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Which criteria matter when impact investors screen social enterprises?

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ABSTRACT

Impact investors pursue both financial and social goals and have become an important source of funding for social enterprises. Our study assesses impact investor criteria when screening social enterprises. Applying an experimental conjoint analysis to a sample of 179 impact investors, we find that the three most important criteria are the authenticity of the founding team, the importance of the societal problem targeted by the venture, and the venture's financial sustainability. We then compare the importance of these screening criteria across different types of impact investors (i.e., donors, equity investors, and debt investors). We find that donors pay more attention to the importance of the societal problem and less attention to financial sustainability than do equity and debt investors. Additionally, equity investors place a higher value on the large-scale implementation of the social project than do debt investors. We contribute to the nascent literature on impact investing by documenting how impact investors make investment decisions and by providing a nuanced view of different investor types active in this novel market. Practical implications exist for both impact investors and social enterprises.

1. Introduction

Impact investors pursue financial and social goals. Similar to traditional investors, impact investors aim for market-rate financial returns through the provision of financial assets (e.g., Brest and Born, 2013; Louche et al., 2012). However, in addition to these financial goals, impact investors aim for a positive environmental or social impact of their investment (e.g., Brest and Born, 2013; Harji and Jackson, 2012). Impact investing has grown in importance, and impact investors are an increasingly important source of funding for social enterprises (SE) (e.g., Geczy et al., 2019; The Economist, 2017). Since the advent of impact investing in 2007 (Rodin and Brandenburg, 2014), the market has grown to include 1340 impact investment organizations, with USD 502 billion in assets worldwide (Global Impact Investing Network (GIIN), 2019a). In addition, the increasing importance of impact investing has been accompanied by a surge in scholarly interest (e.g., Barber et al., 2020; Bugg-Levine and Emerson, 2011; Chowdhry et al., 2019).

Thus far, however, we know little about the investment process of impact investors. In particular, we do not know which criteria matter when impact investors screen SEs. This is an important gap in the literature that needs to be closed because SEs looking for funding require knowledge about the criteria they should focus on when applying for funding from impact investors. Since the goals of traditional investors differ from those of impact investors, the investment selection processes and the screening criteria of impact

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investors and traditional investors likely differ as well (e.g., Chowdhry et al., 2019; Hartzmark and Sussman, 2018). Hence, the findings of the established literature on the screening criteria of traditional entrepreneurial finance investors (e.g., Block et al., 2019; Gompers et al., 2020; Kaplan and Strömberg, 2004) cannot be applied to the context of impact investing. To close this gap in the literature, our study assesses the following three research questions: Which screening criteria do impact investors use, what is their relative importance, and how do they differ between different types of impact investors?

We use a multimethod design to investigate these research questions. First, we conduct 12 qualitative interviews with experts to identify impact investors' most important screening criteria. These criteria relate to the social impact (i.e., the importance of the societal problem that is addressed by the SE and the large-scale implementation of the solution), the founding team (i.e., authenticity and professional background), and the business (i.e., financial sustainability, degree of innovation, and proof of concept) of the SE.[1] Based on these screening criteria, we then conduct a conjoint experiment to quantitatively assess which of these criteria are most important for impact investors. Our conjoint experiment covers 4296 investment decisions made by 179 impact investors who invest directly in SEs.

We find that the authenticity of the founding team, the importance of the societal problem, and financial sustainability are the most important screening criteria for investors. The least important criterion is the professional background of the founding team. Hence, our results show that impact investors generally consider a mixed set of attributes when screening investment targets and making investment decisions. Focusing on differences between different types of impact investors, we show that purely philanthropic impact investors who provide SEs with donations differ in their selection processes compared to equity and debt investors. For example, donors attach a higher weight to the importance of the addressed societal problem and less importance to financial sustainability. Comparing the screening criteria of equity and debt impact investors, we find that equity investors place more importance on SEs' scalability.

We contribute to different strands of the entrepreneurial finance literature. First, we contribute to the small but growing literature on impact investing (e.g., Barber et al., 2020; Chowdhry et al., 2019; Geczy et al., 2019). Prior research is silent regarding the investment process of impact investors. Based on an experiment with a tightly controlled information environment, we identify how much importance impact investors assign to each investment criterion. Our study provides an important first step towards a better understanding of the screening and investment criteria of impact investors when selecting SEs for their portfolio. In this way, our study is not only of theoretical importance but also has practical implications for both impact investing organizations and SEs that are looking for funding. In addition to comparing the importance of particular screening criteria, our study also sheds light on the heterogeneity that exists within the group of impact investors. Equity providers, debt providers, and donors differ as investors and attach different weights to specific screening criteria reflecting differences in their investment goals. By focusing on this within-group heterogeneity, our study connects to prior research on the screening process of debt and equity investors (e.g., Berger and Udell, 1998; Mason and Stark, 2004; Ueda, 2004).

Second, our study contributes to the entrepreneurial finance literature that assesses the importance of both the funding team and its characteristics for attracting funding from entrepreneurial finance investors (e.g., Bernstein et al., 2017; Block et al., 2019; Gompers et al., 2020; Kaplan and Strömberg, 2004). Our results provide a mixed picture. While the authenticity of the founding team is critical for the impact investors in our sample, the professional background of the founding team is of low importance. This finding seems to be unique to the context of impact investing and is especially intriguing since prior research has found the professional background of the funding team to be an important criterion of VC investors (e.g., Franke et al., 2008). In this way, our study connects to the ongoing discussion of whether it is the 'horse' or the 'jockey' that matters when applying for funding with risk capital investors (e.g., Block et al., 2019; Kaplan et al., 2009). Specifically, we extend this debate to the context of impact investing and show that a cut-and-dry answer about the importance of the funding team in contrast to business and social impact characteristics is difficult to make.

Finally, our study has practical implications for the group of impact investors and for SEs that seek funding. An understanding of impact investors' screening criteria enables impact investors to benchmark themselves against both the industry as a whole and important subgroups. Also, our results support SEs in their search for funding from impact investors by identifying the key attributes of their projects that should be highlighted in an application process, particularly in the early stages of the fundraising process. Furthermore, our results provide tips on how SEs can adjust and customize their applications for different types of impact investors. For example, SEs seeking funding from an equity impact investor should emphasize their financial sustainability, whereas SEs seeking funding from donors should emphasize the importance of the social problem.

2. Conceptual background

2.1. Venture philanthropy and impact investing

The concept of venture philanthropy encompasses investments that seek to achieve social goals by fostering socially-oriented organizations (e.g., Bugg-Levine and Emerson, 2011). It distinguishes itself from conventional philanthropy by going beyond the mere allocation of donations. Venture philanthropists are active investors who provide grants as well as high-engagement, long-term, nonfinancial support to their portfolio companies (e.g., Grossman et al., 2013; Letts et al., 1997). This nonfinancial support leads to a more intense relationship with funded organizations compared to that of traditional philanthropy (Van Slyke and Newman, 2006).

[1] The screening criteria used in this study are described in detail in Table 5.

Examples of major venture philanthropy organizations are the Bill and Melinda Gates Foundation and the Keywell Foundation.

Impact investing is a domain of venture philanthropy that is closely connected to traditional venture finance (e.g., Geczy et al., 2019; Grossman et al., 2013). Similar to traditional investors, impact investors provide various types of capital and funding (e.g., Barber et al., 2020; Gray et al., 2015). Channels of impact capital include, for example, impact investment funds, social banks, or crowdfunding platforms (Social Impact Investment Taskforce, 2014). Furthermore, impact investors resemble traditional investors with regard to their financial return expectations and their investment selection process and by providing value-added services and access to networks to their portfolio companies (e.g., Brest and Born, 2013; Gordon, 2014).

2.2. Goals and types of impact investors

Despite these similarities, the goals of impact investors and traditional investors differ. In particular, impact investments strive to create a social or environmental impact in addition to seeking financial returns (e.g., Chowdhry et al., 2019; Lee et al., 2020).[2] For example, impact investors often invest in sectors that address global challenges, such as those that aim to reduce poverty or mitigate climate change (e.g., Gray et al., 2015; Geczy et al., 2019). Therefore, impact investors do not solely assess the potential financial return of portfolio ventures but also consider the social impact resulting from their investments. Prior research has also shown that impact investors are willing to sacrifice financial returns to achieve social objectives (e.g., Chowdhry et al., 2019). This further distinguishes them from traditional investors, who are predominantly interested in financial returns.

Like traditional investors, impact investors are a heterogeneous group of investors who provide a wide range of investment types (Bugg-Levine and Emerson, 2011). The GIIN (2019b) classifies different types of impact investments in a return-rate spectrum that ranges from "below market" to "market rate". Regarding the different forms of capital invested, impact investors can be subclassified as investors who provide equity, debt, and donations. This heterogeneity likely influences the screening process of these investors. Indeed, prior research on traditional investors has shown that debt investors, equity investors, and other types of investors differ significantly in their selection processes (e.g., Block et al., 2019; Lerner et al., 2007). We extend these findings to the heterogeneous field of impact investors since each impact investor type has distinctive return expectations and obligations for portfolio companies, which are likely reflected in their screening criteria.

Equity investors are the most popular impact investor type and primarily invest through impact investment funds that seek market-rate returns. These funds typically provide portfolio companies with equity and comprise entities such as venture capital or growth equity funds (e.g., Barber et al., 2020; Bugg-Levine and Emerson, 2011). Equity investors have a clear financial interest since their objective is to achieve market-rate financial returns through exit proceeds similar to traditional venture capital funding (e.g., Barber et al., 2020; Brest and Born, 2013; Gray et al., 2015).

Debt investors provide debt to portfolio companies. Typically, social banks grant this type of impact investment to SEs. Since the financial crisis, these financial institutions have grown strongly worldwide. Other impact investors of this type are foundations or public institutions. For example, the Calvert Foundation offers debt financing to nonprofits or small businesses in underserved communities (Brest and Born, 2013). Although debt investors seek financial returns, their investments are often characterized by below-market return expectations (Brest and Born, 2013).

Donors provide SEs with philanthropic donations or grants. Many SEs need this funding type to survive (Bugg-Levine et al., 2012). Philanthropic donations are provided mainly by governments, foundations, or philanthropists. Impact investors of this type are not concerned with market returns but rather concentrate on social goals. Thus, they are particularly attractive to SEs that are fully committed to the social goals of their hybrid organization (Chowdhry et al., 2019).

