Received: 21 February 2023 | Revised: 14 November 2023 | Accepted: 17 January 2024

DOI: 10.1002/nvsm.1834

RESEARCH ARTICLE

WILEY

Aiding philanthropic venture capitalists investing in social enterprises: A multi-criteria decision-making approach

Negin Salimi[1] | Gijs Robbert ten Have[2]

[1]Business Management and Organization, Wageningen University and Research, Wageningen, The Netherlands

[2]Urban Environmental Management, Wageningen University and Research, Wageningen, The Netherlands

Correspondence
Negin Salimi, Business Management and Organization, Wageningen University and Research, Wageningen, The Netherlands.
Email: negin.salimi@wur.nl

Abstract

Social enterprises have emerged as promising solutions for addressing environmental and societal challenges. To enhance their access to financial capital and align their business proposals with the preferences of impact investors, it is crucial to understand how Philanthropic venture capitalists (PhVCs) evaluate potential portfolio companies. This study introduces a framework to assist PhVCs in making more informed investment decisions, fostering successful, long-term partnerships between investors and investees. The proposed approach begins by determining the significance of investment criteria using the Best-Worst Method (BWM). Subsequently, the performance of portfolio companies is evaluated, ultimately identifying the most favorable investment opportunities. We apply this framework to a Dutch philanthropic venture capitalist, and our analysis reveals that 'Potential' and the 'Management team' rank highest in terms of investment criteria importance, while 'Assessment of the deal' and 'External environment' carry lower significance. Furthermore, our approach, incorporating the BWM outcomes, considers investors' personal preferences and offers a method for ranking portfolio companies based on their value and performance.

KEYWORDS

best-worst method, investment criteria, philanthropic venture capitalists, Social enterprise

Practitioner Points

What is currently known about the subject matter

- The literature has so far focused mainly on investment criteria that investor uses.

What your paper adds to this, and finally

- We emphasized that considering the importance and value of each investment criterion is vital.
- We offer a framework by which social enterprises align their business proposals for financial capital with the demands of PhVC investors.

- Following the proposed framework contributes to successful partnerships between the investor and the investee in the long term.

The implications of your study findings for practitioners

- Social enterprises need to develop strong impact measurement metrics and systems to track and report their social impact.
- Social enterprises need to show how their model can scale to reach more beneficiaries or be replicated in different regions and contexts.
- Social enterprises need to take the time to hire members with a relevant background in the industry and a passionate personality to reach social objectives and, if necessary, educate them.

1 | INTRODUCTION

Our world grapples with many complex issues, with climate change and social inequality standing out as two of the most pressing. Many of these challenges have a global reach and are rooted in the design of our current economic system, where businesses often operate within a linear economy (Circle Economy, 2018). Given the global scale and interconnected nature of these problems, national governments alone often lack the capacity to address them comprehensively. This necessitates a fundamental shift within the business sector itself, compelling companies to take a more active role in fostering sustainability within a global society, rather than solely pursuing exponential growth in linear economies. To achieve this transformation, companies worldwide must re-evaluate their business models, transcending the sole pursuit of profit maximization (Van Tulder et al., 2014; Volery, 2002). Innovative businesses that prioritize addressing environmental and social challenges are central to this shift in the business landscape (Scarlata & Alemany, 2008). These enterprises are not molded by the conventional paradigms of linear economies or the pursuit of maximum financial returns; instead, their primary goal is to generate a societal impact (Miller & Wesley, 2010). In contemporary discourse, these forward-thinking businesses are commonly referred to as social enterprises. However, like many start-ups, social enterprises often face profitability challenges during their initial stages of growth (Marcus et al., 2013). Furthermore, as social enterprises endeavor to tackle unresolved societal issues, their business models frequently lack a proven track record (McKinsey & Company, 2011).

As a result, social enterprises often find it challenging to secure loans from traditional financial institutions, including commercial banks and venture capital funds, which typically play a crucial role in a company's success (Owen, 2021). Social enterprises frequently face barriers to accessing such financial capital (Scarlata et al., 2012). This lack of access to traditional financing poses a significant threat to the growth and development of social enterprises, limiting their capacity to address global issues and create a meaningful societal impact. In some countries, such as the United States and the United Kingdom, national governments offer support and funding opportunities to enterprises dedicated to making a social impact. However, in the Netherlands, the government's support for social enterprises is limited (PricewaterhouseCoopers, 2014). This situation leaves Dutch social enterprises struggling to secure financial capital, constraining their growth and increasing their reliance on private investors' willingness to invest.

In contrast to traditional financial institutions, Philanthropic venture capitalists (PhVCs) align with the values of social enterprises and prioritize making a positive social impact. They are willing to embrace the inherent risks associated with investing in such ventures (Scarlata & Alemany, 2008). In parallel with the growth of social enterprises, impact investing has gained prominence in the Netherlands as a manifestation of Philanthropic venture capital (PhVC) over the past decade. Notably, the number of impact investors in the Netherlands has witnessed a substantial increase, encompassing a variety of forms such as crowd funding, funds, foundations, and impact investment funds (Social Enterprise, 2019). This surge in impact investors has conferred a critical role in the development of social enterprises in the Netherlands. Investments from impact investors, henceforth referred to as PhVCs in this research, have become indispensable for nurturing Dutch social enterprises into financially robust and prosperous ventures (Social Enterprise, 2019).

While PhVCs are eager to invest in social enterprises, like all responsible investors, they exercise meticulous diligence in selecting portfolio companies and adhere to stringent due diligence processes involving thorough screening and evaluations (Miller & Wesley, 2010; Scarlata et al., 2012). This careful scrutiny is driven by the enduring nature of partnerships that PhVC investors establish (Miller & Wesley, 2010) and the risk of encountering asymmetric information during the investment process (Scarlata et al., 2012). Consequently, social enterprises must fulfill specific requirements and meet distinct investment criteria to qualify for potential financial support from PhVCs.

The combination of limited governmental support in the Netherlands, restricted access to financial capital from traditional institutions, and the thorough due diligence processes imposed by PhVCs creates significant challenges for Dutch social enterprises seeking financial investments. Consequently, this restricted access to financial resources hampers the growth prospects of social enterprises in the Netherlands and imperils their ability to address urgent environmental and social issues from a business standpoint (McKinsey & Company, 2011; PricewaterhouseCoopers, 2014). As a result, ample

research opportunities exist to investigate how PhVCs employ investment criteria in evaluating prospective investments.

Numerous studies have explored the identification of funding criteria for investors (e.g., Hall and Hofer (1993); Mason and Stark (2004); Block et al. (2019)). In a review paper, Ferrati and Muffatto (2021) categorized assessment criteria into four main groups: Venture-specific factors (e.g., characteristics of the entrepreneur and/or the management team), Investor-specific factors (e.g., investor screening factors), Environmental factors (e.g., macroeconomic factors), and Risk assessment factors (e.g., market risks).

For social enterprises, the challenge of attracting venture capital may stem from a lack of awareness regarding the existence and significance of investment criteria considered by PhVCs prior to investment (PricewaterhouseCoopers, 2014). While a few studies explicitly addressed criteria applicable to social venture capitalists, such as the social mission, an entrepreneur's commitment to social change, and community-based networks (see, Miller & Wesley, 2010), there remains a theoretical gap in understanding how PhVCs evaluate the importance of investment criteria within the scientific literature (Miller & Wesley, 2010; Scarlata et al., 2012). More importantly, it is crucial to recognize that each investment criterion holds different weight and value from an investor's perspective and, in various contexts, a factor that investors must consider (Dhochak & Sharma, 2016).

Comprehending these nuances assists social enterprises in aligning their business proposals for financial capital with the expectations of PhVC investors and enhances their prospects of securing funding. Therefore, the primary contribution of this research is to introduce a framework that empowers social enterprises to be more successful in obtaining funds from PhVCs.

Previous studies have made valuable contributions to our understanding of investors' funding criteria, but they generally lack an exploration of a fundamental question:

What is the relative importance of the various investment criteria considered by Philanthropic Venture Capitalists when investing in social enterprises?

Social enterprises often lack the flexibility to choose among many investors, underscoring the need to approach this research from the perspective of PhVCs and their evaluation of different investment criteria in the Netherlands.

The structure of this paper unfolds as follows: In Section 2, we review existing literature about social enterprises and PhVCs. Section 3 outlines the methodology employed in this study. Section 4 applies this method to a Dutch Philanthropic venture capitalist, collecting data from a sample of experts and employing the Best-Worst Method (BWM) for analysis. Finally, Section 5 presents the research's conclusions and acknowledges its limitations.

2 | LITERATURE REVIEW

The literature review serves as a valuable source of background information concerning the social entrepreneurial sector and its associated investment landscape. The insights provided in this review enhance the contextual understanding of the subject matter and offer clear, concise definitions of the key concepts utilized in this research.

2.1 | Different types of businesses

Given the research's focus on investment criteria for social enterprises, it is crucial to define social enterprises and their relationship to traditional business ventures.

