offerings by family business startups are safer as they have a lower probability of failure. Second, our study provides investors with insights into the possibility of obtaining voting rights by investing in family business startups that launch a new equity crowdfunding campaign after an initial unsuccessful attempt. On the demand side, entrepreneurs may learn from family business startups' approaches to equity crowdfunding markets. While an unsuccessful campaign may be an obstacle to the growth for many entrepreneurs, family business startups persist in raising equity capital. Corporate governance mechanisms, such as the delivery of voting rights, are used to increase the possibility of raising capital.

Our findings also have important implications for policymakers. We show that startups do raise equity, even after an initial unsuccessful campaign. To facilitate transparency with investors and entrepreneurs, the European Commission has pointed out the necessity for platforms to maintain all appropriate records related to their transactions (European Commission, 2018). However, platforms currently only disclose actual transactions, while unsuccessful equity crowdfunding campaigns are gradually removed from platform websites. Our study highlights the informative potential of defining disclosure standards for equity crowdfunding platforms, as well as unsuccessful campaigns.

Overall, this study adds novel insights to the nexus of equity crowdfunding, entrepreneurial finance, and family business literature. We hope that our study has laid the foundation for future work to pay more attention to unsuccessful equity crowdfunding offers because they provide a unique opportunity to observe how entrepreneurs cope with failures in the entrepreneurial finance process. Furthermore, we hope that our study will foster future research that links the crowdfunding literature with the family business literature because family business startups are an important and unique category of firms on equity crowdfunding platforms.

References

- Ahlers, G.K.C., Cumming, D., Günther, C., Schweizer, D., 2015. Signaling in Equity Crowdfunding. *Entrepreneurship Theory and Practice* 39, 955–980. <https://doi.org/10.1111/etap.12157>
- Anderson, R., Karim, M., Li, N., Reeb, D.M., n.d. The Family Firm Ownership Puzzle. *Review of Corporate Finance* 2, forthcoming.
- Anderson, R.C., Reeb, D.M., 2003. Founding-Family Ownership, Corporate Diversification, and Firm Leverage. *The Journal of Law and Economics* 46, 653–684. <https://doi.org/10.1086/377115>
- Angrist, J.D., 2001. Estimation of Limited Dependent Variable Models With Dummy Endogenous Regressors: Simple Strategies for Empirical Practice. *Journal of Business & Economic Statistics* 19, 2–28. <https://doi.org/10.1198/07350010152472571>
- Argote, L., Greve, H.R., 2007. A Behavioral Theory of the Firm – 40 Years and Counting: Introduction and Impact. *Organization Science* 18, 337–349. <https://doi.org/10.1287/orsc.1070.0280>
- Beauhurst, 2020. The Deal Equity investment in the UK 2019 <https://www.beauhurst.com/research/the-deal/>.
- Beauhurst, 2021. The Deal Equity investment in the UK in 2020 <https://www.beauhurst.com/research/the-deal/>.
- Belleflamme, P., Lambert, T., Schwienbacher, A., 2014. Crowdfunding: Tapping the right crowd. *Journal of Business Venturing* 29, 585–609. <https://doi.org/10.1016/j.jbusvent.2013.07.003>
- Berrone, P., Cruz, C., Gómez-Mejía, L.R., 2012. Socioemotional Wealth in Family Firms: Theoretical Dimensions, Assessment Approaches, and Agenda for Future Research. *Family Business Review* 25, 258–279. <https://doi.org/10.1177/0894486511435355>
- Blackwell, M., Iacus, S., King, G., Porro, G., 2009. Cem: Coarsened Exact Matching in Stata. *The Stata Journal* 9, 524–546. <https://doi.org/10.1177/1536867X0900900402>
- Blaseg, D., Cumming, D., Koetter, M., 2021. Equity Crowdfunding: High-Quality or Low-Quality Entrepreneurs? *Entrepreneurship Theory and Practice* 45, 505–530. <https://doi.org/10.1177/1042258719899427>
- Block, J., Hornuf, L., Moritz, A., 2018. Which updates during an equity crowdfunding campaign increase crowd participation? *Small Business Economics* 50, 3–27. <https://doi.org/10.1007/s11187-017-9876-4>
- Bruton, G., Khavul, S., Siegel, D., Wright, M., 2015. New Financial Alternatives in Seeding Entrepreneurship: Microfinance, Crowdfunding, and Peer-to-Peer Innovations. *Entrepreneurship Theory and Practice* 39, 9–26. <https://doi.org/10.1111/etap.12143>
- Bushway, S., Johnson, B.D., Slocum, L. A., 2007. Is the magic still there? The use of the Heckman two-step correction for selection bias in criminology. *Journal of quantitative criminology* 23, 151-178. <https://doi.org/10.1007/s10940-007-9024-4>
- Butticè, V., Di Pietro, F., Tenca, F., 2020. Is equity crowdfunding always good? Deal structure and the attraction of venture capital investors. *Journal of Corporate Finance* 65, 101773. <https://doi.org/10.1016/j.jcorpfin.2020.101773>
- Cardon, M.S., Kirk, C.P., 2015. Entrepreneurial Passion as Mediator of the Self-Efficacy to Persistence Relationship. *Entrepreneurship Theory and Practice* 39, 1027–1050. <https://doi.org/10.1111/etap.12089>
- Cassar, G., 2004. The financing of business start-ups. *Journal of Business Venturing* 19, 261–283. [https://doi.org/10.1016/S0883-9026\(03\)00029-6](https://doi.org/10.1016/S0883-9026(03)00029-6)
- CCAF, 2020. The Global Alternative Finance Market Benchmarking Report <https://www.jbs.cam.ac.uk/wp-content/uploads/2020/08/2020-04-22-ccaf-global->