2.3. Selection process and screening criteria in impact investing

The selection process is of major importance for the long-term success of venture finance investors (Gompers et al., 2020). In the initial screening stage of the selection process, investment opportunities are evaluated based on a diverse set of criteria (e.g., Hall and Hofer, 1993; Warnick et al., 2018). The initial screening decision is typically very fast (e.g., Cumming et al., 2010; Fried and Hisrich, 1994; Zacharakis and Meyer, 2000), while the subsequent due diligence phase takes months (e.g., Cumming and Zambelli, 2017; Gompers et al., 2020). Gompers et al. (2016) argue that for every hundred opportunities, only 15 pass the initial screening stage and are thus evaluated more deeply. Therefore, the main task in the initial screening phase is to identify "investment-ready" ventures based on several screening criteria (e.g., Hall and Hofer, 1993; Mason and Harrison, 2004). Often, business plans are used to screen investment opportunities in the first step (Fried and Hisrich, 1994). Therefore, prior research has investigated which investment criteria are most relevant to venture finance investors when screening a business plan (e.g., Gompers et al., 2020; Kaplan and Strömberg, 2004; Zacharakis and Meyer, 2000). These criteria vary across investor types (e.g., Block et al., 2019; Lerner et al., 2007; Ueda, 2004). For example, Gompers et al. (2020) suggest that the management team is of major relevance in a selection process of venture capitalists, whereas Block et al. (2019) indicate that it is less important to leveraged buyout funds.

The structure of the investment process of impact investors is similar to that of traditional venture finance investors (e.g., venture capitalists) (Miller and Wesley, 2010). Impact investors usually screen a large number of investment opportunities to identify a small

[2] Due to the active searching by impact investors for positive changes, they also differ from socially responsible investors. Socially responsible investors initially try to do no harm with their investments and therefore exclude negatively connotated sectors (e.g., Galema et al., 2008; Hong and Kostovetsky, 2012; Renneboog et al., 2008; Riedl and Smeets, 2017).

number of ventures for further consideration. However, the investment criteria of impact investors partly differ from those of traditional investors since they follow not only financial but also social objectives (Chowdhry et al., 2019; Hartzmark and Sussman, 2018). Impact investors' goal of having a social impact through their investments is reflected in their selection process. Thus, while the team-related criteria and business-related criteria between venture finance investors and impact investors might overlap (e.g., the professional background of a team or profitability) (e.g., Gompers et al., 2020; Kaplan and Strömberg, 2001), the social impact-related criteria represent a particularity of impact investors (Miller and Wesley, 2010). Due to the even more diverse set of relevant selection criteria, a recent study by Lee et al. (2020) shows that impact investors face particular challenges in their decision-making, and the authors identify the need for further empirical research to better understand the selection processes of impact investors. For example, there is a gap of knowledge regarding how specific investment criteria might be more or less important to impact investors compared to traditional venture finance investors. Since Barber et al. (2020) show that impact investors are accepting lower IRRs, business-related criteria might therefore also be of less importance for them. Furthermore, GIIN's investor survey (2018) indicates that the amount of high-quality investment opportunities is limited, which emphasizes the need to identify promising portfolio companies in the initial screening decision.

3. Hypotheses

3.1. The importance of specific investment criteria

Against this background, we investigate the investment criteria of impact investors in the initial screening phase. Since impact investors (and their portfolio ventures) pursue a hybrid goal set, we argue that these hybrid goals are reflected in their investment criteria, and we distinguish between social impact, founding team, and business criteria.

3.1.1. Social impact criteria

Impact investors aim to address societal issues and strive for societal impact with their investments. Thus, the societal impact of their portfolio ventures is an important precondition for achieving their own impact. However, the societal impact of investment opportunities differs because not all SEs that are considered potential investments have the same potential to create societal impact (e.g., Zahra et al., 2009). For example, an SE promoting musical education in a specific region arguably has a lower societal impact than an SE that addresses climate change or global poverty. Accordingly, prior research has shown that the importance of the societal problem addressed by the SE leads to a higher level of attention from stakeholders (Zahra et al., 2008). Thus, we postulate the following hypothesis:

H1a. *: Impact investors are more likely to select an SE that addresses a highly important societal problem than an SE that addresses a societal problem of medium or low importance.*

The scalability of an SE determines the societal impact that can be achieved. The different forms of social scalability have received ample attention in prior research (e.g., Bloom and Chatterji, 2009; Dees et al., 2004; Shepherd and Patzelt, 2020; Tracey and Jarvis, 2007; Zahra et al., 2009). This research shows that societal needs can be regional, national, or even global. Hence, the potential to scale the societal impact of an SE from a regional level to a global level may be an important criterion for impact investors (e.g., Grossman et al., 2013). Thus, the following hypothesis should apply:

H1b. *: Impact investors are more likely to select an SE with a high degree of scalability than an SE with a medium or low degree of scalability.*

3.1.2. Founding team criteria

Prior research on entrepreneurial finance documents that investors consider management team characteristics as important investment criteria (e.g., Gompers et al., 2020; Kaplan and Strömberg, 2004). Typically, the characteristics considered refer to the management team's experience or educational background. For SEs, an important founding team characteristic is the authenticity with which a founding team pursues its idea. In our case, authenticity refers to how credible a founding team is in solving a certain societal problem. An explanation for the importance of authenticity is that authenticity often correlates with passion in the context of SEs (e.g., Radoynovska and King, 2019), which is an important motivational driver of venture success that investors typically seek in founding teams (e.g., Chen et al., 2009). Additionally, authenticity is an important prerequisite that helps ventures obtain commitment from other stakeholders, such as employees or customers (e.g., Radoynovska and King, 2019), thereby leading to growth. Indeed, prior research has shown that a lack of authenticity can impede SE growth (e.g., Davies et al., 2019). Being an authentic founder sends a strong and difficult to imitate signal to impact investors. Based on these arguments, we suggest the following hypothesis:

H2a. *: Impact investors are more likely to select an SE which has a highly authentic founding team than an SE with a medium or low authentic founding team.*

The educational background of SE founders varies greatly. In addition to educational backgrounds in a technical field or business, many social entrepreneurs have an educational background that is based in a social sector. This is the case because many social entrepreneurs identify their business opportunities through their own personal experiences (e.g., Renko, 2013; Yitshaki and Kropp, 2016). We shall argue that impact investors attribute more industry or field experience to social entrepreneurs with an education based in a social sector and trust them to be better able to identify important societal problems and build an impactful social venture. We propose the following hypothesis:

H2b. *: Impact investors are more likely to select an SE that has a founding team with an educational background in a social sector compared to an SE that has a founding team with a business or technical educational background.*

3.1.3. Business criteria

In addition to social impact goals, impact investors also pursue financial goals. Hence, SEs need to build a financially sustainable business model. This is especially important due to the threat of grant and donation dependency, which SEs need to avoid (e.g., Chell, 2007). In line with this argument, earlier research in entrepreneurial finance has shown that economic or business criteria generally constitute important investment criteria (e.g., Block et al., 2019; Gompers et al., 2020). Therefore, we argue that impact investors also look for investments that can demonstrate financial sustainability, and we suggest the following hypothesis:

H3a. *: Impact investors are more likely to select an SE that has a high degree of financial sustainability than an SE with a medium or low degree of financial sustainability.*

Innovation is an important characteristic of SEs. Almost by definition, SEs strive to solve societal problems in a new way. Prior research by Grossman et al. (2013) notes that venture philanthropists support SEs that use innovations to break outdated patterns and achieve social change. We argue that this preference for innovative solutions also applies to impact investors and expect that a higher degree of innovativeness increases the likelihood of an investment by an impact investor. This leads us to our next hypothesis:

H3b. *: Impact investors are more likely to select an SE that has a high degree of innovation than an SE with a medium or low degree of innovation.*

Due to their hybrid goals, SEs often have complex business models, which creates uncertainty. Hybrid business models can lead to contradictions and create tensions within the organization (Smith et al., 2013). Like all investors, impact investors aim to reduce their investment risk and, ceteris paribus, would like to invest in SEs with low levels of uncertainty. Achieving a proof of concept reduces this uncertainty and marks an important milestone for an SE, as it indicates that both financial and social objectives can be aligned and long-term impact can be achieved. Thus, we hypothesize the following:

H3c. *: Impact investors are more likely to select an SE that can provide a proof of concept than an SE that cannot provide a proof of concept.*

3.2. Differences across different types of impact investors

As mentioned above, the group of impact investors is very heterogeneous and consists of many different types. We distinguish between equity investors, debt investors, and donors. These investor types differ in their financial return expectations and the importance attached to social impact. We, therefore, assume that these differences are already reflected in the screening criteria of impact investors. This is in line with previous research, which shows that the diverse goals of investors are reflected in their decision-making and in the criteria used (Block et al., 2019). Equity and debt impact investors will emphasize business criteria as they also expect a financial return (rather than only a social impact) for their investment. Donors, in turn, do not expect a financial return for their investment but pursue primarily social goals. Accordingly, we expect donors to put comparatively more weight on social impact criteria and less weight on business criteria compared to equity and debt impact investors. Hence, the following two hypotheses should apply:

H4a. *: In contrast to donors, equity and debt impact investors put more weight on business criteria.*

H4b. *: In contrast to donors, equity and debt investors put less weight on social impact criteria.*

4. Research design

4.1. Data and sample

To assess impact investors' screening criteria, we conducted a survey-based conjoint analysis. To construct our sample, we identified impact investors in the central European D/A/CH region (Germany, Austria, and Switzerland) in two steps. First, we conducted a computerized search strategy since an established database of impact investors does not exist. Using the keywords "impact investing", "social investing", "philanthropic investing" and "social entrepreneurship", we identified impact investors from the social network platforms LinkedIn and XING (which is a German professional social networking site). We provided the impact investors with individual links to our experiment and survey.[3] In this step, we identified 763 individuals (67.6%) for our sample population. In the second step, we identified an additional set of 366 (32.4%) investors through a manual search of impact investors' and SEs' websites. As an incentive for participation, we donated 10 EUR from each participant to an SE (e.g., Africa GreenTec).[4] In total, we were able to

[3] The translated survey is included in the Online Appendix (OA.III).

[4] Information about the donations was provided on the introductory page of the experiment.

Table 1
Assessment of a potential nonresponse bias and equality of distribution.

Variable	(1) Non-respondents (N = 478)	(2) Final sample (N = 179)	(1) vs. (2)	Kolmogorov-Smirnov test
Gender				
Male	0.508	0.581	0.072	–
Age				
<30	0.165	0.263	0.098	–
30–40	0.453	0.397	−0.056	–
40–50	0.243	0.223	−0.019	–
>50	0.140	0.117	−0.023	–
Level of education				
High school graduation	0.023	0.045	0.022	–
Bachelor degree	0.138	0.117	−0.021	–
Master degree	0.677	0.670	−0.007	–
PhD	0.160	0.162	0.002	–
Age (categorical)	2.351	2.207	–	−0.102*
Level of education (categorical)	4.987	4.939	–	−0.031

To assess whether a nonresponse bias potentially influences our results, we compare non-respondents of our sample ($N = 950$) to our final sample ($N = 179$) along with several characteristics. Because of missing values for the variables age and level of education, the sample of non-respondents is reduced to $N = 486$. The first column reports the mean values in the initial population. The second column reports the mean values of our final sample. The third column reports the difference between the mean values along with the significance of z-tests for proportions. The final column reports the difference between the mean values along with the significance of a two-sided Kolmogorov-Smirnov test for equality of distribution. Significant values indicate statistically significant differences. * < 0.10, ** p < 0.05, *** p < 0.01.