Business typologies can be categorized into those aiming for financial value, social value, or a combination of both (Shaerpa., 2022). Traditional businesses primarily prioritize financial profitability, though some may incorporate charitable donations or adopt Corporate Social Responsibility (CSR) strategies (Ebrahim et al., 2014). In contrast, social enterprises (SE) range from those seeking a balance between profit and social goals to those reinvesting returns for social impact. Social enterprises place a greater emphasis on achieving social impact over economic profitability. Lastly, charities or non-profits focus primarily on social outcomes and are classified as 'impact-only' entities (Shaerpa., 2022). Figure 1 provides an overview of these distinct business typologies (Shaerpa., 2022).

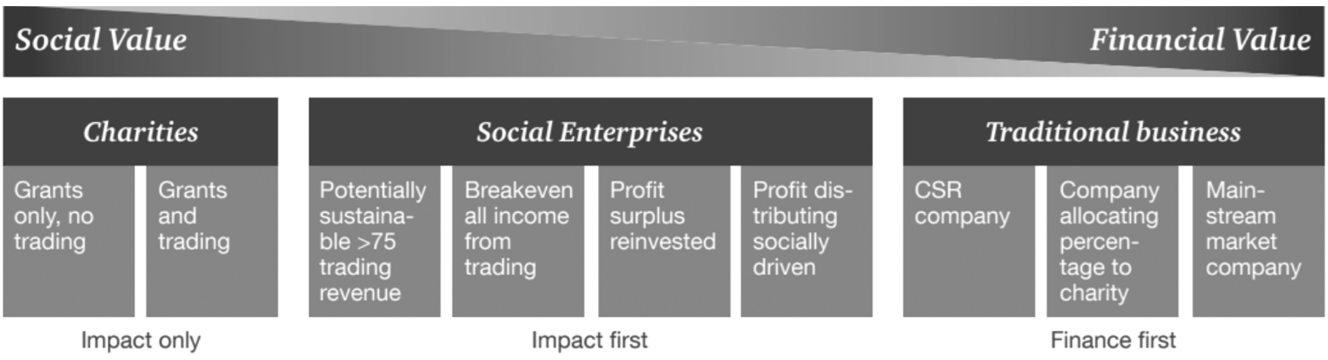

FIGURE 1 Business types (*Source*: PricewaterhouseCoopers, 2014; Shaerpa., 2022).

2.2 | Social enterprise: The definition

Defining social enterprises precisely poses a challenge due to the lack of consensus in the scientific literature, leading to varying definitions. This diversity in definitions makes selecting a predominant concept difficult. However, for the purpose of this research, a conceptual definition of social enterprises is proposed.

As per Miller and Wesley (2010), social enterprises can be viewed as hybrid organizations addressing social issues and creating value through innovation and exploration of unrecognized opportunities. These enterprises can provide products with positive community impacts or offer innovative social services. The innovative spirit of social entrepreneurs stems from their commitment to challenging the status quo and addressing problems with increased efficiency (Hynes, 2009; Miller & Wesley, 2010). Unlike traditional entrepreneurship, where profit margins and financial returns are paramount, social enterprises primarily seek to achieve social value. Financial revenues may be reinvested in the organization to advance their social mission and improve practices (Miller & Wesley, 2010; Scarlata & Alemany, 2008). Scarlata and Alemany (2008) suggest that entrepreneurs should choose a legal form that best serves their social outcome, reflecting two distinct directions in definitions (Leborgne-Bonassié et al., 2019).

Some define social enterprises strictly as non-profit entities (Weerawardena & Mort, 2006), a perspective viewed as narrow in the literature (Austin et al., 2006). The broader definition acknowledges that financial returns hold a certain importance for social entrepreneurs and cannot be excluded from the definition (Boschee, 2001). This broader outlook emphasizes a mindset rather than a specific degree of profitability, recognizing that ventures can be considered social enterprises across various sectors, irrespective of their legal structure (Austin et al., 2006). Consequently, businesses' social mission can arise from the desire to make a substantial societal impact or fulfill public demand for a more positive approach to societal or environmental issues within non-profit and for-profit organizations (Galera & Borzaga, 2009). Both narrow and broad definitions highlight these enterprises' innovative nature and dedication to addressing pressing environmental and societal challenges (Austin et al., 2006).

2.3 | Different types of investors

To analyze investments in social enterprises, we distinguish between traditional VCs and PhVCs, which differ in characteristics, objectives, and the types of businesses they invest in (Scarlata et al., 2012). This research focuses on PhVCs and their investment criteria.

2.3.1 | Traditional venture capitalists

Traditional venture capitalists (VCs) primarily seek start-up companies with the potential for rapid growth and provide them with financial capital. They manage risk by creating portfolios of promising start-ups, where the success of some compensates for others' failures. The ultimate aim is for the selected portfolio companies to yield high financial returns in the future (Martin & John, 2006). Subsequently, VCs exit the organization during a 'liquidity event,' often involving an acquisition or an Initial Public Offering (IPO) (Scarlata et al., 2012). This process can be ongoing, as growing start-ups require continuous injections of capital to maintain market positions, attracting more investors and venture capitalists (Martin & John, 2006).

In summary, as per Amit et al. (1998), traditional VCs focus on promising investments with the potential for maximizing financial value. Gompers and Lerner (1998, p. 151) define VCs as follows:

> "Venture capitalists are active investors who monitor the progresses of the firms in which they invest, sit on the board of directors and meet out financing based on the attainment of milestones. VCs monitor the strategy and the investment decisions and take an active role in advising firms."

The primary objective of VCs, which is to maximize economic returns on their investments, poses challenges for social enterprises in attracting them as a source of financial capital. Social enterprises often contend with the perception that their focus on social impact hinders their potential for significant financial returns, a phenomenon known as the Pareto assumption (Scarlata et al., 2012). Furthermore, social enterprises tackle societal issues for which optimal solutions have not yet emerged, and their business models have not proven successful (McKinsey & Company, 2011). The absence of proven business models and the influence of the Pareto assumption compound the risks that discourage traditional VCs from making substantial investments in social enterprises.

2.3.2 | Philanthropic venture capitalists

Philanthropic Venture Capitalists represent a modern and innovative segment of investors dedicated to funding social entrepreneurship (Scarlata et al., 2012). Social entrepreneurship creates and implements innovative solutions to address social and environmental challenges. It involves pursuing social and financial goals and is characterized by a strong sense of social mission, innovation, and a focus on sustainability. (Mair & Marti, 2006). PhVCs share the values and objectives of social enterprises, as they both pursue a blend of social impact and financial returns (Miller & Wesley, 2010; Scarlata et al., 2012). This movement of PhVCs stems from the traditional VC sphere (Scarlata & Alemany, 2009). PhVCs serve as intermediaries, raising financial capital from third parties to invest in enterprises that generate significant societal value (Scarlata & Alemany, 2008). Through their investments, PhVCs aim to foster the growth of the social enterprises they support, helping entrepreneurs establish sustainable business practices. Entrepreneurs can operate independently from their investors when successful, enabling businesses to prioritize long-term social value maximization for the community.

Consequently, PhVC investment strategies extend beyond seeking financial returns and prioritize social impact creation (Miller & Wesley, 2010; Scarlata & Alemany, 2010). PhVCs can achieve this by providing financial investments, advice, consultation, or leveraging an extensive business network to support social enterprises (Scarlata & Alemany, 2010). PhVCs do not merely offer financial capital to social enterprises; their involvement can be seen as a partnership to generate maximum social value and impact. In return for their investment, PhVCs gain influence in the organization's decision-making processes, akin to the practices of traditional VCs (Miller & Wesley, 2010). To define PhVCs in this research, we adopt the following definition formulated by Scarlata & Alemany (Scarlata & Alemany, 2008, p.3):

> "*Philanthropic venture capitalists are social subjects whose aim consists of investing those funds raised from various donors – who may be wealthy individuals, enterprises, and/or foundations – in organizations with high social impact. In order to maximize the social return from the investment, PhVCs engage in a value-added partnership with the target organization and mete out financing based on the reaching of milestones. As such, PhVCs monitor the progress of the firms they back not only providing capital but also expertise and strategic guidance. Besides, in case PhVCs take a seat in the board of directors of the organizations they back, they retain important rights which allow them to intervene in the company's operations when necessary*."

The alignment of values and goals between PhVCs and social enterprises, coupled with PhVCs' commitment to developing social enterprises into sustainable and financially sound organizations, forms the basis for a potentially ideal partnership. However, the heavy reliance of social enterprises on PhVC investments underscores the critical need for compatibility between PhVCs' investment criteria and the business proposals of social enterprises. This compatibility is essential to secure the continuous financial investments required for the growth of the social entrepreneurial sector. Consequently, this research concentrates on the significance of investment criteria from the perspective of PhVCs, prioritizing their criteria over those of traditional VCs.