- [alternative-finance-market-benchmarking-report.pdf](#).
- Certo, S.T., Busenbark, J.R., Woo, H., Semadeni, M., 2016. Sample selection bias and Heckman models in strategic management research: Sample Selection Bias and Heckman Models. *Strategic Management Journal* 37, 2639–2657. <https://doi.org/10.1002/smj.2475>
- Chemmanur, T.J., Jiao, Y., 2012. Dual class IPOs: A theoretical analysis. *Journal of Banking & Finance* 36, 305–319. <https://doi.org/10.1016/j.jbankfin.2011.07.010>
- Chrisman, J.J., Chua, J.H., Le Breton-Miller, I., Miller, D., Steier, L.P., 2018. Governance Mechanisms and Family Firms. *Entrepreneurship Theory and Practice* 42, 171–186. <https://doi.org/10.1177/1042258717748650>
- Chrisman, J.J., Patel, P.C., 2012. Variations in R&D Investments of Family and Nonfamily Firms: Behavioral Agency and Myopic Loss Aversion Perspectives. *Academy of Management Journal* 55, 976–997. <https://doi.org/10.5465/amj.2011.0211>
- Chrisman, J.J., Sharma, P., Steier, L.P., Chua, J.H., 2013. The Influence of Family Goals, Governance, and Resources on Firm Outcomes. *Entrepreneurship Theory and Practice* 37, 1249–1261. <https://doi.org/10.1111/etap.12064>
- Clough, D.R., Fang, T.P., Vissa, B., Wu, A., 2019. Turning Lead into Gold: How Do Entrepreneurs Mobilize Resources to Exploit Opportunities? *Academy of Management Annals* 13, 240–271. <https://doi.org/10.5465/annals.2016.0132>
- Coakley, J., Lazos, A., 2021. New developments in equity crowdfunding: A review. *Review of Corporate Finance* 1, 341–405. <http://dx.doi.org/10.1561/114.000000008>
- Coakley, J., Lazos, A., Liñares-Zegarra, J.M., 2021. Seasoned equity crowdfunded offerings. *Journal of Corporate Finance* 101880. <https://doi.org/10.1016/j.jcorpfin.2020.101880>
- Coakley, J., Lazos, A., Liñares-Zegarra, J.M., 2022. Equity Crowdfunding Founder Teams: Campaign Success and Venture Failure. *British Journal of Management* 33, 286–305. <https://doi.org/10.1111/1467-8551.12494>
- Cooper, A.C., Gimeno, J., Woo, C.Y., 1994. Initial human and financial capital as predictors of new venture performance. *Journal of Business Venturing* 9, 371–395. [https://doi.org/10.1016/0883-9026\(94\)90013-2](https://doi.org/10.1016/0883-9026(94)90013-2)
- Cooper, A.C., Woo, C.Y., Dunkelberg, W.C., 1988. Entrepreneurs' perceived chances for success. *Journal of Business Venturing* 3, 97–108. [https://doi.org/10.1016/0883-9026\(88\)90020-1](https://doi.org/10.1016/0883-9026(88)90020-1)
- Cosh, A., Cumming, D., Hughes, A., 2009. Outside Entrepreneurial Capital. *The Economic Journal* 119, 1494–1533. <https://doi.org/10.1111/j.1468-0297.2009.02270.x>
- Cronqvist, H., Nilsson, M., 2003. Agency Costs of Controlling Minority Shareholders. *The Journal of Financial and Quantitative Analysis* 38, 695. <https://doi.org/10.2307/4126740>
- Crowdcube, 2020. Celebrating 1m members <https://www.crowdcube.com/explore/blog/crowdcube/celebrating-1m-members>.
- TechCrunch, 2020. Crowdcube and Seedrs agree to merge, creating a significant private equity marketplace. <https://techcrunch.com/2020/10/05/crowdcube-and-seedrs-agree-to-merge-creating-a-significant-private-equity-marketplace/>
- Crunchbase, 2021. The Crunchbase data difference <https://about.crunchbase.com/products/the-crunchbase-difference/>
- Cumming, D.J., 2008. Contracts and Exits in Venture Capital Finance. *Review of Financial Studies* 21, 1947–1982. <https://doi.org/10.1093/rfs/hhn072>
- Cumming, D.J., Johan S.A., 2008. Preplanned exit strategies in venture capital. *European Economic Review* 52, 1209–1241. <https://doi.org/10.1016/j.euroecorev.2008.01.001>
- Cumming, D.J., Leboeuf, G., Schwienbacher, A., 2020. Crowdfunding models: Keep-It-All vs. All-Or-Nothing. *Financial Management* 49, 331–360.