Table 2
Assessment of a potential late-response bias.

Variable	(1) First half (N = 90)	(2) Second half (N = 89)	(1) vs. (2)
Gender			
Male	0.656	0.517	0.139 (0.353)
Age			
<30	0.267	0.270	−0.003 (0.984)
30–40	0.411	0.371	0.040 (0.787)
40–50	0.244	0.202	0.042 (0.778)
>50	0.078	0.157	−0.080 (0.595)
Level of education			
High school graduation	0.044	0.056	−0.012 (0.937)
Bachelor degree	0.100	0.157	−0.057 (0.702)
Master degree	0.644	0.674	−0.030 (0.842)
PhD	0.200	0.112	0.088 (0.558)
Educational background			
Business/economics	0.556	0.629	−0.074 (0.622)
Natural sciences	0.067	0.101	−0.034 (0.818)
Social sciences	0.300	0.202	0.098 (0.513)
Entrepreneurial experience	0.344	0.382	−0.038 (0.802)
Type of investment			
Donations	0.689	0.607	0.082 (0.491)
Equity	0.344	0.404	−0.060 (0.688)
Debt	0.267	0.348	−0.082 (0.585)

To assess whether our results are affected by a late-response bias, we compare the first half of our respondents (N = 90) to the second half of our respondents (N = 89) along with their individual characteristics. The first column reports the mean values in the first half of the participants. The second column reports the mean values of the second half of the participants. The last column reports the difference between the mean values along with the significance of z-tests for proportions. All variables are defined in Table 3. *P*-values are reported in brackets in the last column.

identify a population of 1129 impact investors, out of which 179[5] (response rate = 11.4%) participated in our experiment.

We conducted several tests to assess the representativeness of our sample. First, we compared the gender, age, and educational level of our respondents with those of the nonrespondents. For the nonrespondents, we collected information for all variables manually. The results of the nonrespondents' test are displayed in Table 1, which reports the mean values of both populations and a z-test for equality

[5] Compared with previous conjoint studies, the sample size of our experiment is appropriate (e.g., Franke et al., 2006, 2008; Shepherd and Zacharakis, 2002). Particularly, the high amount of observations (4296), due to the amount of decisions that had to be taken by each participants, further strengthens the reliability our results.

Table 3
Descriptive statistics and definitions of the variables.

Variable	Mean	S.D.	Min.	Max.	Description
Panel A: Characteristics of the individual impact investor					
Male	0.59	–	0	1	Participant's gender (dummy; 1 = male, 0 = female)
Age	3.19	0.96	1	5	Participant's age (categorical; 1 < 20, 2 = 20–29, 3 = 30–39, 4 = 40–49, 5 > 49)
Level of education	3.91	0.73	1	5	Participant's level of education (categorical; 1 = less than high school graduation, 2 = high school graduation, 3 = bachelor degree, 4 = master degree, 5 = PhD)
Education: business/ economics	0.59	–	0	1	Participant has an educational background in business or economics (dummy; 1 = yes, 0 = no)
Education: humanities	0.22	–	0	1	Participant has an educational background in humanities (dummy; 1 = yes, 0 = no)
Education: social sciences	0.25	–	0	1	Participant has an educational background in social science (dummy; 1 = yes, 0 = no)
Entrepreneurial experience	0.57	–	0	1	Participant has experience as an entrepreneur (dummy; 1 = yes, 0 = no)
Experience as investor	3.75	1.75	1	5	Participant's experience as an investor (categorical; 0 = No decision made, 1 = 1 decision made, 2 = 2–4 decision made, 3 = 5–10 decision made, 4 > 10 decision made)
Panel B: Characteristics of the impact investment organization					
Number of employees	2.43	2.43	1	5	Impact investor company's number of employees (categorical; 1 < 10; 2 = 10–49, 3 = 50–99, 4 = 100–249, 5 > 249)
Impact investing as core activity	0.56	–	0	1	Impact investing is the main activity of the impact investor company (dummy; 1 = yes, 0 = no)
Investment type: Equity	0.37	–	0	1	Impact investor company invests equity in portfolio companies (dummy; 1 = yes, 0 = no)
Investment type: Debt	0.31	–	0	1	Impact investor company invests debt in portfolio companies (dummy; 1 = yes, 0 = no)
Investment type: Donations	0.65	–	0	1	Impact investor company provides donations to portfolio companies (dummy; 1 = yes, 0 = no)
Motive: Stakeholder expectations	3.34	1.05	1	5	Impact investor company opinion on stakeholder expectations (ordinal; 1 = unimportant, 5 = very important)
Motive: Financial interests	2.68	1.17	1	5	Impact investor company opinion on financial interests (ordinal; 1 = unimportant, 5 = very important)
Motive: Reputation	3.25	0.99	1	5	Impact investor company opinion on reputation (ordinal; 1 = unimportant, 5 = very important)
Motive: Employer Branding	2.82	1.03	1	5	Impact investor company opinion on employer branding (ordinal; 1 = unimportant, 5 = very important)
Stage of development: Idea development	0.48	–	0	1	Impact investor company invests in the idea development stage (dummy; 1 = yes, 0 = no)
Stage of development: Seed stage	0.53	–	0	1	Impact investor company invests in the seed stage (dummy; 1 = yes, 0 = no)
Stage of development: Startup stage	0.68	–	0	1	Impact investor company invests in the startup stage (dummy; 1 = yes, 0 = no)
Stage of development: Expansion stage	0.47	–	0	1	Impact investor company invests in the expansion stage (dummy; 1 = yes, 0 = no)
Stage of development: Establishment stage	0.27	–	0	1	Impact investor company invests in the establishment stage (dummy; 1 = yes, 0 = no)
Stage of development: Exit stage	0.03	–	0	1	Impact investor company invests in the exit stage (dummy; 1 = yes, 0 = no)
Social area: Environment	0.67	–	0	1	Impact investor company focuses on environmental-oriented companies (dummy; 1 = yes, 0 = no)
Social area: Health	0.36	–	0	1	Impact investor company focuses on health-oriented companies (dummy; 1 = yes, 0 = no)
Social area: Poverty reduction	0.41	–	0	1	Impact investor company focuses on poverty reduction-oriented companies (dummy; 1 = yes, 0 = no)
Social area: Education	0.57	–	1	1	Impact investor company focuses on education-oriented companies (dummy; 1 = yes, 0 = no)
Social area: Social inclusion	0.44	–	0	1	Impact investor company focuses on social inclusion-oriented companies (dummy; 1 = yes, 0 = no)
Social area: Others	0.08	–	0	1	Impact investor company focuses on other-oriented companies (dummy; 1 = yes, 0 = no)

This table provides an overview of the full sample used in our analysis and displays descriptive statistics along with variable definitions. Panel A describes variables related to characteristics of the individual impact investor. Panel B describes variables related to characteristics of the impact investment organization. Panel C describes variables related to characteristics of the social ventures. The sample comprises of 179 participants.

of proportions. No statistically significant differences emerge across our variables, which suggests that no major differences exist between the respondents and the nonrespondents. Furthermore, we considered listed members of the European Venture Philanthropy Association (EVPA) in our experiment. In total, 45 respondents in our final sample work for EVPA organizations. These employees represent 17 of the 31 EVPA member organizations located in the DACH region (54.8%). The remaining participants originate from other organizations that invest in SEs, such as the Purpose Foundation, GLS Bank, or Invest in Visions.

Furthermore, we conducted a late-response bias test to determine whether the early respondents differed from the late respondents (Graham and Harvey, 2001). We assessed this bias by splitting our sample into two samples—the first half of the respondents ($N = 90$) and the second half ($N = 89$)—and we compared the mean values of their individual characteristics using a z-test. Table 2 shows the results. In summary, we find no statistically significant differences between the characteristics of early and late respondents; thus, a late-response bias is unlikely.

Table 4
Descriptive statistics across different types of investors.

Variable	Full sample (N = 179)	Equity (N = 67)	Debt (N = 55)	Donations (N = 116)	ANOVA
Panel A: Characteristics of the individual impact investor					
Male	0.59	0.68 (+)	0.60	0.57	
Age	3.19	3.33	3.21	3.20	
Level of education	4.91	4.93	4.93	4.94	
Education: business/economics	0.59	0.63	0.72 (+)	0.56	*
Education: humanities	0.22	0.15 (−)	0.07 (−)	0.29 (+)	***
Education: social sciences	0.25	0.21	0.18	0.28	
Entrepreneurial experience	0.57	0.69 (+)	0.62	0.54	*
Experience as investor	3.75	3.97 (+)	3.67	3.74	
Panel B: Characteristics of the impact investment organization					
Number of employees	2.43	1.95 (−)	2.44	2.69 (+)	***
Impact investing as core activity	0.44	0.36 (−)	0.27 (−)	0.49 (+)	**
Motive: Stakeholder expectations	3.34	3.36	3.36	3.28	
Motive: Financial interests	2.68	3.14 (+)	3.18 (+)	2.41 (−)	***
Motive: Reputation	3.25	3.28	3.51 (+)	3.21	
Motive: Employer Branding	2.82	2.87	2.91	2.83	
Stage of development: Idea development	0.48	0.34 (−)	0.42	0.52	**
Stage of development: Seed stage	0.53	0.51	0.53	0.55	
Stage of development: Startup stage	0.68	0.67	0.65	0.72 (+)	
Stage of development: Expansion stage	0.47	0.54	0.64 (+)	0.45	**
Stage of development: Establishment stage	0.27	0.25	0.18 (−)	0.32 (+)	
Stage of development: Exit stage	0.03	0.04	0.02	0.04	
Social area: Environment	0.67	0.76 (+)	0.70	0.67	
Social area: Health	0.36	0.42	0.43	0.34	
Social area: Poverty reduction	0.41	0.42	0.53 (+)	0.40	
Social area: Education	0.57	0.47 (−)	0.55	0.63	
Social area: Social inclusion	0.44	0.36	0.40	0.50 (+)	
Social area: Others	0.08	0.03 (−)	0.11	0.08 (+)	*

This table reports differences in the mean values across the different impact investor types included in our sample. While the first column demonstrates the mean values of the full sample (N = 179 individuals), the following columns report descriptive statistics for impact investors providing donations, equity, and debt. Panel A outlines differences across variables related to characteristics of the individual impact investor. Panel B outlines differences across variables related to characteristics of the impact investment organization. The signs in brackets (+/−) demonstrate whether the respective mean value is significantly larger (+) or smaller (−) than the mean value of the remaining sample. We conducted a t-test to calculate the significance for each individual mean value. The final column outlines the significance level obtained from an analysis of variance (ANOVA), indicating statistically significant differences across groups. All variables are defined in Table 3. * < 0.10, ** p < 0.05, *** p < 0.01.