2.4 | Rationalities and logics for impact investments in social enterprises

Various perspectives exist regarding financial investments in social entrepreneurship (Scarlata et al., 2012). It is crucial to understand that motivations for investing in social enterprises can be attributed to investment logic and investment rationalities (Nicholls, 2010). According to Emerson (2000), investment logic can stem from a desire for economic returns, social returns, or a blend of both. In the case of PhVC investments in social enterprises, we primarily consider social returns and mixed economic and social returns. Investors' rationalities can be categorized as means-ends, values-driven, or systemic (Nicholls, 2010). Means-ends investments involve ensuring that financial injections lead to measurable process and return improvements, closely linked to the desire for maximized returns. Value-driven rationality aligns with investors' intent to create an impact in line with their individual values. Systemic investment rationality combines value-driven and means-ends aspects and is closely related to achieving mixed economic and social returns (Scarlata et al., 2012).

Combinations of these investment logics and rationalities result in various forms of PhVCs, each with slightly different objectives and investment focuses (Scarlata et al., 2012). Within this realm of PhVCs, impact investing stands out as a form focused on social outcomes and is linked to conventional venture capitalists and traditional financing (Block et al., 2021; Scarlata et al., 2012). This paper explores explicitly impact investing in the context of the Netherlands, as introduced earlier. In impact investing, investors fund social enterprises with systemic rationalities and financial logic (Nicholls, 2010). However, these investments are primarily driven by the desire for social impact rather than economic returns (Scarlata et al., 2012). Impact investors are willing to engage in riskier investments compared to traditional VCs, but they require clear measurement and tracking of environmental and social impact. Impact investments can vary in their objectives, purposes, and sectors, with investors ranging from commercial banks, foundations, private wealth management, pension funds, venture capital firms, companies, and other financial institutions (Scarlata et al., 2012). Depending on the impact investor, the intended investment returns can either be at 'market rate' or 'below market' (GIIN, 2019). 'Market rate' investments are most likely equity investments made by equity firms or venture capital funds (Barber et al., 2021), whereas 'below market rate' investments from impact investors are typically debt investments allocated to social enterprises, mainly facilitated by social banks and foundations (Block et al., 2021). A third possibility is that the investment takes the form of grants or donations (Block et al., 2021). The sectors financed by impact investments are diverse, encompassing the financial sector, agriculture, education, energy, housing, and healthcare (Scarlata et al., 2012).

2.5 | The investment model of PhVCs

When making investment decisions, VCs and PhVCs often encounter information asymmetry regarding the ventures they plan to fund, which poses a challenge (Scarlata et al., 2012). To mitigate the risks associated with this information asymmetry, both types of venture capitalists employ due diligence strategies to gather comprehensive knowledge about the enterprise and its entrepreneur. As outlined by Tyebjee and Bruno (1984), the due diligence process for VCs encompasses several steps: deal origination, deal screening, deal evaluation, deal structuring, post-investment activities, and exits (refer to Figure 2).

While the extent of similarity between the investment models and practices of PhVCs and traditional VCs remains somewhat uncertain, there are indications of shared strategies in the deal screening

and evaluation phases (Scarlata & Alemany, 2009). Leborgne-Bonassié et al. (2019) argue that the investment model of social investors follows a similar structure, including origination, screening, evaluation, structuring, post-investment care, and exit phases. This model, as depicted in Figure 3, also applies to PhVCs.

Within the screening and evaluation phase, it is evident that PhVCs employ investment criteria to identify suitable ventures for investment (Leborgne-Bonassié et al., 2019). However, there is a lack of clarity regarding how these investment criteria are assessed and valued by investors (Miller & Wesley, 2010). The investment model of PhVCs, as outlined in previous studies, serves as the foundation for identifying various investment criteria in the deal selection phase and determining their relative importance.

2.6 | Investment criteria of PhVCs

Investors rely on investment criteria to evaluate various investment opportunities, providing valuable information in the decision-making process (Šimić, 2015). These criteria, employed by financial institutions or strategic investors, encompass a set of parameters that offer insight into the potential success of an investment (Divestopedia, 2021). Investment criteria serve as a valuable benchmark for various venture capitalists and are also a crucial guideline for entrepreneurs seeking financial support for their ventures or business ideas (Visagie, 2011). Therefore, entrepreneurs should be well-informed about these criteria to strengthen their business proposals and enhance their chances of securing financial capital (Šimić, 2015).

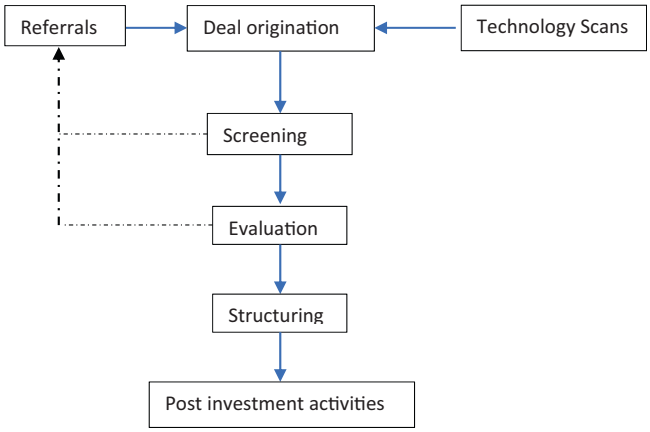

FIGURE 2 Investment model and practices of venture capitalists (*Source*: Tyebjee & Bruno, 1984).

The distinctions between PhVCs and VCs, as discussed in Section 2, highlight that philanthropic venture capitalists prioritize impact-related criteria over financial ones, while traditional venture capitalists prioritize financial criteria above all else. This difference arises from the divergent objectives and motivations of these investor types.

Numerous assessment criteria are identified in the literature, including entrepreneurs' characteristics, products or services, market characteristics, financial considerations, management skills, economic and institutional environments, and regulatory factors (Dhochak & Sharma, 2016). Ferrati and Muffatto (2021) conducted a systematic literature review, categorizing these criteria into four groups: Venture-specific factors (e.g., characteristics of the entrepreneur and/or the management team), Investor-specific factors (e.g., investor screening criteria), Environmental factors (e.g., macroeconomic factors), and Risk assessment factors (e.g., market risks). Their research revealed that the most extensively studied criteria classes are the characteristics of the entrepreneur and/or the management team, while investor-related factors, such as the type of venture capitalists and contractual terms, are the least explored. This underscores the significance of studying assessment criteria from different angles, including whether the assessment criteria employed by PhVCs differ from those of traditional venture capitalists (Ferrati & Muffatto, 2021).

Scarlata and Alemany (2009) investigated whether the assessment criteria used by PhVCs differ from those employed by traditional venture capitalists. In their study, they examined five primary criteria: entrepreneur and management, social enterprise activity, external environment, assessment of the deal, and potential. Their findings

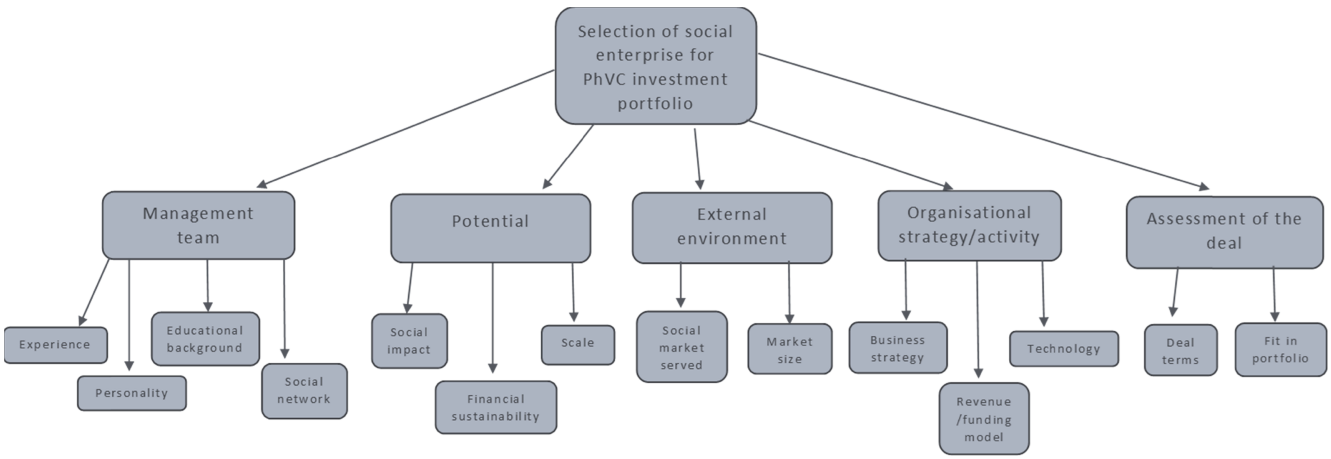

FIGURE 3 The investment criteria and the sub-criteria of PhVCs.

indicated that entrepreneurs and management teams are highly important for both PhVCs and VCs. Additionally, they found that potential holds greater significance for PhVCs than deal terms, while for traditional venture capital, deal terms are more important than potential. The differences between PhVCs and VCs were insignificant for the other criteria. Therefore, it appears that the assessment criteria used by these two investor types are somewhat similar, though the relative importance of each criterion remains significant. Furthermore, in some cases, it may be impossible to consider all criteria, making it essential to understand the importance of each criterion to gain better insight into how venture capitalists make their investment decisions—a relatively unexplored area in the literature (Dhochak & Sharma, 2016). This study primarily addresses this gap in the literature.