- <https://doi.org/10.1111/fima.12262>
- Cumming, D.J., Meoli, M., Vismara, S., 2019. Investors' choices between cash and voting rights: Evidence from dual-class equity crowdfunding. *Research Policy* 48, 103740. <https://doi.org/10.1016/j.respol.2019.01.014>
- Cumming, D.J., Meoli, M., Vismara, S., 2021a. Does equity crowdfunding democratize entrepreneurial finance? *Small Business Economics* 56, 533–552. <https://doi.org/10.1007/s11187-019-00188-z>
- Cumming, D.J., Vanacker, T., Zahra, S.A., 2021b. Equity Crowdfunding and Governance: Toward an Integrative Model and Research Agenda. *Academy of Management Perspectives* 35, 69–95. <https://doi.org/10.5465/amp.2017.0208>
- Cumming, D.J., Walz, U., Werth, J.C., 2016. Entrepreneurial Spawning: Experience, Education, and Exit. *Financial Review* 51, 507–525. <https://doi.org/10.1111/fire.12109>
- Cyert, R.M., March, J., 1963. *A behavioral theory of the firm*. Prentice-Hall.
- Daily, C.M., Dollinger, M.J., 1992. An Empirical Examination of Ownership Structure in Family and Professionally Managed Firms. *Family Business Review* 5, 117–136. <https://doi.org/10.1111/j.1741-6248.1992.00117.x>
- Daspit, J.J., Chrisman, J.J., Ashton, T., Evangelopoulos, N., 2021. Family Firm Heterogeneity: A Definition, Common Themes, Scholarly Progress, and Directions Forward. *Family Business Review* 34, 296–322. <https://doi.org/10.1177/08944865211008350>
- Donckels, R., Fröhlich, E., 1991. Are Family Businesses Really Different? European Experiences from STRATOS. *Family Business Review* 4, 149–160. <https://doi.org/10.1111/j.1741-6248.1991.00149.x>
- Drover, W., Busenitz, L., Matusik, S., Townsend, D., Anglin, A., Dushnitsky, G., 2017a. A Review and Road Map of Entrepreneurial Equity Financing Research: Venture Capital, Corporate Venture Capital, Angel Investment, Crowdfunding, and Accelerators. *Journal of Management* 43, 1820–1853. <https://doi.org/10.1177/0149206317690584>
- Drover, W., Wood, M.S., Zacharakis, A., 2017b. Attributes of Angel and Crowdfunded Investments as Determinants of VC Screening Decisions. *Entrepreneurship Theory and Practice* 41, 323–347. <https://doi.org/10.1111/etap.12207>
- European Commission, 2018. Proposal for regulation of the European Parliament and of the Council on European Crowdfunding Service Providers (ECSP) for Business. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A52018PC0113>
- Faccio, M., Lang, L.H.P., 2002. The ultimate ownership of Western European corporations. *Journal of Financial Economics* 65, 365–395. [https://doi.org/10.1016/S0304-405X\(02\)00146-0](https://doi.org/10.1016/S0304-405X(02)00146-0)
- Fang, H. “Chevy,” Chrisman, J.J., Holt, D.T., 2021. Strategic Persistence in Family Business. *Entrepreneurship Theory and Practice* 45, 931–950. <https://doi.org/10.1177/10422587211001806>
- Fattoum-Guedri, A., Delmar, F., Wright, M., 2018. The best of both worlds: Can founder-CEOs overcome the rich versus king dilemma after IPO? *Strategic Management Journal* 39, 3382–3407. <https://doi.org/10.1002/smj.2960>
- Fine, J.P., Gray, R.J., 1999. A Proportional Hazards Model for the Subdistribution of a Competing Risk. *Journal of the American Statistical Association* 94, 496–509. <https://doi.org/10.1080/01621459.1999.10474144>
- Finkelstein, S., Hambrick, D.C., 1990. Top-Management-Team Tenure and Organizational Outcomes: The Moderating Role of Managerial Discretion. *Administrative Science Quarterly* 35, 484. <https://doi.org/10.2307/2393314>
- Fisch, C., Block, J.H., 2021. How does entrepreneurial failure change an entrepreneur's