4.2. Descriptive statistics

Each participant filled out a questionnaire containing individual-level and organizational-level questions. The following subsections report the descriptive statistics for our sample and explore the particularities of the different impact investor types (i.e., donors, equity investors, and debt investors). Table 3 shows the descriptive statistics and describes each variable.

Regarding individual-level characteristics, the impact investors in our sample are mostly male (59%), between 30 and 40 years old and have a master's degree. This is in line with the results of Lee et al. (2020), who report that their impact investors are mostly male (60–70%), have the same age range and have a high level of education. Furthermore, the average impact investor in our sample made between 5 and 10 investment decisions, and more than half of the respondents (57%) had entrepreneurship experience.

Regarding organizational-level characteristics, Table 3 shows that the majority of impact investor organizations (56%) see impact investments as their core business and are mostly motivated by stakeholders' expectations. Additionally, the startup stage is the most common investment phase (68%), and most impact investor companies focus on environmental-oriented or education-oriented SEs.

Table 4 shows an initial comparison of the impact investor types based on the variables described in Table 3. Table 4 reports the mean values of our full sample ($N = 179$) in comparison to the mean values of each investor type. The brackets behind the mean values (+/−) indicate the results of a *t*-test that shows whether the respective mean values of a certain impact investor type are significantly larger (+) or smaller (−) than the respective mean values of the full sample. The final column demonstrates the results of an analysis of variance (ANOVA), which indicates statistically significant differences across the three groups of impact investors.

4.2.1. Equity investors

Our sample contains 67 (37%) impact investors who provide SEs with equity. This investor group differs significantly from the other investor types in many individual and organizational variables. For example, Table 4 reports that more equity investors are male, and fewer of them have an educational background in humanities compared to debt investors and donors. Furthermore, we find that 69% of the equity investors have an entrepreneurship background, which is significantly higher compared to the other groups. Furthermore, equity impact investors provide their investees with "smart money". That is, in addition to capital, they typically provide a range of value-adding activities to their portfolio companies. These activities are often based on past entrepreneurial experience (e.g.,

Sapp and Tiwari, 2004; Sørensen, 2007). Finally, equity investors in our sample have more investment experience as impact investors than do other types of investors.

Regarding organizational characteristics, equity investor organizations are significantly smaller than other investor organizations (i.e., lower number of employees). Additionally, only 36% of the equity investor organizations pursue impact investing as their core activity, which suggests that to most equity investors, impact investing might only be a recently established segment (e.g., Höchstädter and Scheck, 2015) that is treated as a side business. Because equity investors strive for financial returns through exit proceeds (e.g., Brest and Born, 2013; Louche et al., 2012), they have higher financial interests than those of investors without financial objectives. Regarding the stage of development of funded SEs, equity investors differ only in terms of the first stage, "idea development," in the sense that this investor group invests much less in projects that are still outlining their idea. Finally, with an average of 76%, equity investors focus on SEs that tackle environmental issues more often than debt investors and donors. In contrast, they invest less in ventures active in the field of education.

4.2.2. Debt investors

Impact investors who provide SEs with debt represent the smallest group of investors in our sample ($N = 55$, 31%). Table 4 demonstrates that they differ substantially from equity investors and donors. First, individuals in this group more often have an educational background in economics (72%). This result is in line with prior research that suggests that debt investors are more interested than other investors in the financial aspects of a funded venture (e.g., Mason and Stark, 2004) and therefore need to have a more sophisticated understanding of economics.

Debt investors try to achieve financial returns, similar to equity investors. In addition, debt investors rate reputational motives as more important than the other investor groups. Combined with the result that only 27% of the debt investors regard impact investing as their core activity, this suggests that several debt investors began to pursue impact investing as a side business due to reputational reasons. Approximately 53% of the debt investors invest in SEs that try to solve poverty issues, which is significantly higher than the percentage of equity investors and donors. Additionally, 64% of the debt investors in SEs are expanding their businesses. This finding is in line with the findings of previous research, which shows that debt is provided at later stages than equity investments (e.g., Berger and Udell, 1998).

4.2.3. Donors

Our subsample of impact investors who provide investments in the form of donations encompasses 116 individuals (65%). Table 4 documents that donors differ substantially from equity and debt investors. Most of these differences occur at the organizational level. Specifically, donors differ with regard to company size, alignment, motives, investment time, and the social area on which they focus. In contrast to other types of impact investors, donors' organizations have more employees on average. Furthermore, 49% of these impact investors state that impact investing is their core business, which is significantly higher than for the other types. Since donors typically do not expect financial returns; their financial motives are weaker than those of equity and debt impact investors who are seeking financial compensation. The donors in our sample tend to invest later than the other groups of investors. Thus, they invest in more ventures that are active in the startup and establishment phase. Finally, donors invest more actively in SEs that operate in the field of social inclusion. On average, half of the donors sampled invest in this field.

4.3. Design of the choice-based conjoint experiment

We conducted a survey-based conjoint experiment[6] to quantitatively assess the decision behavior of impact investors. Conjoint analysis has been introduced in the marketing field to assess the relative importance of product attributes (e.g., Green and Srinivasan, 1990). Shepherd and Zacharakis (1999) transferred the experimental design to the assessment of venture capitalists' decision making. Conjoint experiments complement post hoc approaches (e.g., questionnaires or interviews), which have several limitations when analyzing decision behavior (Shepherd and Zacharakis, 2018). For example, post hoc methodologies use past information that can suffer from recall or rationalization biases (Zacharakis and Meyer, 2000). Thus, more valid results can be achieved through conjoint analysis (Franke et al., 2006, 2008). Additionally, conjoint experiments are real-time experiments since information is collected while decisions are being made, whereas other approaches collect data only after this process is complete. Therefore, conjoint studies are more similar to the real decision-making behaviors of investors. Because investment decisions are made holistically by investors (e.g., Dane and Pratt, 2007), conjoint analyses are a useful tool for evaluating these decisions since the investment criteria can be measured conjointly. This situation leads to an accurate representation of investors' decision-making behavior (Block et al., 2019). Hence, every decision for or against an investment involves making trade-offs between different criteria, which can be represented within a conjoint experiment.

In light of these advantages, several studies in entrepreneurial finance have analyzed decision behaviors via conjoint experiments (e.g., Block et al., 2019; Franke et al., 2006, 2008). Moreover, the studies of Bernstein et al. (2017) and Block et al. (2019) show that experiments are gaining increasing popularity within the finance audience over post hoc approaches such as surveys (e.g., Bonini et al., 2018; Gompers et al., 2016, 2020).

We used a discrete choice-based conjoint (CBC) experiment. Specifically, we asked impact investors to decide between two

[6] The experiment was designed with "Sawtooth". Sawtooth is a widely used tool to conduct and host conjoint analyses (e.g., Lohrke et al., 2010). See https://www.sawtoothsoftware.com/.

Table 5
Attributes and levels of the conjoint analysis.

Attribute	Levels	Label used in the experiment	Definition and rationale for inclusion
Social impact criteria			
Importance of the societal problem (3 levels – ordinal)	Low Medium High	Describes the relevance and urgency of solving the societal problem	The importance of the societal problem describes the extent of an issue which a SE aims to solve. Thus, next to the attribute scalability this attribute covers the social impact which the SE wants to achieve.
Scalability (3 levels – ordinal)	Low Medium High	Describes the possibility of transfer and large-scale implementation of the project	The scalability covers the social impact the SE wants to achieve. Hence, it shows the extent to which the social project of the SE can be scaled to achieve a greater impact and reach more stakeholders of the social part of the business.
Founding team criteria			
Authenticity of the founding team (3 levels – ordinal)	Low Medium High	Describes the authenticity or credibility of the founders.	Davies et al. (2019) argue that SEs have to maintain identity authenticity; otherwise, barriers to growth could arise. Furthermore, several interview partners mentioned authenticity of the founding team as an important attribute in their screening criteria. It describes how credible the founding team is in solving a certain societal problem. Finally, our attribute encompasses how authentic or credible the founders present their business idea to solve a societal problem.
Professional background of the founding team (3 levels – nominal)	Technical Business Social	Represents the educational and professional background of the founders	Previous literature has shown that the professional background of the founding team influences the selection processes in venture finance (e.g., Franke 2006, 2008; Kaplan and Strömberg, 2004). Therefore, this attribute describes whether the founding team has a technical, social, or business educational and professional background.
Business criteria			
Financial sustainability (3 levels – ordinal)	Low Medium High	Represents the extent to which the SE will be able to finance itself in the foreseeable future	Describes how likely the SE will achieve financial goals in the future and not be dependent on external sources. Because of the hybrid nature of SEs, many of them are dependent on external support over the long term (e.g., Chell, 2007). Therefore, becoming financially sustainable represents a great obstacle they need to overcome.
Degree of innovation (3 levels – ordinal)	Low Medium High	Describes the novelty of the way to solve the societal problem	The innovativeness is an important component of the definition of an SE (e.g., Dart, 2004). It covers how the SE tackles a societal problem in a new way. Social innovation has become a large governmental topic to tackle global problems and achieve the Sustainable Development Goals (SDGs) (Eichler and Schwarz, 2019).
Proof of concept (2 levels – ordinal)	Not provided Provided	Proof of the feasibility of the project	Describes whether a proof of concept is provided for the SEs' business model. Thus, it proofs the feasibility of the social and financial part of the SE.

hypothetical investment opportunities that differ in specific attribute levels (e.g., the authenticity of the founding team, financial sustainability, and the degree of innovation). The idea behind this form of conjoint experiment is that participants (here defined as impact investors) always have to make several choices between two different hypothetical investments. Because our experiment presents hypothetical ventures to respondents, external validity may suffer. We address this issue in detail in the final section.

The experiment was explained to the participants in an introductory slide to ensure that they were evaluating the same SEs during their decision (see the Online Appendix, OA.I). For example, prior research has suggested that investors look for a strategic fit between the portfolio company and their investment strategy in early screenings (e.g., Fried and Hisrich, 1994; Gompers et al., 2020; Zacharakis and Meyer, 2000). Therefore, the introductory slide clarified that the geographical and strategic orientation of each hypothetical venture matches the interests of the investor (Franke et al., 2008). Furthermore, we explained to participants that the experiment addresses the initial preselection of investment opportunities. This clarified that the experiment focuses on the screening stage of the selection process of impact investors. In this initial screening phase, investors generally assess proposals in a very short time (Hall and Hofer, 1993). Supporting this idea, previous literature has shown that applicants for venture finance have to pass an initial screening followed by months of due diligence, with a low approval rate of approximately 20% of all requests (e.g., Cumming et al., 2010; Fried and Hisrich, 1994; Zacharakis and Meyer, 2000).