During preliminary discussions with Dutch investment experts, as detailed in Section 3, the five criteria presented in Figure 3 were selected and adapted based on the characteristics of Dutch PhVCs. These investment criteria and their respective sub-criteria are visible in Figure 3, and they were validated through conversations with Dutch investment experts before commencing the empirical research, as explained in Section 3 of this paper. The five investment criteria and their sub-criteria are detailed below and can also be found in the table in APPENDIX A, along with descriptions of the sub-criteria.

2.6.1 | Management team

The primary criterion investors value when evaluating potential portfolio companies is a robust management team. Prior to investment, funders verify that the targeted social enterprise is led by entrepreneurs possessing a diverse set of skills (PricewaterhouseCoopers, 2014). According to Miller and Wesley (2010), investors highly value entrepreneurs who exhibit a fervor for social change, possess a relevant network, can navigate innovations, and have experience in the field. Investors view a strong management team with suitable expertise as a key indicator of potentially sustainable businesses (PricewaterhouseCoopers, 2014).

2.6.2 | Potential

The second vital investment criterion, as highlighted in the literature, is the aspiration to invest in companies with the potential to achieve social impact, financial returns, and scalability. According to Leborgne-Bonassié et al. (2019), the social philosophy of the entrepreneur driving the venture holds significance for investors. However, this ideology alone may not suffice. For investors, it is essential that the social enterprise generate financial profits to ensure the venture's long-term sustainability (Leborgne-Bonassié et al., 2019). Scarlata et al. (2012) also emphasize the importance of this potential for both social outcomes and financial profits. Consequently, funders prefer businesses capable of realizing a blend of social impact and economic returns (Miller & Wesley, 2010).

2.6.3 | External environment

The third criterion identified in the literature pertains to the external environment of the social enterprise. Investors scrutinize the market in which the venture operates and the overall market size (Scarlata et al., 2012). As noted by Scarlata and Alemany (2008), the attractiveness of the investment may also hinge on the level of competition, which is recognized as part of the external environment criteria. Additionally, with regard to the external environment, investors place a high value on the scalability of the social enterprise's product or service (Martin & John, 2006).

2.6.4 | Organizational strategy/activity

Another recognized investment criterion concerns the strategy and activities of the organization. This entails investors examining the social enterprise's specific product, the technologies it employs, and the revenue model adopted by the business (Scarlata et al., 2012; Scarlata & Alemany, 2009). Funders seek information about the operational methods of the potential portfolio company. In essence, they assess whether the product or service meets public demands and whether it outperforms competitors in terms of quality. A sustainable revenue model and business strategy are therefore crucial for PhVCs.

2.6.5 | Assessment of the deal

The final recognized criterion in the literature is the assessment of the deal. This implies that investors attach importance to the terms of the investment agreement and assess the extent to which the investment aligns with their existing investment strategies (Scarlata et al., 2012; Scarlata & Alemany, 2009).

These five investment criteria have been chosen for the empirical research and will be compared to determine their relative importance and weights.

3 | METHODOLOGY

This research employs a multi-criteria decision-making (MCDM) approach to assess investments in social enterprises from the perspective of PhVCs. MCDM is a common practice in the financial investment sector (Hallerbach & Spronk, 2002). The main objective of this research is to determine the relative importance of different investment criteria. The Best-Worst Method (BWM), a pairwise comparison-based MCDM method, is used to achieve this objective due to its several advantages over other methods (Rezaei, 2015, 2016).

While various MCDM methods are available, not all are suitable for MCDM problems due to potential drawbacks. For example, the Analytic Hierarchy Process (AHP) may lead to inconsistencies in the unstructured design of pairwise comparison matrices, and it

involves a high number of redundant pairwise comparisons (Rezaei, 2015). The BWM effectively addresses these issues and is favored by researchers. BWM provides several advantages:

1. It allows experts to make more reliable and consistent pairwise comparisons by clearly understanding the range of evaluation from the outset through the selection of the best and worst criteria.
2. It reduces potential biases such as anchoring and equalizing biases by using two pairwise comparison vectors based on the best and worst criteria (Rezaei et al., 2022a, 2022b).
3. It involves data and time-efficient pairwise comparisons, requiring 2n-3 comparisons, as opposed to AHP, which involves n(n−1)/2 comparisons, where n represents the number of criteria. Additionally, it allows for checking the consistency of pairwise comparisons.

While there are other methods with fewer pairwise comparisons than BWM, such as Tradeoff (Keeney & Raiffa, 1976), SMART, and Swing (Edwards & Barron, 1994), they lack an essential feature, which is the ability to check the consistency of provided pairwise comparisons (Brunelli, 2022; Liang et al., 2022). Therefore, BWM was chosen for analyzing the data collected in this research.

3.1 | Best worst method

The BWM is a multi-criteria decision-making method developed by Rezaei, 2015. It determines the weights of different criteria through pairwise comparisons made by the decision-maker(s).

Best worst method can yield multiple optimal solutions when employing a non-linear minmax model. However, when using a linear BWM model, the pairwise comparison results in a single unique outcome (Rezaei, 2016). This research adopts a linear BWM model to identify the most highly valued investment criterion considered by PhVCs.

3.1.1 | Conducting the BWM: Steps to take

Below, a concise overview is provided of the different steps to take when the BWM is adopted as part of the methodology in research, based on Rezaei (2016) and Liang et al. (2020). There are five steps in total, each of which is of significant importance when the weights of investment criteria are calculated in this research.

Step 1: identify a set of decision criteria by the decision-maker.
Several criteria need to be listed based on the problem as $\{c_1, c_2, c_3, \ldots, c_n\}$.

Step 2: identify the best criterion (or most important, most preferred criterion) and the worst criterion (or least important, least preferred criterion) among the set of decision criteria by the decision-maker.
Only the best and the worst criteria are selected in this step.

Step 3: Compare the best criteria over all other criteria (BO Vector) by the decision-maker.
In this step, a 9-point scale is used to compare the best criterion to all the other criteria. By doing so, the decision-maker can numerically indicate their preference of the best criterion over the residual criteria. On the 9-point scale, number 1 represents equal importance, whereas number 9 means that the best criterion is rated 'extremely more important' than others. At the end of this third step, the following best-to-others (BO) vector arises: $A_B = (a_{B1}, a_{B2}, \ldots a_{Bn})$.

In this vector, a_{Bj} represents to what extent the best criterion B is more preferred to criterion j.

Step 4: Compare the least important (Worst) criteria to other criteria by the decision-maker.
This step is somewhat similar to the third step; however, in this step, the 9-point scale is used to compare all other criteria to the worst criterion (OW). In this case, the vector will look as follows:

$$A_W = (a_{1W}, a_{2W}, \ldots a_{nW})$$

Step 5: Find the optimal weight.
This step is meant to calculate the optimal weights of the different criteria. According to Rezaei (2016), by minimizing the maximum value of the set of $\{|w_B - a_{Bj}w_j|, |w_j - a_{jW}w_W|\}$ for all j, the problem can be translated into the following:

$$\min_w \max_j \{|w_B - a_{Bj}w_j|, |w_j - a_{jW}w_W|\}$$

$$\text{subject to} \sum_{j=1}^{n} w_j = 1, w_j \geq 0, \text{for all j} \quad (1)$$

This problem (1) can be written as a linear programming model, which will be shown below:

$$\min \xi,$$

such that.

$$|w_B - a_{Bj}w_j| \leq \xi, \text{for all j}$$

$$|w_j - a_{jW}w_W| \leq \xi, \text{for all j}$$

$$\sum_{j=1}^{n} w_j = 1$$

$$w_j \geq 0, \text{for all j} \quad (2)$$

The second problem (2) is a linear problem yielding a single solution. This linear problem is appropriate for determining the most important investment criterion for PhVCs since a unique solution is desired.

To ensure the consistency of pairwise comparisons, we utilize the input-based consistency ratios and associated thresholds provided by Liang et al. (2020).

3.2 | Data collection

To assess and evaluate the importance of investment criteria, data was collected from Dutch PhVCs using a questionnaire. Questionnaires are a widely used tool in quantitative research to gather numerical data about facts, human behavior, opinions, attitudes, and judgments (Rowley, 2014). This research aimed to understand the significance of investment criteria employed by Dutch PhVCs when selecting social enterprises for their portfolio. Given the nature of the data being collected, a questionnaire was the appropriate method for this study.