- digital identity? Evidence from Twitter data. *Journal of Business Venturing* 36, 106015. <https://doi.org/10.1016/j.jbusvent.2020.106015>
- Forbes, D.P., 2005. Are some entrepreneurs more overconfident than others? *Journal of Business Venturing* 20, 623–640. <https://doi.org/10.1016/j.jbusvent.2004.05.001>
- Gimeno, J., Folta, T.B., Cooper, A.C., Woo, C.Y., 1997. Survival of the Fittest? Entrepreneurial Human Capital and the Persistence of Underperforming Firms. *Administrative Science Quarterly* 42, 750. <https://doi.org/10.2307/2393656>
- Gómez-Mejía, L.R., Haynes, K.T., Núñez-Nickel, M., Jacobson, K.J.L., Moyano-Fuentes, J., 2007. Socioemotional Wealth and Business Risks in Family-controlled Firms: Evidence from Spanish Olive Oil Mills. *Administrative Science Quarterly* 52, 106–137. <https://doi.org/10.2189/asqu.52.1.106>
- Gómez-Mejía, L.R., Makri, M., Kintana, M.L., 2010. Diversification Decisions in Family-Controlled Firms. *Journal of Management Studies* 47, 223–252. <https://doi.org/10.1111/j.1467-6486.2009.00889.x>
- Gómez-Mejía, L.R., Patel, P.C., Zellweger, T.M., 2018. In the Horns of the Dilemma: Socioemotional Wealth, Financial Wealth, and Acquisitions in Family Firms. *Journal of Management* 44, 1369–1397. <https://doi.org/10.1177/0149206315614375>
- Hainmueller, J., 2012. Entropy Balancing for Causal Effects: A Multivariate Reweighting Method to Produce Balanced Samples in Observational Studies. *Political analysis* 20, 25–46. <https://doi.org/10.1093/pan/mpr025>
- Hainmueller, J., Xu, Y., 2013. ebalance: A Stata Package for Entropy Balancing. *Journal of Statistical Software* 54, 1-18. <https://doi.org/10.18637/jss.v054.i07>
- Hambrick, D.C., Geletkanycz, M.A., Fredrickson, J.W., 1993. Top Executive Commitment to the Status Quo: Some Tests of Its Determinants. *Strategic Management Journal* 14, 401–418. <https://doi.org/10.1002/smj.4250140602>
- Heckman, J.J., 1979. Sample Selection Bias as a Specification Error. *Econometrica* 47, 153. <https://doi.org/10.2307/1912352>
- Hellmann, T., Thiele, V., 2015. Friends or foes? The interrelationship between angel and venture capital markets. *Journal of Financial Economics* 115, 639–653. <https://doi.org/10.1016/j.jfineco.2014.10.009>
- Hornuf, L., Schilling, T., Schwienbacher, A., 2021. The relevance of investor rights in crowdinvesting. *Journal of Corporate Finance* 101927. <https://doi.org/10.1016/j.jcorpfin.2021.101927>
- Hornuf, L., Schmitt, M., Stenzhorn, E., 2018. Equity crowdfunding in Germany and the United Kingdom: Follow-up funding and firm failure. *Corporate Governance An International Review* 26, 331–354. <https://doi.org/10.1111/corg.12260>
- Hornuf, L., Schwienbacher, A., 2018. Market mechanisms and funding dynamics in equity crowdfunding. *Journal of Corporate Finance* 50, 556–574. <https://doi.org/10.1016/j.jcorpfin.2017.08.009>
- Hsu, D.K., Wiklund, J., Cotton, R.D., 2017. Success, Failure, and Entrepreneurial Reentry: An Experimental Assessment of the Veracity of Self-Efficacy and Prospect Theory. *Entrepreneurship Theory and Practice* 41, 19–47. <https://doi.org/10.1111/etap.12166>
- Jenkins, A.S., Wiklund, J., Brundin, E., 2014. Individual responses to firm failure: Appraisals, grief, and the influence of prior failure experience. *Journal of Business Venturing* 29, 17–33. <https://doi.org/10.1016/j.jbusvent.2012.10.006>
- Johan, S., Zhang, Y., 2020. Quality revealing versus overstating in equity crowdfunding. *Journal of Corporate Finance* 65, 101741. <https://doi.org/10.1016/j.jcorpfin.2020.101741>
- Kellermanns, F.W., Eddleston, K.A., Barnett, T., Pearson, A., 2008. An Exploratory Study of Family Member Characteristics and Involvement: Effects on Entrepreneurial Behavior

- in the Family Firm. *Family Business Review* 21, 1–14. <https://doi.org/10.1111/j.1741-6248.2007.00107.x>
- Kleinert, S., Volkman, C., Grünhagen, M., 2020. Third-party signals in equity crowdfunding: the role of prior financing. *Small Business Economics* 54, 341–365. <https://doi.org/10.1007/s11187-018-0125-2>
- Kotlar, J., Signori, A., De Massis, A., Vismara, S., 2018. Financial Wealth, Socioemotional Wealth, and IPO Underpricing in Family Firms: A Two-stage Gamble Model. *Academy of Management Journal* 61, 1073–1099. <https://doi.org/10.5465/amj.2016.0256>
- Le Pendeven, B., Schwienbacher, A., 2021. Equity Crowdfunding: The Influence of Perceived Innovativeness on Campaign Success. *British Journal of Management*, <https://doi.org/10.1111/1467-8551.12585>.
- Lukkarinen, A., Teich, J. E., Wallenius, H., Wallenius, J., 2016. Success drivers of online equity crowdfunding campaigns. *Decision Support Systems*, 87, 26–38. <https://doi.org/10.1016/j.dss.2016.04.006>
- Lumpkin, G.T., Bacq, S., 2021. Family business, community embeddedness, and civic wealth creation. *Journal of Family Business Strategy* 100469. <https://doi.org/10.1016/j.jfbs.2021.100469>
- Lumpkin, G.T., Brigham, K.H., 2011. Long-Term Orientation and Intertemporal Choice in Family Firms. *Entrepreneurship Theory and Practice* 35, 1149–1169. <https://doi.org/10.1111/j.1540-6520.2011.00495.x>
- Mahmood, A., Luffarelli, J., Mukesh, M., 2019. What’s in a logo? The impact of complex visual cues in equity crowdfunding. *Journal of Business Venturing* 34, 41–62. <https://doi.org/10.1016/j.jbusvent.2018.09.006>
- Markman, G.D., Baron, R.A., Balkin, D.B., 2005. Are perseverance and self-efficacy costless? Assessing entrepreneurs’ regretful thinking. *Journal of Organizational Behaviour* 26, 1–19. <https://doi.org/10.1002/job.305>
- Meoli, M., Vismara, S., 2021. Information manipulation in equity crowdfunding markets. *Journal of Corporate Finance* 67, 101866. doi.org/10.1016/j.jcorpfin.2020.101866.
- Michiels, A., Molly, V., 2017. Financing Decisions in Family Businesses: A Review and Suggestions for Developing the Field. *Family Business Review* 30, 369–399. <https://doi.org/10.1177/0894486517736958>
- Miller, D., Le Breton-Miller, I., 2014. Deconstructing Socioemotional Wealth. *Entrepreneurship Theory and Practice* 38, 713–720. <https://doi.org/10.1111/etap.12111>
- Miller, D., Le Breton-Miller, I., Lester, R.H., 2009. Family ownership and acquisition behavior in publicly-traded companies. *Strategic Management Journal* 31, 201–223. <https://doi.org/10.1002/smj.802>
- Miller, D., Le Breton-Miller, I., Lester, R.H., 2011. Family and Lone Founder Ownership and Strategic Behaviour: Social Context, Identity, and Institutional Logics: Firm Ownership and Strategic Behaviour. *Journal of Management Studies* 48, 1–25. <https://doi.org/10.1111/j.1467-6486.2009.00896.x>
- Neckebrouck, J., Meuleman, M., Manigart, S., 2021. Governance Implications of Attracting External Equity Investors in Private Family Firms. *Academy of Management Perspectives* 35, 25–44. <https://doi.org/10.5465/amp.2017.0204>
- Neter, J., Kutner, H., Wasserman, W., Nachtsheim, C., 1996. *Applied Linear Statistical Models*. Irwin, Chicago.
- Osakwe, C., Chua, J., Chrisman, J.J., 2022. Asset Market Equilibrium with Significant Family Involvement: Implications for Corporate Finance. *Review of Corporate Finance* 2, forthcoming.