The participants in our experiment were forced to make a discrete choice for each investment opportunity (investment: "yes" or "no"). The advantages of this approach are that the investment criteria can be measured conjointly and that investors can be provided with very detailed descriptions of the investment possibilities. As in any conjoint experiment, each participant made a series of decisions on hypothetical investments (14 in our case) based on fixed screening criteria. Next to a description of their task, the information presented to respondents included a description of the seven investment criteria used: (1) the importance of the societal problem, (2) the scalability, (3) the authenticity of the founding team, (4) the professional background of the founding team the importance of the societal problem, (5) the financial sustainability, (6), the degree of innovation, and (7) the proof of concept. Each decision criterion has two or three different attribute levels.

Table 6
Main effects of the conjoint analysis.*, **

	Model	(1)	(2)	(3)	(4)
	Sample	Full sample	Equity	Debt	Donations
	Attributes and levels	Log-odds (SE)	Log-odds (SE)	Log-odds (SE)	Log-odds (SE)
	Social impact criteria				
H1a:	Importance of the societal problem: high	1.684 (0.123)***	1.383 (0.193)***	1.259 (0.215)***	1.858 (0.153)***
	Importance of the societal problem: medium	1.044 (0.097)***	0.864 (0.173)***	0.808 (0.162)***	1.144 (0.129)***
	(reference group: low)				
H1b:	Scalability: high	0.999 (0.103)***	1.245 (0.194***	0.629 (0.184)***	0.946 (0.123)***
	Scalability: medium	0.525 (0.088)***	0.518 (0.151)***	0.210 (0.143)***	0.645 (0.106)***
	(reference group: low)				
	Founding team criteria				
H2a:	Authenticity of the founding team: high	1.804 (0.131)***	1.968 (0.211)***	1.914 (0.251)***	1.789 (0.165)***
	Authenticity of the founding team: medium	1.379 (0.112)***	1.530 (0.179)***	1.377 (0.205)***	1.267 (0.139)***
	(reference group: low)				
H2b:	Founding team background: social	0.096 (0.100)	−0.044 (0.162)	0.227 (0.194)	0.088 (0.125)
	Founding team background: technical	−0.035 (0.090)	0.054 (0.135)	0.113 (0.175)	−0.097 (0.109)
	(reference group: business)				
	Business criteria				
H3a:	Financial sustainability: high	1.185 (0.122***	1.105 (0.149)***	1.622 (0.204)***	1.411 (0.232)***
	Financial sustainability: medium	0.771 (0.107)***	0.725 (0.133)***	0.934 (0.176)***	0.956 (0.204)***
	(*reference group: low*)				
H3b:	Degree of innovation: high	0.578 (0.100)***	0.625 (0.125)***	0.524 (0.128)***	0.509 (0.170)***
	Degree of innovation: medium	0.380 (0.092)***	0.404 (0.111)***	0.244 (0.147)***	0.426 (0.193)***
	(reference group: low)				
H3c:	Proof of Concept: provided	0.684 (0.095)***	0.702 (0.118)***	0.818 (0.149)***	0.656 (0.185)***
	(reference group: not provided)				
	N (decisions)	4.296	1.608	1.320	2.784
	N (decision makers)	179	67	55	116

Notes: Estimated with robust standard errors.
The following table demonstrates the results of a clustered multilevel logistic regression with random intercepts and random slopes. The preference of the decision maker serves as the dependent variable the independent variables are the attribute levels described in Table 5. Log-odds and standard errors (clustered at the decision maker level) are displayed. Model 1 explores the full sample and shows that all attribute levels except the professional background of the founding team are significantly influencing the decision of an impact investor ($p < 0.001$). The log-odds of each attribute level indicate the importance impact investors attach to each criterion. For example, the attribute levels of the criterion authenticity of the founding team have particularly high effect sizes. Models 2–4 use each impact investor type separately and enable an initial comparison of the investment criteria's importance for each investor type. We analyze impact investors providing donations, equity, and debt. For example, the Log-odd of 1.622 for equity investors with regard to SEs showing high financial sustainability is much higher than the log-odd of 1.185 for the whole sample. This highlights that being financial sustainable profitable is much more important for equator providers than for other types of impact investor. * < 0.10, ** p < 0.05, *** p < 0.01.

The seven investment criteria were identified through expert interviews with impact investors who had investment experience in all three impact investing areas (donations, equity, and debt). In total, we conducted 12 interviews with decision makers from impact investing organizations located within the D/A/CH region. For our explorative interviews, we selected experts from the impact investing field to obtain initial insights into the impact of investors' investment criteria and selection processes. All the participants hold a high position in their organization and have a high level of knowledge of the field (see the Online Appendix, OA. IV). We chose this approach because research on the screening criteria of impact investors is still limited. The interviews were conducted until we reached a sufficient number of different views that showed converged agreement between the participants on investment criteria. We used a semistructured interview guideline to give impact investors the possibility to freely answer open-ended questions. The interviews were conducted between November 2017 and March 2018. The interviews were transcribed and coded by two researchers to ensure the reliability of the criteria.

Based on the results of previous research and based on our explorative interviews, we identified a set of investment criteria that have a high level of importance in the selection processes of impact investors. Each attribute was explicitly explained by a brief label to the participants (see Table 5). The different attribute labels were always visible throughout the experiment by a hover effect. Furthermore, Table 5 illustrates the different levels of each attribute as well as our rationale for inclusion. For example, the attribute levels of "financial sustainability" are "low", "medium", and "high". These levels represent the extent to which the social venture will be able to finance itself in the foreseeable future.

To ensure that the impact investors could assess the hypothetical investments in SEs holistically, we used a full-profile CBC, which included all attributes listed in Table 5 (Franke et al., 2008). Based on our different attributes and attribute levels, we created a set of 500 unique experimental designs, in which each design presented a unique choice task consisting of different attribute level

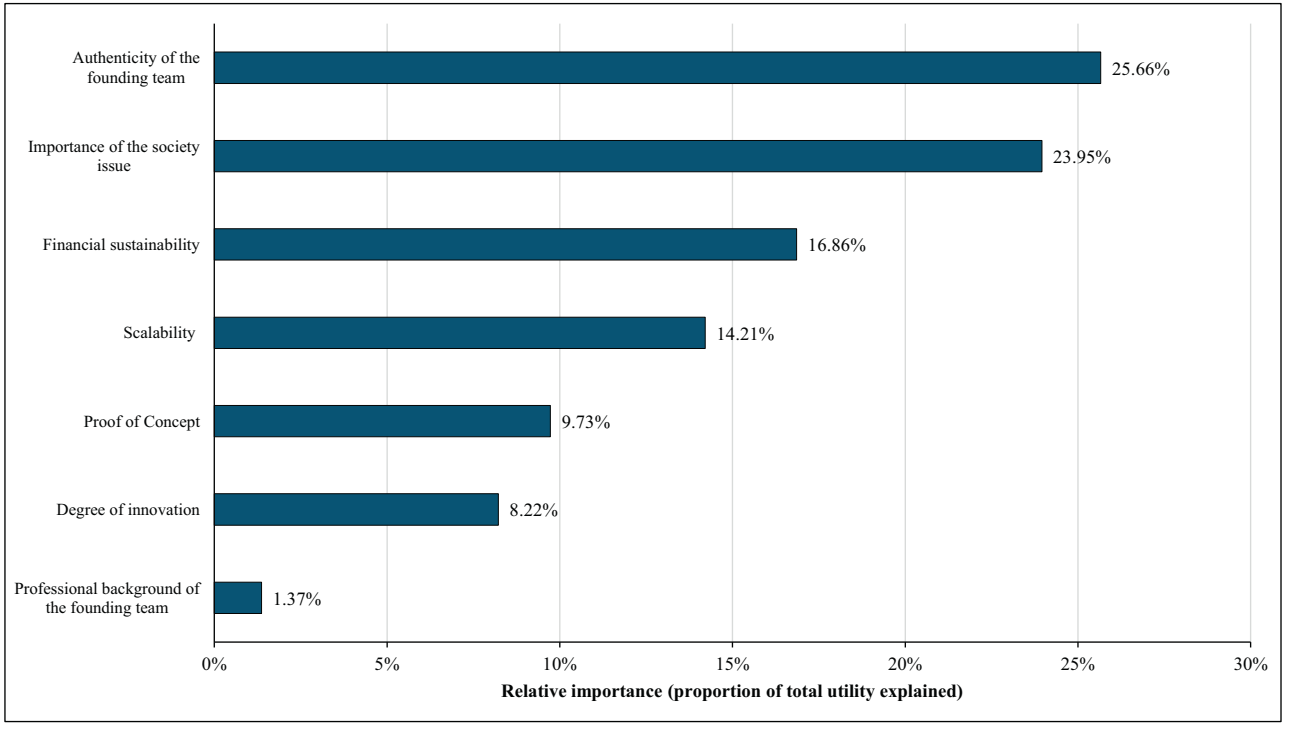

Fig. 1. Relative importance of attributes.
Notes: Calculated based on the coefficients of the main model (Table 6). Reading example: With a relative importance of 25.66%, social investors consider *the authenticity of the founding team* to be over 18 times as important as the attribute *professional background of the founding team* (relative importance: 4.2%). This value also signifies that the attribute *authenticity of the founding team* accounts for 25.66% of the decision maker's total utility.

combinations. In every design, the seven attributes (Table 5) were presented to the participants with randomly assigned attribute levels for two different investment opportunities. The impact investors then had to decide in which of the SEs they would like to invest. However, to ensure that the participants were not overwhelmed, we employed a reduced conjoint design (Chrzan and Orme, 2000), which prevents participants from facing too many different task decisions. Thus, every participant had to make 14 decisions, which included 12 randomly assigned tasks and two fixed tasks that were hold constant across all participants. "Fixed tasks" serve as a proxy to estimate the test-retest reliability of respondents' choices. In line with previous research, the average response time for a choice task was 23 s, although the first task per respondent took over a minute (Johnson and Orme, 1996).

Since CBC studies are based on a specific order of investment criteria, they can suffer from diverse order effects (e.g., Block et al., 2019; Chrzan, 1994). To account for these effects, we employed three different tests. First, to account for biases due to the order of choice tasks, we randomly ordered the choice tasks within each of the 500 different experimental designs. Second, the two investment opportunities within the 500 designs were also randomly ordered within each choice task to overcome negative order of options effects. Third, to avoid an impact of the order of attributes within one respective choice task, we randomly crossed the presented order of attributes to the participants but kept it stable for each respective participant. This approach eliminated the effect in which the attribute presented at the top of the list achieves the highest individual importance. Furthermore, we conducted a pretest with 12 impact investors and four researchers to ensure the face validity of our experimental design (complexity, attributes, and number of choices).