The questionnaire was designed for the Best-Worst Method and administered to relevant respondents. It was standardized to ensure all respondents received the same information and questions. The survey questions were presented in an online environment but within the framework of a face-to-face conversation to guarantee that respondents correctly interpreted the questions and provided suitable answers in line with the chosen BWM methodology.

The study engaged 17 experts in social investments, representing foundations, investment funds, and commercial banks that invest in social enterprises within the Netherlands. Due to their extensive experience in the field, these experts possessed valuable insights into the significance of investment criteria for PhVCs, aligning with the research's objectives. Before participating in the survey, the key investment criteria and sub-criteria were validated through discussions with two investment experts. We identified these two experts through LinkedIn by reviewing the information in their profiles and then reached out to them. This validation process ensured that the investment criteria derived from the existing scientific literature accurately reflected the practical requirements of the Dutch social investment sector.

To ensure the reliability of the survey results, the participating experts were required to identify themselves as 'impact' investors in social enterprises or PhVCs. The selection of experts was conducted meticulously. First, the chosen experts had to meet the research's definition of PhVCs. Second, they were expected to prioritize social returns on their investments alongside financial returns. Experts were identified based on information from websites, LinkedIn and articles confirming their self-identification as social investors.

Furthermore, the organizations employing the respondents were required to have at least three years of experience in impact investing to demonstrate their knowledge and expertise in the field. Table 1 provides an overview of the characteristics of the 17 experts and the criteria based on which they were selected.

A document was provided to them after the selection process for investment experts and their agreement to participate. This document included information about the questionnaire procedure and an explanation of the methodology being used. The purpose of this document was to ensure that the experts were well-informed about the meeting's objectives in advance, allowing them to carefully consider their responses and make efficient use of the meeting time.

TABLE 1 Characteristics of the 17 respondents, the investment experts.

Expert no.	Years of experience	Expert gender	Type of capital
1	27	M	Equity, debt, donation
2	27	M	Equity, debt
3	5	F	Equity, debt
4	7	F	Equity, debt
5	15	M	Equity, debt, donation, crowd funding
6	7	M	Equity, debt
7	47	M	Debt, donation
8	6	M	Equity, debt
9	9	M	Equity, debt
10	8	F	Equity
11	3	F	Debt
12	38	M	Equity, debt
13	31	M	Equity, debt
14	5	M	Equity, debt
15	19	F	Equity, donation
16	3	M	Equity, debt
17	3	F	Equity, debt

TABLE 2 Characteristics of the five portfolio companies that were selected by the decision-maker.

Firm no.	Firm's target	Firm's activity	Legal entity
1	Job employment-people with distance to the labor market	Information technology services	Ltd.; private limited liability company in the Netherlands
2	Job employment-people with distance to the labor market	Viticulture, wine-making	Ltd.; private limited liability company in the Netherlands
3	Job employment-people with distance to the labor market	Real estate for volunteers active in healthcare	Ltd.; private limited liability company in the Netherlands
4	Loneliness amongst older people	Activities and inclusion for older people in isolation	Foundation in the Netherlands
5	Job employment-people with distance to the labor market	Beer brewing	Ltd.; private limited liability company in the Netherlands

3.3 | Application in a PVC firm in the Netherlands

Once the data on the importance of investment criteria from Dutch PhVC experts had been collected, it was applied to a case involving a PhVC firm in the Netherlands. The purpose of this application was to create a framework for PhVC investors, assisting them in enhancing their decision-making processes for future investments and evaluating past investments.

The decision-maker in this case, who is part of the PhVC firm, identifies as a Dutch impact investor involved with an impact investment foundation in the Netherlands. This foundation serves as a funding source for social enterprises, focusing on aiding vulnerable individuals in society, particularly those distant from the labor market with limited job prospects. In addition to providing financial support, the foundation offers knowledge sharing and access to a relevant network for project initiators and entrepreneurs, all with the ultimate goal of maximizing social impact. These characteristics align with the definition of PhVCs as outlined in this research.

The foundation has a long history, established in 1925, when it initially supported social institutions financially. After updating its bylaws, the foundation modernized and has operated in its current form since 2005. The decision-maker holds a significant role within the organization and possesses over 10 years of experience in impact investing.

To develop the investment decision-making framework, data was initially collected to determine the importance of investment criteria from the decision-maker's perspective. The same BWM questionnaire that had been used with the investment experts was administered to the decision-maker. Once the decision-maker's preferences on the investment criteria were collected, and the criteria's weights were calculated, the decision-maker was tasked with rating the performance of five portfolio companies across all 14 sub-criteria used in this research.

For performance ratings, the decision-maker employed a scale ranging from 1 (very low) to 5 (very high). The decision-maker selected the five portfolio companies to be evaluated based on their performance when they were initially added to the portfolio. The characteristics of these five selected portfolio companies are detailed in Table 2.

Once the performance of the five portfolio companies on the 14 sub-criteria had been determined, the performance scores for each sub-criterion were multiplied by the corresponding global weights of the sub-criteria, as calculated previously. This process resulted in a single value for each of the five portfolio companies, indicating their overall performance. The companies were then ranked based on these values, with the highest-ranked company being the most favorable for future or past investments.

In this research, the multiplication of performances by the global weights of the sub-criteria was carried out both from the decision-maker's perspective and from the perspective of the 17 experts. The final rankings demonstrated that this framework could be a valuable tool for PhVCs in making well-informed investment decisions.

4 | RESULTS

4.1 | Optimal weights of PhVC investment criteria from the perspectives of 17 experts

The optimal weights of the five main investment criteria (Management team, Potential, External environment, Organizational strategy/activity, and Assessment of the deal) based on the preferences of the 17 investment experts are presented in Table 3, alongside the weights of the sub-criteria. The input-based consistency ratios of the investment experts' preferences for the criteria and sub-criteria are all within the thresholds of BWM and close to zero, indicating consistent and reliable outcomes (Liang et al., 2020).

Table 3, Column 2 shows that Potential is the most highly evaluated and crucial investment criterion (0.323) according to Dutch PhVCs. This finding aligns with Scarlata and Alemany (2009), highlighting the greater importance of Potential for PhVCs compared to traditional VCs. Given the characteristics and definition of PhVCs described in this research, it is evident that these investors aim for combined social impact and financial returns (Miller & Wesley, 2010).

TABLE 3 Relative weights of the investment criteria and sub-criteria as evaluated by 17 impact investment experts.

Criteria	Criteria weights	Sub-criteria	Local weights of sub-criteria	Global weights of sub-criteria
Management team	0.283	Experience	0.299	0.085
		Personality	0.403	0.114
		Educational background	0.105	0.030
		Community-based network	0.193	0.054
Potential	0.323	Social impact	0.364	0.118
		Financial returns	0.218	0.071
		Scale	0.417	0.135
External environment	0.094	Social market served	0.437	0.041
		Market size	0.563	0.053
Organizational strategy	0.193	Business strategy	0.314	0.060
		Revenue/funding model	0.377	0.073
		Technology	0.310	0.060
Assessment of the deal	0.108	Deal terms	0.584	0.063
		Fit in the portfolio	0.416	0.045

They share this goal with social enterprises adopting a dual organizational identity. The investment criterion "Potential" encompasses both the sub-criteria "Social impact" and "Financial returns." Therefore, it is unsurprising that experts rated Potential as the most important, as it corresponds with the values of PhVCs as described in the scientific literature. After all, PhVCs can only achieve their desired social impact and financial returns by investing in organizations with similar values and potential (Block et al., 2021).

The investment criterion "Potential" is followed by "Management team" (0.283) and "Organizational strategy/activity" (0.193). The significance of the composition and competencies of the management team in potential investments is consistent with the literature (e.g., Scarlata & Alemany, 2009). The literature emphasizes that human capital holds a higher value than organizations' specific market characteristics, such as market size (Leborgne-Bonassié et al., 2019). Furthermore, Miller and Wesley (2010) recognize that the management team's characteristics play a crucial role in gaining access to PhVC funding. Their study mentions that factors such as entrepreneurs' dedication and passion, the management team's experience, educational prestige, and their network positively influence the screening process to secure financial injections from investors (Miller & Wesley, 2010).

"Assessment of the deal" (0.108) and "External environment" (0.094) are evaluated as the investment criteria with the lowest importance for Dutch PhVCs. Although there is relatively little difference between the weights of both criteria, the "External environment" is considered the least important. The fact that the external environment does not play a vital role in the early stages of investments aligns with the literature. Scientific research indicates that criteria related to impact and human capital are rated more important when compared to business criteria such as market size or the specific market composition in which the organization operates (Block et al., 2021; Leborgne-Bonassié et al., 2019).

The global weights of the sub-criteria, presented in Column 5 of Table 3, were calculated by multiplying the local weights of the sub-criteria by the weights of the corresponding main investment criteria (Salimi & Rezaei, 2018). These global weights allow for an overall ranking of the 14 sub-criteria and a comparison between them.