- Peel, M.J., 2019. The impact of filing micro-entity accounts and the disclosure of reporting accountants on credit scores: an exploratory study. *Accounting and Business Research* 49, 648–681. <https://doi.org/10.1080/00014788.2018.1493374>
- Piening, E.P., Thies, F., Wessel, M., Benlian, A., 2021. Searching for Success—Entrepreneurs’ Responses to Crowdfunding Failure. *Entrepreneurship Theory and Practice* 45, 626–657. <https://doi.org/10.1177/1042258720980710>
- Rong, D., Liu, M., Wang, Y., Wu, Z., n.d. Can Family Involvement Be a Substitute for Executive Inside Debt in Lowering the Cost of Bank Loans? A Behavioral Agency Perspective. *Review of Corporate Finance* 2, forthcoming.
- Rossi, A., Vanacker, T., Vismara, S., 2021. Equity crowdfunding: New evidence from the US and UK markets. *Review of Corporate Finance* 1, 407-453. <http://dx.doi.org/10.1561/114.00000009>
- Rossi, A., Vismara, S., 2018. What do crowdfunding platforms do? A comparison between investment-based platforms in Europe. *Eurasian Business Review* 8, 93–118. <https://doi.org/10.1007/s40821-017-0092-6>
- Sasaki, I., Kotlar, J., Ravasi, D., Vaara, E., 2020. Dealing with revered past: Historical identity statements and strategic change in Japanese family firms. *Strategic Management Journal* 41, 590–623. <https://doi.org/10.1002/smj.3065>
- Seedrs, 2021. Seedrs hits £1bn in total recorded investments! <https://www.seedrs.com/learn/blog/seedrs-hits-1bn-in-total-recorded-investments>.
- Shane, S., Locke, E.A., Collins, C.J., 2003. Entrepreneurial motivation. *Human Resource Management Review* 13, 257–279. [https://doi.org/10.1016/S1053-4822\(03\)00017-2](https://doi.org/10.1016/S1053-4822(03)00017-2)
- Shepherd, D.A., Covin, J.G., Kuratko, D.F., 2009. Project failure from corporate entrepreneurship: Managing the grief process. *Journal of Business Venturing* 24, 588–600. <https://doi.org/10.1016/j.jbusvent.2008.01.009>
- Short, J.C., Ketchen, D.J., McKenny, A.F., Allison, T.H., Ireland, R.D., 2017. Research on Crowdfunding: Reviewing the (Very Recent) Past and Celebrating the Present. *Entrepreneurship Theory and Practice* 41, 149–160. <https://doi.org/10.1111/etap.12270>
- Signori, A., Vismara, S., 2018. Does success bring success? The post-offering lives of equity-crowdfunded firms. *Journal of Corporate Finance* 50, 575–591. <https://doi.org/10.1016/j.jcorpfin.2017.10.018>
- Stevenson, R., McMahan, S.R., Letwin, C., Ciuchta, M.P., 2021. Entrepreneur fund-seeking: toward a theory of funding fit in the era of equity crowdfunding. *Small Business Economics*, forthcoming. <https://doi.org/10.1007/s11187-021-00499-0>
- Symeonidou, N., DeTienne, D.R., Chirico, F., 2021. The persistence of family firms: How does performance threshold affect family firm exit? *Small Business Economics* <https://doi.org/10.1007/s11187-021-00482-9>
- Ucbasaran, D., Shepherd, D.A., Lockett, A., Lyon, S.J., 2013. Life After Business Failure: The Process and Consequences of Business Failure for Entrepreneurs. *Journal of Management* 39, 163–202. <https://doi.org/10.1177/0149206312457823>
- Ucbasaran, D., Westhead, P., Wright, M., Flores, M., 2010. The nature of entrepreneurial experience, business failure and comparative optimism. *Journal of Business Venturing* 25, 541–555. <https://doi.org/10.1016/j.jbusvent.2009.04.001>
- Vismara, S., 2016. Equity retention and social network theory in equity crowdfunding. *Small Business Economics* 46, 579–590. <https://doi.org/10.1007/s11187-016-9710-4>
- Vismara, S., 2018. Information Cascades among Investors in Equity Crowdfunding. *Entrepreneurship Theory and Practice* 42, 467–497. <https://doi.org/10.1111/etap.12261>
- Walthoff-Borm, X., Schwienbacher, A., Vanacker, T., 2018a. Equity crowdfunding: First