We analyzed the relative importance of impact investors' investment criteria by applying a multilevel logistic regression. The individual decisions (investment: "yes" or "no") therefore served as our binary dependent variable, and the attribute levels represented our independent variables. Because we have two levels in our data, we conducted a multilevel regression, which allowed us to nest each participant (first level) with multiple decision observations (second level) (Aguinis et al., 2013). This step was necessary because the two levels cannot be treated as unconnected and independent. We estimate the following regression equation:

$$log\left(\frac{\varphi_{ij}}{1-\varphi_{ij}}\right) = \beta_{0j} + \beta_{ij}x_{ij}$$

$$\text{with } \beta_{ij} = \gamma_{i0} + u_{ij}$$

In this equation φ_{ij} represents the probability of a positive decision that is conditional on β_j, for the choice i for respondent j. x_{ij} represents the independent variables x for the choice i for respondent j. In the base models (Table 6), the independent variables are the attributes used in the conjoint experiment that were displayed to the participants (see Table 5). One attribute is used as a benchmark category.

The multilevel analysis enabled us to also assess cross-level interaction effects when the observations of investment decisions were nested. Finally, we conducted multiple subsample analyses to compare the different types of impact investors.

5. Results and discussion

5.1. Relative importance of impact investors' investment criteria

Table 6 shows the results of our clustered multilevel regression analysis. While Model 1 shows the results of our full sample of impact investors, Models 2–4 present the results of each respective type of impact investor. The log-odds coefficients illustrate the importance that impact investors attach to each investment attribute or attribute level.

Model 1 assesses the relative importance of the respective investment attribute levels. To enable a more accessible comparison between the screening criteria and their perceived importance, we estimate the relative importance of each attribute by zero-centering the utility values to reach 100 as the sum of all importance values (e.g., Block et al., 2019; Franke et al., 2008). Fig. 1 displays the relative importance of each investment criterion. The higher the value of an investment criterion is, the higher its impact on the decision of an impact investor. For example, the two most important investment criteria (i.e., authenticity of the founding team and importance of the societal problem) explain almost 50% of the impact investors' decisions. Thus, the opportunity for an SE to be selected by an impact investor increases if an SE demonstrates high values in these two investment criteria.

Our results show that both social impact criteria have a significant impact on the investment decision of an impact investor. These results support Hypothesis 1a and Hypothesis 1b. Moreover, the importance of the societal problem is the second most important attribute overall. This finding reflects the goals of impact investors because they can only achieve their own social impact if their investees have a decisive impact (e.g., Geczy et al., 2019; Gray et al., 2015).

We also show that impact investors value social impact criteria higher than business criteria when screening SEs. Barber et al. (2020) indicate that impact investors accept lower returns to achieve a social impact. Our findings confirm this finding and show that impact investors value social impact criteria higher than business criteria when screening SEs. This finding is in line with research by Barber et al. (2020) and Chowdhry et al. (2019), who indicate that impact investors have higher stakes in investments with higher levels of social output. Additionally, this finding confirms the assumptions of Miller and Wesley (2010), who suggest that impact investors initially evaluate social criteria and only assess other criteria when a certain threshold is met by the social criteria.

Regarding the founding team criteria, we find that impact investors attach the highest relative importance to the authenticity of the founding team. These findings document the importance of the founding team's authenticity in the SE context (e.g., Chen et al., 2009; Davies et al., 2019; Radoynovska and King, 2019) and support Hypothesis 2a. Additionally, this finding is in line with prior research

Table 7
Results of the conjoint analysis with comparison across two types of impact investment.

Model	(1)	(2)	(3)	(4)
Sample	Donors vs. equity and debt	Equity vs. debt	Donors vs. equity	Donors vs. debt
Hypotheses	H4a & H4b	–	–	–
Interactions	Log-odds (SE)	Log-odds (SE)	Log-odds (SE)	Log-odds (SE)
Social impact criteria				
Importance of the societal problem: high	0.661 (0.235)***	−0.085 (0.396)	0.433 (0.255)*	0.909 (0.256)***
Importance of the societal problem: medium *(reference group: low)*	0.351 (0.185)*	−0.201 (0.302)	0.352 (0.198)*	0.407 (0.213)*
Scalability: high	−0.079 (0.209)	1.116 (0.325)***	−0.272 (0.218)	0.081 (0.251)
Scalability: medium *(reference group: low)*	0.385 (0.175)**	0.489 (0.273)*	0.301 (0.197)	0.403 (0.205)**
Founding team criteria				
Authenticity of the founding team: high	−0.145 (0.258)	−0.214 (0.452)	−0.023 (0.302)	−0.226 (0.302)
Authenticity of the founding team: medium *(reference group: low)*	−0.315 (0.215)	0.056 (0.363)	−0.264 (0.236)	−0.311 (0.241)
Founding team background: social	−0.073 (0.208)	−0.739 (0.335)**	0.107 (0.210)	−0.182 (0.256)
Founding team background: technical *(reference group: business)*	−0.237 (0.191)	−0.110 (0.301)	−0.082 (0.189)	−0.418 (0.224)*
Business criteria				
Financial sustainability: high	−0.480 (0.228)**	0.282 (0.383)	−0.588 (0.249)**	−0.331 (0.270)
Financial sustainability: medium (*reference group: low*)	−0.289 (0.211)	−0.181 (0.354)	−0.162 (0.223)	−0.357 (0.259)
Degree of innovation: high	0.120 (0.208)	−0.131 (0.328)	0.137 (0.206)	0.158 (0.237)
Degree of innovation: medium *(reference group: low)*	0.092 (0.186)	−0.579 (0.317)*	0.299 (0.187)	−0.165 (0.234)
Proof of Concept: provided *(reference group: not provided)*	0.033 (0.196)	0.292 (0.318)	−0.170 (0.210)	0.082 (0.240)
N (decisions)	3.600	1.488	3.456	3.168
N (decision makers)	150	62	144	132

Notes: Estimated with robust standard errors.
The following table demonstrates the results of a clustered multilevel logistic regression with random intercepts and random slopes. The preference of the decision maker serves as the dependent variable. The independent variables are the attribute levels described in Table 5. Log-odds and standard errors (clustered at the decision maker level) are displayed. In each Model attribute levels are interacted with a respective type of impact investor. For example, Model 1 compares donors with equity and debt impact investors. Therefore, we interact every attribute level with a dummy variable which has the value 1 if the impact investor provides donations and 0 if not. Although the main effects are included in the analysis, they are omitted for reasons of brevity so that the coefficients displayed here only refer to interaction effects. Exploring interaction effects enables us to identify whether significant differences between two types of impact investors exist. Model 1 presents the results with regard to Hypotheses 4a & 4b and Model 2–4 shows our additional analysis and robustness checks. * < 0.10, ** $p < 0.05$, *** $p < 0.01$.

that identifies founding team characteristics as critical determinants of investment decisions (e.g., Gompers et al., 2020; Kaplan and Strömberg, 2004). In contrast, we do not find support for Hypothesis 2b. We find that the field of background of the founding team has no significant impact on the selection of an impact investor, indicating that impact investors do not favor a social, technical, or economic background. Since the majority of impact investors from our experiment have an economic background (59%), our findings contradict earlier research by Franke et al. (2006), who illustrate that venture capitalists preferably invest in teams that possess a background similar to themselves. Overall, our findings suggest that the founding team is regarded differently in the screening process of impact investors than it is during the screening process of traditional venture finance investors.

Our findings on business screening criteria are threefold. First, we show that higher financial sustainability increases an SE's chance to receive funding by impact investors. This supports Hypothesis 3a and is in line with research that highlights the importance of economic criteria in the selection process of impact investors (e.g., Miller and Wesley, 2010; Yang et al., 2020). Furthermore, our finding suggests that impact investors often pursue investments that jointly optimize economic and social returns (e.g., Barber et al., 2020). Without financial sustainability, competitive financial returns are not achievable. Second, we find that SEs with a high degree of innovativeness are more likely to be selected by impact investors than are SEs with a medium or low degree of innovativeness, which supports Hypothesis 3b. This indicates impact investors see SEs' innovativeness as a relevant condition for achieving financial and social objectives. Third, we show that proof of concept is an important screening criterion of impact investors. A proof of concepts shows that the SE is able to combine the sometimes conflicting social and economic goals to achieve a long-turn impact. A direct comparison between the three business criteria shows that impact investors attach the highest importance to financial sustainability.

5.2. Differences between equity investors, debt investors, and donors

Models 2–4 in Table 6 show the relevance of the respective investment attribute levels for each subsample of impact investors. A comparison of the models suggests possible differences between the three impact investor types.

To assess these differences in an econometrically sound way, we compute interaction terms to compare the different types of impact investors. Since the preferences of investors differ based on the form of capital they provide (Ueda, 2004), the relative importances attached to the screening criteria might differ as well. Table 7 shows the results of these separate multilevel regressions. Each model represents a comparison between two types of impact investors. For example, Model 2 shows differences between debt and equity investors. The log-odd coefficients indicate whether significantly different criteria have a higher or lower importance for a particular type of impact investor, thereby allowing us to identify outstanding impact investors. The following subchapters outline each model in Table 7 in detail.

5.2.1. Particularities of donors

The first model in Table 7 compares the investment criteria of donors with those of equity and debt impact investors. We find that donors attach a higher importance to the importance of the societal problem and a lower importance to the SEs' financial sustainability. No significant differences emerge with regard to the other investment criteria. Thus, these results partially support Hypotheses 4a and 4b. We show that donors in fact attach less weight to the business screening criteria of financial sustainability. However, we do not find any significant differences concerning the criteria degree of innovativeness and proof of concept. Furthermore, we show that donors place more weight on the social impact criteria importance of the societal problem, whereas the scalability of the SE is not perceived as significantly more important by donors than by equity and debt investors.

An explanation for this pattern is that donors typically do not try to achieve any kind of financial return. Since the economic aspect of investment is not important, the focus shifts towards social criteria. This is in line with the findings of Chowdhry et al. (2019), who highlight that SEs should particularly seek donors that are fully committed to the social goals of their organizations as a source for funding. Furthermore, donations are essential to the funding of nonprofit organizations that only focus on the importance of the societal problem and do not follow any economic objectives. Overall, SEs often rely on this type of impact investment, particularly in early company stages (Bugg-Levine et al., 2012). Finally, these results confirm the heterogeneous landscape of impact investors and outline considerable heterogeneity among the investment criteria of impact investors.

5.2.2. Additional analysis and robustness checks

Model 2 of Table 7 compares the investment criteria of equity and debt investors. Both types of investors aim for financial returns on their investments. However, we find that the two types differ with regard to two investment criteria. First, equity investors put less value on the social background of a founding team than do debt investors. Second, equity investors consider the *scalability* of an SE to be more important than do debt investors.