Column 5 shows that the sub-criteria "Scale" (0.135), "Social impact" (0.118), and "Personality" (0.114) are evaluated as the most important sub-criteria according to Dutch PhVCs. Combined, they represent 36.7% of the total importance of the 14 investment sub-criteria. In conversations with the experts, they pointed out that "Scale," "Social impact," and even "Financial returns" are closely related and somewhat intertwined. Scalability in products or services is necessary to realize significant social impact, which is the ultimate goal of PhVCs. The desire for social impact can be combined with financial returns, making scalable products or services attractive for generating economic returns. This relationship of "Scale" with the other two sub-criteria, "Social impact" and "Financial returns," is why it has the highest evaluated global weight (0.135), according to the opinions of the 17 experts. Given these results, the likelihood of attracting financial investments from funders should increase when social enterprises perform well on the sub-criteria "Scale" and "Social impact."

Considering the optimal weights of the main criteria, it is not unexpected to see a sub-criterion of the "Management team" among the highest global weights. "Personality" outperformed the other sub-criteria within the "Management team" category, resulting in it being the third most important sub-criterion with a global weight of 0.114. A study by Scarlata et al. (2012) argues that entrepreneurs and management teams of businesses highly value personal characteristics such as enthusiasm and competency to show leadership. Arguably, shared personal beliefs and values between PhVCs and social enterprises, as discussed previously, is another reason why "Personality" is evaluated with such importance. When entrepreneurs can display the

TABLE 4 Criteria weights as evaluated in the case by the decision-maker.

Criteria	Criteria weights	Sub-criteria	Local weights of sub-criteria	Global weights of sub-criteria
Management team	0.253	Experience	0.226	0.057
		Personality	0.597	0.151
		Educational background	0.065	0.016
		Community-based network	0.113	0.029
Potential	0.169	Social impact	0.542	0.091
		Financial returns	0.167	0.028
		Scale	0.292	0.049
External environment	0.127	Social market served	0.500	0.063
		Market size	0.500	0.063
Organizational strategy	0.416	Business strategy	0.583	0.242
		Revenue/funding model	0.333	0.139
		Technology	0.083	0.035
Assessment of the deal	0.036	Deal terms	0.100	0.004
		Fit in the portfolio	0.900	0.033

same level of commitment to realizing social impact as investors and the management team is authentic, they are more likely to attract potential funders (Chen et al., 2009).

The relatively low evaluations of the sub-criteria "Educational background" (0.030) and "Community-based network" (0.054) within the "Management team" category are somewhat surprising. Block et al. (2021) state investors recognize "Educational background" as an important entrepreneurial characteristic. Furthermore, a study by Miller and Wesley (2010) argues that a strong network supports entrepreneurs in mobilizing volunteers and stakeholders to address pressing social issues. However, the questionnaire outcomes among the experts do not show this trend among Dutch PhVCs. Only one expert evaluated "Educational background" as the most important sub-criterion of the "Management team," while only two experts pointed out "Community-based network" as the most important sub-criterion of the "Management team."

The global weights of the sub-criteria "Financial returns" (0.071) and "Revenue/funding model" (0.073) are also somewhat surprising. With these global weights, the "Revenue/funding model" is evaluated as the fifth most important sub-criterion, while "Financial returns" ranks sixth in the overall ranking of the global weights of sub-criteria (Column 5, Table 3). Consequently, both financial sub-criteria are ranked as relatively important and are not overlooked by the Dutch experts. Considering the characteristics of PhVCs, as discussed previously, PhVCs aim to grow social enterprises and support entrepreneurs in building a (financially) sustainable business practice. Therefore, it is somewhat unexpected that experts prioritize an existing credible revenue and funding model and evaluate it as the fifth most important sub-criterion. However, from another perspective, it is clear that PhVCs can combine social impact with economic returns, and financial investment criteria are not necessarily outside the realm of consideration.

4.2 | Application in a case

4.2.1 | Optimal weights of PhVC investment criteria from the perspectives of a decision-maker in a PhVC firm

As mentioned earlier, two datasets were collected in the case application of the decision-maker in a PhVC firm in the Netherlands. The decision-maker was asked to indicate their preferences for the investment criteria. Based on these preferences, the optimal weights were calculated using BWM. The results of the importance of the investment criteria and sub-criteria according to the decision-maker are shown in Table 4.

In Column 2 of Table 4, the decision-maker evaluated "Organizational strategy/activity" (0.416) as the most important investment criterion. This differs from the opinions of the 17 investment experts, who rated "Potential" as the most important. Like the investment experts, the decision-maker rated the "Management team" (0.253) as the second most important criterion. "Potential" is the third most important investment criterion in the eyes of the decision-maker, with an optimal weight of 0.169. "External environment" (0.127) and "Assessment of the deal" (0.036) are evaluated as the least important investment criteria.

Column 5 of Table 4 shows the global weights of the sub-criteria according to the decision-maker's preferences. Overall, the sub-criteria "Business strategy" (0.242), "Personality" (0.151), and "Revenue/funding model" (0.139) are evaluated as the most important, together accounting for 53.2% of the total importance of the 14 sub-criteria. The decision-maker rated "Deal terms" (0.004) as the sub-criterion with the lowest importance, whereas "Educational background" (0.016), "Financial returns" (0.028), and "Community-based network" (0.029) are also evaluated with low importance.

4.2.2 | Comparing the results of investment criteria importance from the perspectives of experts and the decision-maker

Differences between the evaluations of the experts and the decision-maker are apparent. Most significantly, the decision-maker's evaluation deviates from the experts' rankings regarding "Organisational strategy/activity". Organizational strategy/activity is the most important criterion for the decision-maker, ranking third on the experts' list. The decision-maker explained that this difference is due to the specific focus of his investment organization. His organization's focus is on a particular topic or sector where they aim to make an impact on society. Social enterprises operating outside this specific focus are not interesting for the investment organization and do not qualify for funds, regardless of their potential social impact.

The decision-maker mentioned that he first looks for social enterprises operating within the investment focus of his organization. Then, he searches for entrepreneurs and businesses that can make the most impact and generate the highest social return on investments. He expressed surprise that the experts did not evaluate the focus or Organizational strategy/activity as the most important investment criterion but rated "Potential" with high importance. According to the decision-maker, the organizational activity within the investment focus is the most critical investment criterion, followed by a match between the investor and investee and the potential impact that could be realized as an investment outcome. This order is considered when the investment organization screens and evaluates business proposals, but, according to him, it should also be relevant for other investors. Therefore, the decision-maker evaluated Organizational strategy/activity (0.416) as the most important main criterion followed by the Management team (0.253) and Potential (0.169).

Another deviation between the decision-maker and the experts is related to "Assessment of the deal" and the "External environment." The decision-maker evaluated "Assessment of the deal" as far less important (0.036). In contrast, in the case of the experts, the least important criterion was the "External environment" (0.094), although the difference with "Assessment of the deal" (0.108) is insignificant. The decision-maker explained that he evaluated "Assessment of the deal" as least important because his investment organization is, to a lesser extent, concerned with financial returns, which could be different for other investors aiming for impact. In his case, deal terms and portfolio fits are not as relevant. However, the decision-maker indicated that particular deal terms could be useful for reclaiming a loan that is not paid off and putting some pressure on the entrepreneur. Nevertheless, in the long run, claiming back investments is not the initial intention of the decision-maker when evaluating business proposals and structuring investment deals. This could explain the difference in the evaluations of "Assessment of the deal" and the "External environment" by the decision-maker and the average evaluations of the 17 experts.

Regarding the sub-criteria with the highest global weights according to the decision-maker, they are "Business strategy" (0.242), "Personality" (0.151), and "Revenue/funding model" (0.139). "Business strategy" and "Revenue/funding model" deviate from the experts' preferences, but this can be explained by the motivations of the decision-maker and the high evaluation of the main criterion "Organisational strategy/activity," as described above. Other notable differences between the decision-maker and the experts are deviations regarding the sub-criteria "Scale" and "Technology." The decision-maker evaluated "Social impact" more importantly than "Scale," which is the other way around according to the experts' preferences. However, the decision-maker indicated that "Scale" is also important to him and is correlated with the social impact that can be realized through investments. In addition, the local weights of the sub-criteria help understand that "Technology" is evaluated as less important by the decision-maker (0.083) compared to the experts' evaluations (0.310). The decision-maker explained that a possible preference for "Technology" depends on the investor's focus, affinity, and background. Funders with a background in technology are more interested in investments related to specific technologies since they align with their interests. Since the decision-maker has no personal affinity or background in technology, he is less interested in investments in innovative assets or technology and focuses on his organizational focus.