- resort or last resort? *Journal of Business Venturing* 33, 513–533.
<https://doi.org/10.1016/j.jbusvent.2018.04.001>
- Walthoff-Borm, X., Vanacker, T., Collewaert, V., 2018b. Equity crowdfunding, shareholder structures, and firm performance. *Corporate Governance: An International Review* 26, 314–330. <https://doi.org/10.1111/corg.12259>
- Wilson, N., Wright, M., Scholes, L., 2013. Family Business Survival and the Role of Boards. *Entrepreneurship Theory and Practice* 37, 1369–1389.
<https://doi.org/10.1111/etap.12071>
- Yamakawa, Y., Peng, M.W., Deeds, D.L., 2015. Rising From the Ashes: Cognitive Determinants of Venture Growth After Entrepreneurial Failure. *Entrepreneurship Theory and Practice* 39, 209–236. <https://doi.org/10.1111/etap.12047>
- Zahra, S.A., 2021. The Resource-Based View, Resourcefulness, and Resource Management in Startup Firms: A Proposed Research Agenda. *Journal of Management* 47, 1841–1860. <https://doi.org/10.1177/01492063211018505>

Figure 1. Time horizon from initial unsuccessful offering to new equity round. This figure graphs the sample of 167 startups that raised equity financing and the time horizon (months range) from the initial unsuccessful equity crowdfunding offering to the new equity round.

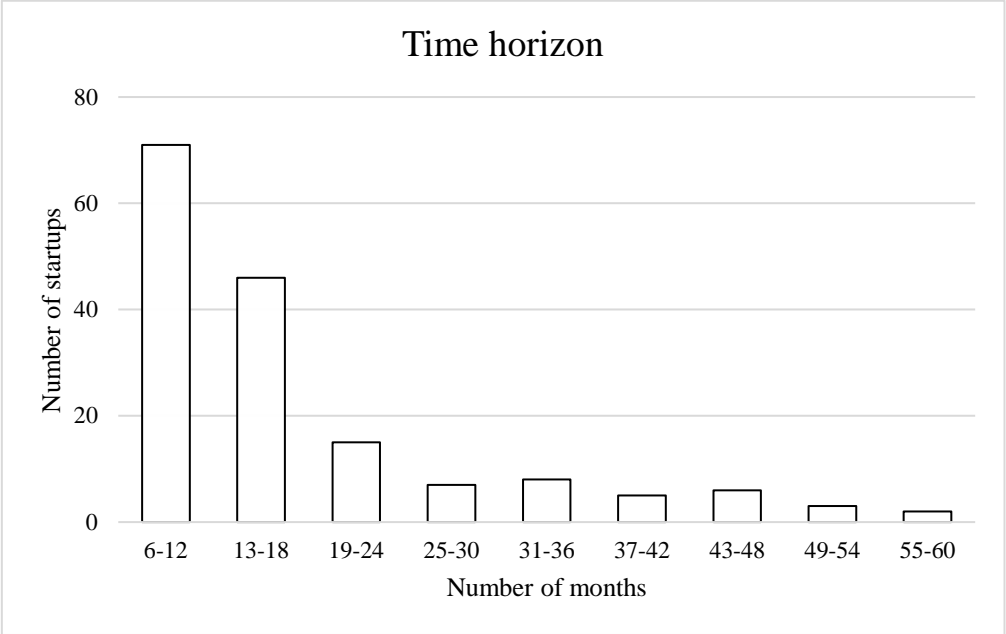


Figure 2. Family ownership and voting rights delivery. This figure graphs the sample of family business startups that raised new equity financing for each level of family ownership (percentage of shares owned by the family). Bars filled with black lines indicate the number of family business startups delivering voting rights in the initial (white) and new equity round (gray).