These results are in line with the finding of previous research on traditional debt and equity investments (e.g., Black and Gilson, 1998; Puri and Zarutskie, 2012). Even though equity and debt investors both seek financial returns, the way in which they achieve these returns differs. While debt investors obtain regular interest payments on their investments, equity investors profit from exit proceeds from scaled investments that end in an IPO, for instance. Thus, equity investors (e.g., VCs) aim for highly and easily scalable ventures to achieve fast exits (Black and Gilson, 1998; Cochrane, 2005). Our results indicate that scalability is important for impact investors, but more from a social than financial perspective. As shown in our descriptive results, debt investors care more about the financial part of an investment, and equity investors more highly evaluate the social *scalability*. Furthermore, Franke et al. (2006) show that equity investors are affected by similarity biases, which means that they tend to invest in venture teams that show high similarities to themselves in terms of professional experience or other factors. Since VCs mainly have an educational background in business or technology (e.g., Bottazzi et al., 2008; Franke et al., 2006, 2008), the similarity bias explains why equity investors attach less value to a social educational background of a founding team compared to debt investors.

Model 3 and Model 4 of Table 7 display robustness checks. Model 3 shows that the differences between donors and the group of equity and debt impact investors with regard to the criterion *financial sustainability* are especially driven by equity investors. A reason for this result might be the type of impact organization. Thus, debt impact investors are, for example, social banks, which have low financial return expectations (Brest and Born, 2013). Nevertheless, our findings contrast with the literature that indicates that equity investors should be more risk-prone since their exit strategy is much riskier due to their continuation strategy (e.g., Ueda, 2004; Winton and Yerramilli, 2008). Debt investors usually attach a very high value to the financial plans of a venture to ensure repayment (e.g., Mason and Stark, 2004). Therefore, it would be obvious to expect them to evaluate the financial sustainability of SEs higher than equity investors.

6. Conclusion

6.1. Summary

Impact investing has transformed from a niche market into a global movement (e.g., Geczy et al., 2019; The Economist, 2017). This study is one of the first to explore impact investors' investment criteria when screening social enterprises. We analyze the screening criteria of impact investors and compare their relative importance among three types of impact investors based on a CBC experiment with 179 individual impact investors. This approach enables us to identify distinctive differences between donors as well as equity and

Table 8
Summary of the main findings.

Rank	Attribute	Relative importance	Lowest relative importance	Highest relative importance	Main results (qualitative summary)
1	Authenticity of the founding team	25.7%	25.2% (DOs)	29.0% (DEs)	No major differences across the three types of impact investors.
2	Importance of the societal problem	24.0%	18.2% (EQs)	26.1% (DOs)	Major differences across impact investor types: less important to equity and debt investors, and more important to donors.
3	Financial sustainability	16.9%	15.5% (DOs)	21.4% (DEs)	Minor differences across impact investor types: less important to donors, and more important to equity investors.
4	Scalability	14.2%	9.5% (DEs)	16.4% (EQs)	Minor differences across impact investor types: less important to debt investors, and more important to equity investors.
5	Proof of Concept	9.7%	9.9% (DOs)	10.7% (EQs)	No major differences across the three types of impact investors.
6	Degree of innovation	8.2%	6.9% (EQs)	8.8% (DOs)	No major differences across the three types of impact investors.
7	Founding team background	1.4%	0.7% (EQs)	3.4% (DEs)	Minor differences across impact investor types: social background is less important to equity investors, and more important to debt investors.

This table demonstrates the summary of our main findings. We rank the attributes according to the results of Table 6. Column 3 shows the mean values across all types of impact investors, while columns 4 and 5 display the investor type with the lowest and highest importance. The final column is based on Table 7 and contains a brief qualitative summary of the main findings of our comparison across the three types of impact investors. All attributes are defined in Table 5. We consider donors (DOs), equity investors (EQs), and debt investors (DEs).

debt investors. This study extends the knowledge within the financial literature since the research thus far lacks an understanding of the investment criteria of impact investors within the screening phase of their selection processes, as well as an understanding of how impact investors differ across specific types of investors.

Table 8 summarizes our main results. Impact investors attach the highest relative importance to the team-related criterion of the *authenticity of the founding team*, the social impact criterion of the *importance of the societal problem*, and the business criterion of the *financial sustainability*. Further, we compare different types of investors (i.e., equity investors, debt investors, and donors). For example, we find that the investment criteria of impact investors are particularly different when the group is separated in terms of its financial return expectations. Hence, impact investors with return expectations (equity investors and debt investors) evaluate the *financial sustainability* of an SE higher and the *importance of the societal problem* lower than those without return expectations (donors). In addition, we find that further differences exist between equity and debt providers. For equity investors, it is more important that an SE is scalable and less important that the founding team has a social background.

Our study also has implications for practice, particularly policy-makers, impact investors, and SEs that seek funding. For policy makers, a better understanding of the heterogeneous field of impact investing is beneficial since public authorities need to adopt policies or guidelines for own impact investment programs. For example, hybrid fund approaches such as the recently developed European Social Innovation and Impact Fund (ESIIF) that provides equity impact investments to SEs can use our results to compare their clearly defined screening criteria with those of other equity impact investors. Impact investing organizations can use our findings to benchmark their own organizational policies with those of other impact investors. Finally, for SEs that seek funding, we demonstrate the key attributes of their ventures that should be highlighted when seeking funding from impact investors.

6.2. Limitations and future research

A first set of limitations relates to our CBC experiment. Since the investment criteria used in the experiment needed to be defined in advance, we were unable to consider additional attributes after the experiment was launched. Thus, our study disregards other attributes that could be of additional importance to impact investors. In general, conjoint studies can therefore suffer regarding construct validity and can have a preselection bias (Shepherd and Zacharakis, 1999). However, to minimize the risk of selecting the inappropriate criteria, we conducted expert interviews before selecting the criteria. Furthermore, since conjoint experiments confront participants with hypothetical ventures, external validity may be an issue. However, previous research has provided evidence for the external validity of conjoint studies under certain conditions (e.g., Shepherd and Zacharakis, 2018). One condition is that the tasks given to the participants should be as representative as possible for the participant's real-life tasks (Shepherd and Zacharakis, 2018). Prior studies show that real decision-making behavior often correlates strongly with the estimated decision behavior. To address external validity, we conducted a pretest with experienced impact investors to confirm our selection of attributes and attribute levels. Another limitation of the forced CBC experiment is that decision-makers might sometimes perceive two investment opportunities as equally attractive but are still forced to choose one of them. This weakness could be eliminated through other conjoint models, such as a rating-based conjoint experiment. However, previous research has indicated that the results between both approaches are highly similar (Elrod et al., 1992).

Since we investigate impact investors from the D/A/CH region, future research could test whether our results hold for impact investors globally. Previous research has suggested that traditional investments differ between Europe and the US (Hege et al., 2009). Such differences might similarly exist between impact investors from Europe and the US, especially because the concept of social entrepreneurship differs between both markets (Defourny and Nyssens, 2010). Future research might find it interesting to explore such differences between Europe and the US. Furthermore, research on impact investing is still in the early stages, which allows for many

future research directions. For example, based on our study, future research could investigate whether selection processes differ among impact investors with regard to the investment stage in which they invest.

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Declaration of Competing Interest

The authors declare that they have no conflict of interest.

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Appendix A. Supplementary data

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References

Aguinis, H., Gottfredson, R.K., Culpepper, S.A., 2013. Best-practice recommendations for estimating cross-level interaction effects using multilevel modeling. J. Manag. 39 (6), 1490–1528.
Barber, B.M., Morse, A., Yasuda, A., 2020. Impact investing. J. Financ. Econ. https://doi.org/10.1016/j.jfineco.2020.07.008.
Berger, A.N., Udell, G.F., 1998. The economics of small business finance: The roles of private equity and debt markets in the financial growth cycle. J. Bank. Financ. 22 (6–8), 613–673.
Bernstein, S., Korteweg, A., Laws, K., 2017. Attracting early-stage investors: Evidence from a randomized field experiment. J. Financ. 72 (2), 509–538.
Black, B.S., Gilson, R.J., 1998. Venture capital and the structure of capital markets: Banks versus stock markets. J. Financ. Econ. 47 (3), 243–277.
Block, J., Fisch, C., Vismara, S., Andres, R., 2019. Private equity investment criteria: An experimental conjoint analysis of venture capital, business angels, and family offices. J. Corp. Finan. 58, 329–352.
Bloom, P.N., Chatterji, A.K., 2009. Scaling social entrepreneurial impact. Calif. Manag. Rev. 51 (3), 114–133.
Bonini, S., Capizzi, V., Valletta, M., Zocchi, P., 2018. Angel network affiliation and business angels' investment practices. J. Corp. Finan. 50, 592–608.
Bottazzi, L., Da Rin, M., Hellmann, T., 2008. Who are the active investors? Evidence from venture capital. J. Financ. Econ. 89 (3), 488–512.
Brest, P., Born, K., 2013. When can impact investing create real impact? Stanf. Soc. Innov. Rev. 11 (4), 22–31.
Bugg-Levine, A., Emerson, J., 2011. Impact investing: Transforming how we make money while making a difference. Innov. Technol. Govern. Global. 6 (3), 9–18.
Bugg-Levine, A., Kogut, B., Kulatilaka, N., 2012. A new approach to funding social enterprises. Harv. Bus. Rev. 90 (1/2), 118–123.
Chell, E., 2007. Social enterprise and entrepreneurship: Towards a convergent theory of the entrepreneurial process. Int. Small Bus. J. 25 (1), 5–26.
Chen, X.-P., Yao, X., Kotha, S., 2009. Entrepreneur passion and preparedness in business plan presentations: A persuasion analysis of venture capitalists' funding decisions. Acad. Manag. J. 52 (1), 199–214.
Chowdhry, B., Davies, S.W., Waters, B., 2019. Investing for impact. Rev. Financ. Stud. 32 (3), 864–904.
Chrzan, K., 1994. Three kinds of order effects in choice-based conjoint analysis. Mark. Lett. 5 (2), 165–172.
Chrzan, K., Orme, B., 2000. An overview and comparison of design strategies for choice-based conjoint analysis. In: Sawtooth Software Research Paper Series.
Cochrane, J.H., 2005. The risk and return of venture capital. J. Financ. Econ. 75 (1), 3–52.
Cumming, D., Zambelli, S., 2017. Due diligence and investee performance. Eur. Financ. Manag. 23 (2), 211–253.
Cumming, D., Schmidt, D., Walz, U., 2010. Legality and venture capital governance around the world. J. Bus. Ventur. 25 (1), 54–72.
Dane, E., Pratt, M.G., 2007. Exploring intuition and its role in managerial decision making. Acad. Manag. Rev. 32 (1), 33–54.
Dart, R., 2004. The legitimacy of social enterprise. Nonprofit Manage. Leadership 14 (4), 411–424.
Davies, I.A., Haugh, H., Chambers, L., 2019. Barriers to social enterprise growth. J. Small Bus. Manag. 57 (4), 1616–1636.
Dees, J.G., Anderson, B.B., Wei-Skillern, J., 2004. Scaling social impact. Stanf. Soc. Innov. Rev. 1 (4), 24–32.
Defourny, J., Nyssens, M., 2010. Conceptions of social enterprise and social entrepreneurship in Europe and the United States: Convergences and divergences. J. Social Entrepreneur. 1 (1), 32–53.
Eichler, G.M., Schwarz, E.J., 2019. What sustainable development goals do social innovations address? A systematic review and content analysis of social innovation literature. Sustainability 11 (2), 522.
Elrod, T., Louviere, J.J., Davey, K.S., 1992. An empirical comparison of ratings-based and choice-based conjoint models. J. Mark. Res. 29, 368–377.
Franke, N., Gruber, M., Harhoff, D., Henkel, J., 2006. What you are is what you like—Similarity biases in venture capitalists' evaluations of start-up teams. J. Bus. Ventur. 21, 802–826.
Franke, N., Gruber, M., Harhoff, D., Henkel, J., 2008. Venture capitalists' evaluations of start-up teams: Trade-offs, knock-out criteria, and the impact of VC experience. Entrepreneur. Theory Pract. 32 (3), 459–483.
Fried, V.H., Hisrich, R.D., 1994. Toward a model of venture capital investment decision making. Financ. Manag. 28–37.
Galema, R., Plantinga, A., Scholtens, B., 2008. The stocks at stake: Return and risk in socially responsible investment. J. Bank. Financ. 32 (12), 2646–2654.
Geczy, C., Jeffers, J., Musto, D.K., Tucker, A.M., 2019. Contracts with Benefits: The Implementation of Impact Investing. Available at SSRN 3159731.
GIIN, 2018. Annual Impact Investment Survey. https://thegiin.org/assets/2018_GIIN_Annual_Impact_Investor_Survey_webfile.pdf (accessed 12 August 2020).
GIIN, 2019a. Sizing the Impact Investing Market. https://thegiin.org/research/publication/impinv-market-size (accessed 25 November 2019).
GIIN, 2019b. What is Impact Investing? https://thegiin.org/impact-investing/need-to-know/#what-is-impact-investing (accessed 25 November 2019).
Gompers, P., Kaplan, S.N., Mukharlyamov, V., 2016. What do private equity firms say they do? J. Financ. Econ. 121 (3), 449–476.
Gompers, P.A., Gornall, W., Kaplan, S.N., Strebulaev, I.A., 2020. How do venture capitalists make decisions? J. Financ. Econ. 135 (1), 169–190.