4.2.3 | Measuring the performance and ranking of five portfolio companies in a PhVC firm from the perspectives of the decision-maker

The second data set from the decision-maker contained the performance scores on the 14 sub-criteria for five portfolio companies, as shown in Table 5. The decision-maker assigned performance scores to these companies based on a 5-point scale, where a score of 1 indicated poor performance, and a score of 5 represented high-performance.

From the decision-maker's perspective, in Columns 2 to 15 of Table 6, the performance scores of individual sub-criteria for each company are multiplied by the global weight of the corresponding sub-criteria. The overall aggregated performance, shown in Column 16 of Table 6, represents the total value of each company. Consequently, the five portfolio companies were ranked in Column 17 of Table 6 based on this aggregated overall performance. This ranking reveals that Firm 3 achieved the highest overall performance score, with a total of 4.084, while Firm 5 received the lowest performance score (3.025).

4.2.4 | Ranking of five portfolio companies in a PhVC firm from the perspectives of 17 experts

When the performance scores in Table 5 were multiplied by the sub-criteria global weights based on the preferences of the experts (Table 7), a ranking emerged that was only slightly different. The small difference in the ranking is primarily due to the varying global weights of the sub-criteria between the decision-maker and the 17 experts. Nevertheless, the overall outcomes remain consistent with those seen from the decision-maker's perspective.

TABLE 5 Performance scores of 5 portfolio companies on sub-criteria according to the decision-maker.

	Management team				Potential			External environment		Organizational strategy			Assessment of the deal	
Firm No.	MT1	MT2	MT3	MT4	P1	P2	P3	EE1	EE2	OA1	OA2	OA3	AD1	AD2
1	4	4	4	2	4	5	5	4	5	4	4	2	1	5
2	4	4	2	2	3	2	2	3	5	3	2	2	2	4
3	2	5	4	4	4	4	5	4	5	4	4	4	4	2
4	4	5	2	4	4	2	5	4	5	4	3	3	1	3
5	3	2	2	3	4	3	4	3	5	2	4	3	2	4

Abbreviations: MT1, Experience; MT2, Personality; MT3, Educational background; MT4, Community-based network; P1, Social impact; P2, Financial revenues; P3, Scale; EE1, Social market served; EE2, Market size; OA1, Business strategy; OA2, Revenue/funding model; OA3, Technology; AD1, Deal terms; AD2, Fit in the portfolio.

As a result, Column 17 of Table 7 presents a ranking where Firm 3 is still the best-performing organization. Firm 1 and Firm 4 maintain their positions as the second and third-best-performing companies, respectively. The only notable difference in the aggregated overall values of the portfolio companies is that Firm 2 is now evaluated with the lowest value, whereas it was ranked fourth from the decision-maker's perspective. Conversely, Firm 5 is now regarded as the fourth best-performing company, whereas it was ranked lowest by the decision-maker.

4.2.5 | Comparing the results of performances of the five portfolio companies from the perspectives of experts and the decision-maker

The outcomes of the calculated performances of the five portfolio companies and the corresponding performance rankings in the case application are interesting to discuss. The computed values per individual sub-criteria, as presented in Table 6, help in comparing the items. For example, it is evident from Table 6 that Firm 1, Firm 3, and Firm 4 score high on their Business strategy (OA1) performance, which the decision-maker evaluates as the most important sub-criterion. At the same time, among these three firms, only Firm 1 scores lower on the second most important sub-criterion Personality (MT2), while only Firm 4 underperforms on the third-highest evaluated sub-criterion, Revenue/funding model (OA2). Therefore, focusing only on the three highest evaluated sub-criteria would also indicate that Firm 3 performs best, just as Firm 3 scores highest overall.

The calculated global weights of the sub-criteria and the corresponding performance scores establish a clear relationship between the overall performance ranking of the five portfolio firms, both from the perspective of the decision-maker and the experts. For instance, the unweighted average of the performance scores of Firm 3 (3.929) is the highest of the five portfolio firms, followed by the unweighted average of the second-best-performing Firm 1 (3.786). Therefore, the high unweighted averages of both firms also result in the first and second place for the best-performing portfolio companies in both cases.

In practice, the impact of the differences in the calculated global weights of the sub-criteria is not visible when comparing the performance ranking based on the decision-maker (Table 6) and the performance ranking based on the experts (Table 7). Interestingly, there is little difference between the outcomes of both performance rankings, which means that the differences in calculated global weights of the sub-criteria do not deviate enough to change the performance ranking significantly. As visible in Table 6, Firm 3 performs best according to the decision-maker's perspective, whereas the experts' sub-criteria global weights put Firm 3 at the top of the performance ranking as well (Table 7). Consequently, the decision-maker did not change his view on the preferences of the sub-criteria since he believed the weights are still representative of the investment focus, values, and purpose of his investment organization. As a result, the performance rankings show that the presented framework is useful for ranking portfolio companies and considering the personal investment preferences of funders. Since the rankings are based on the evaluations of the investment sub-criteria, the framework can be used by PhVCs to assist in investment decision-making and assess future investments or investments previously made.

5 | CONCLUSION, LIMITATIONS, AND RECOMMENDATIONS

This research addresses the important issue of how social enterprises can access financial capital in their early growth stages by aligning their business proposals with the demands and preferences of Dutch PhVC investors. It provides valuable insights into the importance and weights of investment criteria considered by Dutch PhVCs, offering a framework for investment decision-making. The study also proposes practical recommendations and strategies for social enterprises to better match their proposals with the expectations of PhVC investors. Some of them are:

Impact Measurement and Reporting

Social enterprises need to develop strong impact measurement metrics and systems to track and report their social impact. PhVC investors want evidence of social enterprise's ability to create positive change.

TABLE 6 Calculated value of 5 portfolio companies based on performance scores and criteria weights from the perspective of the decision-maker.

	Management team				Potential			External environment		Organizational strategy			Assessment of the deal		Agg. Overall	Rank overall
Firm No.	MT1	MT2	MT3	MT4	P1	P2	P3	EE1	EE2	OA1	OA2	OA3	AD1	AD2		
1	0.229	0.604	0.065	0.057	0.365	0.141	0.246	0.253	0.316	0.970	0.554	0.069	0.004	0.163	4.036	2
2	0.229	0.604	0.033	0.057	0.274	0.056	0.098	0.190	0.316	0.727	0.277	0.069	0.007	0.130	3.068	4
3	0.114	0.755	0.065	0.114	0.365	0.112	0.246	0.253	0.316	0.970	0.554	0.139	0.014	0.065	4.084	1
4	0.229	0.755	0.033	0.114	0.365	0.056	0.246	0.253	0.316	0.970	0.416	0.104	0.004	0.098	3.958	3
5	0.171	0.302	0.033	0.086	0.365	0.084	0.197	0.190	0.316	0.485	0.554	0.104	0.007	0.130	3.025	5

Abbreviations: MT1, Experience; MT2, Personality; MT3, Educational background; MT4, Community-based network; P1, Social impact; P2, Financial revenues; P3, Scale; EE1, Social market served; EE2, Market size; OA1, Business strategy; OA2, Revenue/funding model; OA3, Technology; AD1, Deal terms; AD2, Fit in the portfolio.

TABLE 7 Calculated value of 5 portfolio companies based on the performance scores and criteria weights from the perspective of the 17 experts.

	Management team				Potential			External environment		Organisational strategy			Assessment of the deal		Agg. Overall	Rank overall
Firm No.	MT1	MT2	MT3	MT4	P1	P2	P3	EE1	EE2	OA1	OA2	OA3	AD1	AD2		
1	0.339	0.456	0.119	0.109	0.471	0.353	0.673	0.164	0.264	0.242	0.290	0.119	0.063	0.224	3.885	2
2	0.339	0.456	0.059	0.109	0.353	0.141	0.269	0.123	0.264	0.181	0.145	0.119	0.126	0.179	2.864	5
3	0.169	0.570	0.119	0.218	0.471	0.282	0.673	0.164	0.264	0.242	0.290	0.239	0.252	0.090	4.042	1
4	0.339	0.570	0.059	0.218	0.471	0.141	0.673	0.164	0.264	0.242	0.218	0.179	0.063	0.134	3.735	3
5	0.254	0.228	0.059	0.163	0.471	0.212	0.539	0.123	0.264	0.121	0.290	0.179	0.126	0.179	3.208	4

Abbreviations: MT1: Experience; MT2: Personality; MT3: Educational background; MT4: Community-based network; P1: Social impact; P2: Financial revenues; P3: Scale; EE1: Social market served; EE2: Market size; OA1: Business strategy; OA2: Revenue/funding model; OA3: Technology; AD1: Deal terms; AD2: Fit in the portfolio.

Demonstrate scalability and replicability

Social enterprises need to show how their model can scale to reach more beneficiaries or be replicated in different regions and contexts, which can attract PhVC investors looking for large-scale impact.

Hire educated management team members and, if necessary, educate them

Social enterprises need to take the time to hire members with a relevant background in the industry and a passionate personality to reach social objectives and, if necessary, educate them.