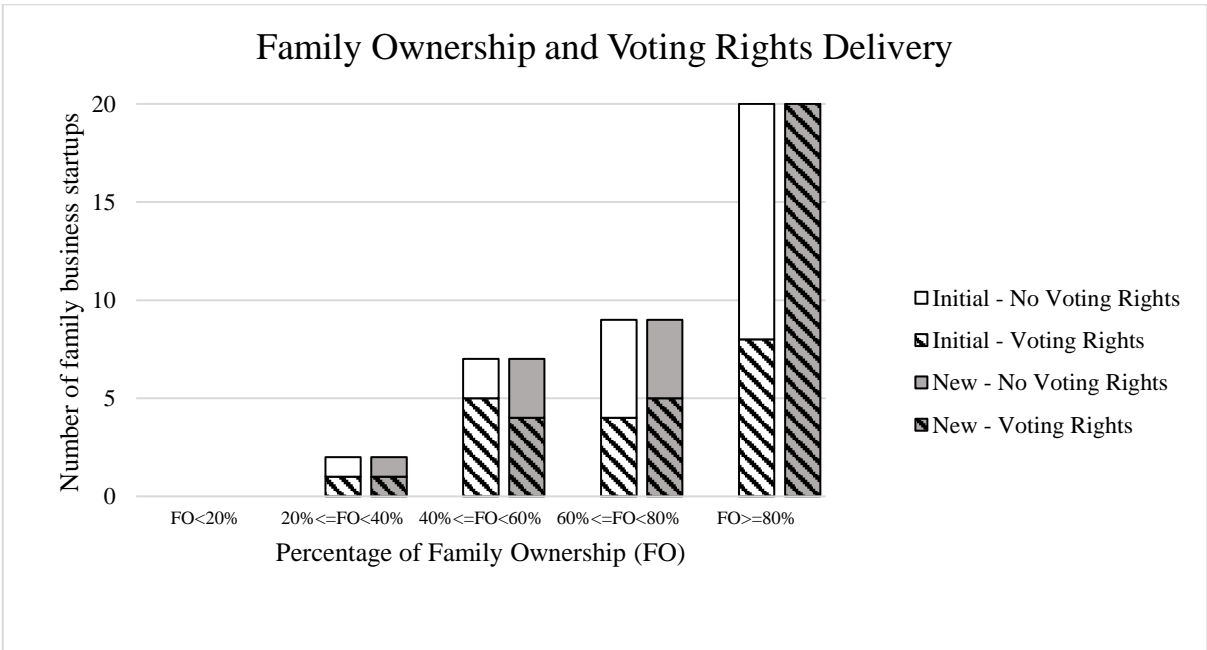


Table 1. Descriptive statistics. Population of 1,769 unsuccessful initial equity offerings in Crowdcube, Seedrs, and SyndicateRoom from February 2011 to October 2020. See Appendix B for the definition of the variables. ***, **, *, and + indicate significance at the 0.1, 1, 5, and 10% levels, respectively, of the t-test for the difference in means between the corresponding group and the rest of the sample. Z-test of equal proportions is used for dummy variables.

	Unsuccessful Initial Equity Crowdfunding offerings		Startup Ownership		Post-offering outcomes		
	1,769		Family business startups	Nonfamily business startups	New Equity Round	Failure	Active
	Mean	Median	Mean	Mean	Mean	Mean	Mean
<i>Outcome variables</i>							
New Equity Round (dummy)	0.09	0.00	0.12**	0.08	1	0	0
Failure (dummy)	0.39	0.00	0.29***	0.41	0	1	0
<i>Family ownership variable</i>							
Family (dummy)	0.17	0.00	1.00	0.00	0.22*	0.12***	0.19*
<i>Control variables: characteristics of the offering</i>							
Voting Rights Initial (dummy)	0.56	1.00	0.50*	0.57	0.65*	0.52**	0.58
Equity Offered (%)	14.35	12.50	14.69	14.28	12.93*	15.88***	13.43***
Target (K£)	236.30	150.00	238.25	235.91	268.91	172.25***	279.98***
Tax Relief (dummy)	0.64	1.00	0.63	0.65	0.71*	0.69***	0.59***
<i>Control variables: characteristics of the startup</i>							
Non-Executive Directors (dummy)	0.09	0.00	0.11+	0.08	0.11	0.06**	0.10*
Patents (dummy)	0.06	0.00	0.08	0.06	0.13***	0.04**	0.07
Age (years)	2.96	2.00	3.92***	2.76	2.77	2.11***	3.65***
Total Assets (K£)	143.81	9.43	138.25	144.95	152.11	59.06***	208.04***
Directors (no.)	2.37	2.00	3.00***	2.25	3.38***	1.85***	2.59***
Excessive Debt Levels (dummy)	0.22	0.00	0.29**	0.21	0.17	0.21	0.24+
Creditworthiness (score)	12.79	0.00	17.63***	11.80	24.78***	0.15***	20.38***
London (dummy)	0.28	0.00	0.20**	0.30	0.38**	0.25**	0.29

Table 2. Correlation matrix. Population of 1,769 unsuccessful initial equity crowdfunding offerings in Crowdcube, Seedrs, and SyndicateRoom from February 2011 to October 2020. Variance inflation factors (VIFs) are obtained after estimating an OLS regression of *New Equity Round* against all variables. See Appendix B for the definition of the variables. ***, **, *, and + indicate significance at the 0.1, 1, 5, and 10% levels, respectively.

Variables	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	VIF
(1) New Equity Round	1															
(2) Failure	-0.2***	1														1.13
(3) Family	0.04*	-0.08***	1													1.06
(4) Voting Rights Initial	0.06*	-0.07**	-0.05*	1												1.13
(5) Equity Offered	-0.05*	0.14***	0.01	-0.12***	1											1.08
(6) Target	0.03	-0.14***	0.00	0.01	0.00	1										1.19
(7) Tax Relief	0.04*	0.08***	-0.01	0.27***	-0.05*	-0.14***	1									1.14
(8) Non-Executive Directors	0.02	-0.07**	0.04+	0.07**	-0.03	0.09***	-0.09***	1								1.09
(9) Patents	0.09***	-0.07**	0.03	0.01	-0.06**	0.13***	-0.02	0.04+	1							1.10
(10) Age	-0.01	-0.20***	0.13***	-0.05*	-0.09***	0.25***	-0.14***	0.16***	0.14***	1						1.35
(11) Total Assets	0.03	-0.17***	0.05*	-0.03	-0.16***	0.32***	-0.10***	0.16***	0.19***	0.38***	1					1.45
(12) Directors	0.18***	-0.23***	0.15***	0.03	-0.08***	0.23***	-0.06**	0.23***	0.25***	0.17***	0.38***	1				1.36
(13) Excessive Debt Levels	-0.03	-0.02	0.07***	-0.06**	-0.06**	0.07***	0.01	0.02	0.07***	0.23***	0.05*	0.07**	1			1.09
(14) Creditworthiness	0.19***	-0.52***	0.11***	-0.03	-0.11***	0.18***	-0.01	0.03	0.12***	0.20***	0.28***	0.27***	0.07**	1		1.10
(15) London	0.07**	-0.06**	-0.07**	0.01	-0.06**	0.06**	0.05*	0.00	0.00	0.01	0.09***	0.09***	0.07**	0.06**	1	1.04
Mean VIF																1.17