Gordon, J., 2014. A stage model of venture philanthropy. Ventur. Cap. 16 (2), 85–107.
Graham, J.R., Harvey, C.R., 2001. The theory and practice of corporate finance: Evidence from the field. J. Financ. Econ. 60 (2–3), 187–243.
Gray, J., Ashburn, N., Douglas, H., Jeffers, J., Musto, D.K., Geczy, C., 2015. Great expectations: Mission preservation and financial performance in impact investing. In: Available at SSRN 2694620.
Green, P.E., Srinivasan, V., 1990. Conjoint analysis in marketing: New developments with implications for research and practice. J. Mark. 54 (4), 3–19.
Grossman, A., Appleby, S., Reimers, C., 2013. Venture philanthropy: Its evolution and its future. Harv. Busin. School 9, 1–25.
Hall, J., Hofer, C.W., 1993. Venture capitalists' decision criteria in new venture evaluation. J. Bus. Ventur. 8 (1), 25–42.
Harji, K., Jackson, E.T., 2012. Accelerating Impact: Achievements, Challenges and what's Next in Building the Impact Investing Industry. The Rockefeller Foundation, New York, NY.
Hartzmark, S.M., Sussman, A.B., 2018. Do investors value sustainability? A natural experiment examining ranking and fund flows. J. Financ. 74 (5), 2153–2199.
Hege, U., Palomino, F., Schwienbacher, A., 2009. Venture capital performance: The disparity between Europe and the United States. Finance 30 (1), 7–50.
Höchstädter, A.K., Scheck, B., 2015. What's in a name: An analysis of impact investing understandings by academics and practitioners. J. Bus. Ethics 132 (2), 449–475.
Hong, H., Kostovetsky, L., 2012. Red and blue investing: Values and finance. J. Financ. Econ. 103 (1), 1–19.
Johnson, R.M., Orme, B., 1996. How many questions should you ask in choice-based conjoint studies. In: Sawtooth Software Research Paper Series.
Kaplan, S.N., Strömberg, P., 2001. Venture capitals as principals: Contracting, screening, and monitoring. Am. Econ. Rev. 91 (2), 426–430.
Kaplan, S.N., Strömberg, P.E., 2004. Characteristics, contracts, and actions: Evidence from venture capitalist analyses. J. Financ. 59 (5), 2177–2210.
Kaplan, S.N., Sensoy, B.A., Strömberg, P., 2009. Should investors bet on the jockey or the horse? Evidence from the evolution of firms from early business plans to public companies. J. Financ. 64 (1), 75–115.
Lee, M., Adbi, A., Singh, J., 2020. Categorical cognition and outcome efficiency in impact investing decisions. Strateg. Manag. J. 41 (1), 86–107.
Lerner, J., Schoar, A., Wongsunwai, W., 2007. Smart institutions, foolish choices: The limited partner performance puzzle. J. Financ. 62 (2), 731–764.
Letts, C.W., Ryan, W., Grossman, A., 1997. Virtuous capital: What foundations can learn from venture capitalists. Harv. Bus. Rev. 75, 36–50.
Lohrke, F.T., Holloway, B.B., Woolley, T.W., 2010. Conjoint analysis in entrepreneurship research: A review and research agenda. Organizational Research Methods 13 (1), 16–30.
Louche, C., Arenas, D., van Cranenburgh, K., 2012. From preaching to investing: Attitudes of religious organisations towards responsible investment. J. Bus. Ethics 110 (3), 301–320.
Mason, C., Harrison, R.T., 2004. Improving access to early stage venture capital in regional economies: A new approach to investment readiness. Local Econ. 19 (2), 159–173.
Mason, C., Stark, M., 2004. What do investors look for in a business plan? A comparison of the investment criteria of bankers, venture capitalists and business angels. Int. Small Bus. J. 22 (3), 227–248.
Miller, T.L., Wesley, C.L., 2010. Assessing mission and resources for social change: An organizational identity perspective on social venture capitalists decision criteria. Entrepreneur. Theory Pract. 34 (4), 705–733.
Puri, M., Zarutskie, R., 2012. On the life cycle dynamics of venture-capital-and non-venture-capital-financed firms. J. Financ. 67 (6), 2247–2293.
Radoynovska, N., King, B.G., 2019. To whom are you true? Audience perceptions of authenticity in nascent crowdfunding ventures. Organ. Sci. 30 (4), 781–802.
Renko, M., 2013. Early challenges of nascent social entrepreneurs. Entrepreneur. Theory Pract. 37 (5), 1045–1069.
Renneboog, L., Ter Horst, J., Zhang, C., 2008. Socially responsible investments: Institutional aspects, performance, and investor behavior. J. Bank. Financ. 32 (9), 1723–1742.
Riedl, A., Smeets, P., 2017. Why do investors hold socially responsible mutual funds? J. Financ. 72 (6), 2505–2550.
Rodin, J., Brandenburg, M., 2014. The Power of Impact Investing: Putting Markets to Work for Profit and Global Good. Wharton Digital Press.
Sapp, T., Tiwari, A., 2004. Does stock return momentum explain the "smart money" effect? J. Financ. 59 (6), 2605–2622.
Shepherd, D.A., Patzelt, H., 2020. A call for research on the scaling of organizations and the scaling of social impact. Entrepreneur. Theory Pract. https://doi.org/10.1177/1042258720950599.
Shepherd, D.A., Zacharakis, A., 1999. Conjoint analysis: A new methodological approach for researching the decision policies of venture capitalists. Ventur. Cap. 1 (3), 197–217.
Shepherd, D.A., Zacharakis, A., 2002. Venture capitalists' expertise: A call for research into decision aids and cognitive feedback. J. Bus. Ventur. 17 (1), 1–20.
Shepherd, D.A., Zacharakis, A., 2018. Conjoint analysis: A window of opportunity for entrepreneurship research. In: Reflections and extensions on key papers of the first twenty-five years of advances, pp. 149–183.
Smith, W.K., Gonin, M., Besharov, M.L., 2013. Managing social-business tensions: A review and research agenda for social enterprise. Bus. Ethics Q. 23 (3), 407–442.
Social Impact Investment Taskforce, 2014. Impact Investment: The Invisible Heart of Markets.
Sørensen, M., 2007. How smart is smart money? A two-sided matching model of venture capital. J. Financ. 62 (6), 2725–2762.
The Economist, 2017. "Impact Investing" Inches from Niche to Mainstream. https://www.economist.com/finance-and-economics/2017/01/05/impact-investing-inches-from-niche-to-mainstream (accessed 04 December 2019).
Tracey, P., Jarvis, O., 2007. Toward a theory of social venture franchising. Entrepreneur. Theory Pract. 31 (5), 667–685.
Ueda, M., 2004. Banks versus venture capital: Project evaluation, screening, and expropriation. J. Financ. 59 (2), 601–621.
Van Slyke, D.M., Newman, H.K., 2006. Venture philanthropy and social entrepreneurship in community redevelopment. Nonprofit Manage. Leadership 16 (3), 345–368.
Warnick, B.J., Murnieks, C.Y., McMullen, J.S., Brooks, W.T., 2018. Passion for entrepreneurship or passion for the product? A conjoint analysis of angel and VC decision-making. J. Bus. Ventur. 33 (3), 315–332.
Winton, A., Yerramilli, V., 2008. Entrepreneurial finance: Banks versus venture capital. J. Financ. Econ. 88 (1), 51–79.
Yang, S., Kher, R., Newbert, S.L., 2020. What signals matter for social startups? It depends: The influence of gender role congruity on social impact accelerator selection decisions. J. Bus. Ventur. 35 (2), 105932.
Yitshaki, R., Kropp, F., 2016. Motivations and opportunity recognition of social entrepreneurs. J. Small Bus. Manag. 54 (2), 546–565.
Zacharakis, A.L., Meyer, G.D., 2000. The potential of actuarial decision models: Can they improve the venture capital investment decision? J. Bus. Ventur. 15 (4), 323–346.
Zahra, S.A., Rawhouser, H.N., Bhawe, N., Neubaum, D.O., Hayton, J.C., 2008. Globalization of social entrepreneurship opportunities. Strateg. Entrep. J. 2 (2), 117–131.
Zahra, S.A., Gedajlovic, E., Neubaum, D.O., Shulman, J.M., 2009. A typology of social entrepreneurs: Motives, search processes and ethical challenges. J. Bus. Ventur. 24 (5), 519–532.