Table 3. Family business startups, post-offering outcomes and the delivery of voting rights. The table reports the results of a two-step Heckman selection model after controlling for systematic differences between family and nonfamily business startups. Weights are obtained from entropy balancing model (Hainmueller, 2012), where family business startups are matched with nonfamily business startups which are similar in terms of industry (SIC 1 digit), age (years from the foundation of the startup), and size (total assets) at the time of the initial equity crowdfunding offering. The first step of the two-step Heckman selection model on the determinants of post offering outcomes is a Probit regression with the success dummy as the dependent variable (Model 1) and the sample is made of the whole population of 3,200 initial equity crowdfunding offerings on UK platforms from February 2011 to October 2020. Success is a dummy variable equal to one for startups that successfully raise capital through an initial equity crowdfunding offering, zero otherwise (mean value equal to 0.44). Competing offerings, defined as the number of offerings active and available at the launch date of the considered offering, is the instrumental variable (mean value equal to 29.77). The second step is a competing risks regression on post-offering outcomes, using the sample of 1,769 unsuccessful offerings. The competing risks regression has three possible outcomes, i.e., new equity round (Model 2), failure (Model 3), and active startups being the baseline outcome. Model 4 is a Probit model with *Voting Rights Initial* as the dependent variable, namely the delivery of voting rights in the initial unsuccessful equity crowdfunding offering. In Model 5 we use the sample of 167 startups that successfully raise equity after an initial unsuccessful equity crowdfunding offering. We run a Probit model with *Voting Rights Second* as the dependent variable, namely the delivery of voting rights in the new equity round (mean value is equal to 0.75). Year of the initial equity crowdfunding offering, industry (1-digit SIC level), and platform fixed effects are included. See Appendix B for the definition of the variables. ***, **, *, and + indicate significance at the 0.1, 1, 5, and 10% levels, respectively.

	(1)	(2)	(3)	(4)	(5)
	Success	New Equity Round	Failure	Voting Rights Initial	Voting Rights Second
Family	-0.06 (0.07)	0.67*** (0.18)	-0.22* (0.10)	-0.19+ (0.11)	1.94* (0.93)
Voting Rights	0.18+ (0.11)	-0.05 (0.35)	0.01 (0.17)	- (0.11)	1.65* (0.77)
Equity Offered	-0.02*** (0.00)	-0.00 (0.02)	-0.00 (0.01)	-0.02* (0.01)	0.01 (0.04)
Target	0.06 (0.09)	0.01 (0.15)	-0.21 (0.31)	0.33 (0.21)	-0.35 (2.19)
Tax Relief	0.65*** (0.08)	0.24 (0.35)	0.30+ (0.16)	0.79*** (0.11)	-0.43 (0.85)
Non-Executive Directors	0.08 (0.11)	-0.02 (0.27)	-0.20 (0.18)	0.28 (0.18)	-1.24 (0.87)
Patents and Trademarks	0.17 (0.11)	0.46+ (0.26)	0.25 (0.18)	0.03 (0.20)	2.01 (1.73)
Age	-0.04*** (0.01)	-0.04 (0.04)	-0.08*** (0.02)	-0.01 (0.01)	0.36 (0.23)
Ln (Total Assets+1)	0.03** (0.01)	-0.05 (0.04)	0.04* (0.02)	-0.01 (0.02)	0.21+ (0.12)
Directors	0.08*** (0.02)	0.08 (0.06)	-0.07+ (0.04)	0.07* (0.03)	0.08 (0.19)
Excessive Debt Levels	-0.01 (0.07)	-0.17 (0.23)	0.22* (0.10)	-0.08 (0.12)	0.28 (1.14)
Creditworthiness	0.01*** (0.00)	0.02** (0.01)	-0.21*** (0.03)	-0.01* (0.00)	-0.02 (0.02)
London	0.18** (0.07)	0.39+ (0.22)	-0.10 (0.12)	-0.12 (0.12)	0.57 (0.69)
Ln (Competing Offerings+1)	-0.49*** (0.07)	- (0.63)	- (0.23)	- (0.17)	- (1.28)
IMR Success	- (0.27)	-0.69 (0.63)	-0.03 (0.23)	- (0.17)	- (1.28)
Constant	0.82** (0.27)	- (0.27)	- (0.27)	-0.23 (0.17)	-0.90 (1.28)
Observations	3,200	1,769	1,769	1,769	167
Log Likelihood	-624.9	-1437	-3742	-398.8	-12.88