This research's contribution to the field of social entrepreneurship science is significant as it helps bridge the gap between investors and social enterprises, enhancing access to financial capital for the latter.

While the research has achieved its objectives, it is essential to acknowledge its limitations. The framework for investment decision-making is based on a snapshot of performance evaluation and may not fully capture the dynamic nature of human capital over time. Additionally, the study relies entirely on a quantitative approach, and a mixed research approach could have provided a more comprehensive understanding of the motivations behind the criteria weights. Potential mediating factors are not considered in this research, such as the types of financial injections, exit timeframes, industry preferences, risk tolerance, and market dynamics. Future research could explore these aspects with a larger group of PhVC respondents.

Moreover, examining how social enterprises themselves value investment criteria and comparing their perspectives with those of PhVC investors would provide a more comprehensive view of the alignment between the two parties. Finally, investigating potential differences in assessment criteria between traditional VCs and PhVCs would be valuable for understanding how these two investor types evaluate social enterprises differently.

Overall, this research contributes to the field of social entrepreneurship and investment decision-making, offering practical guidance for social enterprises seeking financial capital and highlighting potential avenues for future research and exploration in this area.

ACKNOWLEDGEMENTS

The authors express their gratitude to the editors and two anonymous reviewers for their insightful feedback on a previous iteration of this article. Additionally, they extend their appreciation to 17 experts in Dutch philanthropic venture capitalists (PhVCs) and a decision maker at a PhVC firm in the Netherlands for their invaluable contributions and active involvement in this work.

CONFLICT OF INTEREST STATEMENT

All authors declare that they have no conflicts of interest.

DATA AVAILABILITY STATEMENT

The data that support the findings of this study are available from the corresponding author upon reasonable request.

ORCID

Negin Salimi https://orcid.org/0000-0001-8202-699X

REFERENCES

Amit, R., Brander, J., & Zott, C. (1998). Why do venture capital firms exist? Theory and Canadian evidence. *Journal of Business Venturing*, *13*(6), 441–446.

Austin, J., Stevenson, H., & Wei-Skillern, J. (2006). Social and commercial entrepreneurship: Same, different, or both? *Entrepreneurship: Theory & Practice*, *30*(1), 1–22.

Barber, B. M., Morse, A., & Yasuda, A. (2021). Impact investing. *Journal of Financial Economics*, *139*(1), 162–185.

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. *Journal of Corporate Finance*, *58*, 329–352.

Block, J. H., Hirschmann, M., & Fisch, C. (2021). Which criteria matter when impact investors screen social enterprises? *Journal of Corporate Finance*, *66*, 101813.

Boschee, J. (2001). Eight basic principles for non-profit entrepreneurs. *Non-profit World*, *19*(4), 15–18.

Brunelli, M. (2022). Why should not a decision analyst be content with only (n-1) pairwise comparisons? Echoes from the literature. In *The international workshop on best-worst method* (pp. 33–40). Springer International Publishing.

Chen, X. P., Yao, X., & Kotha, S. (2009). Entrepreneur passion and preparedness in business plan presentations: A persuasion analysis of venture capitalists' funding decisions. *Academy of Management Journal*, *52*(1), 199–214.

Circle Economy. (2018). PGGM, KPMG, EBRD, & WBCSD Linear Risks: How business as usual is a threat to companies and investors. https://www.circle-economy.com/resources/linear-risks-how-business-as-usual-is-a-threat-to-companies-and-investors

Dhochak, M., & Sharma, A. K. (2016). Identification and prioritization of factors affecting venture capitalists' investment decision-making process: An analytical hierarchal process (AHP) approach. *Journal of Small Business and Enterprise Development*, *23*(4), 964–983.

Divestopedia. (2021). Investment criteria. What does investment criteria mean? https://www.divestopedia.com/definition/891/investment-criteria

Ebrahim, A., Battilana, J., & Mair, J. (2014). The governance of social enterprises: Mission drift and accountability challenges in hybrid organizations. *Research in Organizational Behavior*, *34*, 81–100.

Edwards, W., & Barron, F. H. (1994). SMARTS and SMARTER: Improved simple methods for multiattribute utility measurement. *Organizational Behavior and Human Decision Processes*, *60*(3), 306–325.

Emerson, J. (2000). The Nature of Returns: A Social Capital Markets Inquiry into the Elements of Investment and the Blended Value Proposition. www.blendedvalue.org

Ferrati, F., & Muffatto, M. (2021). Reviewing equity investors' funding criteria: A comprehensive classification and research agenda. *Venture Capital*, *23*(2), 157–178.

Galera, G., & Borzaga, C. (2009). Social enterprise: An international overview of its conceptual evolution and legal implementation. *Social Enterprise Journal*, *5*(3), 210–228. https://doi.org/10.1108/17508610911004313

GIIN. (2019). What is Impact Investing? https://thegiin.org/impact-investing/need-to-know/#what-is-impact-investing

Gompers, P. A., & Lerner, J. (1998). What drives venture capitalists fundraising? Brookings Papers on Economic Activity. *Microeconomics*, *1998*, 149–204. https://www.jstor.org/stable/2534802

Hall, J., & Hofer, C. W. (1993). Venture capitalists' decision criteria in new venture evaluation. *Journal of Business Venturing*, *8*(1), 25–42.

Hallerbach, W. G., & Spronk, J. (2002). The relevance of MCDM for financial decisions. *Journal of Multi-Criteria Decision Analysis*, *11*(4–5), 187–195.

https://www.circle-economy.com/resources/linear-risks-how-business-as-usual-is-athreat-to-companies-and-investors

Hynes, B. (2009). Growing the social enterprise–issues and challenges. *Social Enterprise Journal*, *5*(2), 114–125.

Keeney, R. L., & Raiffa, H. (1976). *Decisions with multiple objectives: Preferences and value trade-offs*. Cambridge university press.

Leborgne-Bonassié, M., Coletti, M., & Sansone, G. (2019). What do venture philanthropy organisations seek in social enterprises? *Business Strategy & Development*, *2*(4), 349–357.

Liang, F., Brunelli, M., & Rezaei, J. (2020). Consistency issues in the best worst method: Measurements and thresholds. *Omega*, *96*, 102175.

Liang, F., Brunelli, M., & Rezaei, J. (2022). Best-worst tradeoff method. *Information Sciences*, *610*, 957–976.

Mair, J., & Marti, I. (2006). Social entrepreneurship research: A source of explanation, prediction, and delight. *Journal of World Business*, *41*(1), 36–44.

Marcus, A., Malen, J., & Ellis, S. (2013). The promise and pitfalls of venture capital as an asset class for clean energy investment: Research questions for organization and natural environment scholars. *Organization and Environment*, *26*(1), 31–60. https://doi.org/10.1177/1086026612474956

Martin, M., & John, R. (2006). Venture philanthropy in Europe: Landscape and driving principles. In A. Achleitner, R. Poellath, & E. Stahl (Eds.), *Finanzierung von sozialunternehmern*, *schaeffer-poeschel* (pp. 34–43) https://ssrn.com/abstract=1322281

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. *International Small Business Journal*, *22*(3), 227–248.

McKinsey & Company. (2011). *Opportunities for the Dutch Social Enterprise sector*. McKinsey & Company Retrieved from https://www.archief.socialenterprise.nl/files/6714/4181/6376/Opportunities.pdf

Miller, T. L., & Wesley, C. L. (2010). Assessing mission and resources for social change: An organizational identity perspective on social venture capitalists' decision criteria. *Entrepreneurship Theory and Practice*, *34*(4), 705–733.

Nicholls, A. (2010). The institutionalization of social investment: The interplay of investment logics and investor rationalities. *Journal of Social Entrepreneurship*, *1*(1), 70–100.

Owen, R. (2021). Lessons from government venture capital funds to enable transition to a low-carbon economy: The UK case. *IEEE Transactions on Engineering Management*, *70*(3), 1040–1054.

PricewaterhouseCoopers. (2014). How to raise capital as a social entrepreneur? https://www.pwc.nl/nl/assets/documents/pwc-social-enterprises.pdf

Rezaei, J. (2015). Best-worst multi-criteria decision-making method. *Omega*, *53*, 49–57.

Rezaei, J. (2016). Best-worst multi-criteria decision-making method: Some properties and a linear model. *Omega*, *64*, 126–130.

Rezaei, J., Arab, A., & Mehregan, M. (2022a). Analyzing anchoring bias in attribute weight elicitation of SMART, swing, and best-worst method. *International Transactions in Operational Research*, *31*, 918–948.

Rezaei, J., Arab, A., & Mehregan, M. (2022b). Equalizing bias in eliciting attribute weights in multiattribute decision-making: Experimental research. *Journal of Behavioral Decision Making*, *35*(2), e2262.

Rowley, J. (2014). Designing and using research questionnaires. *Management Research Review*, *37*(3), 308–330.

Salimi, N., & Rezaei, J. (2018). Evaluating firms' R&D performance using best worst method. *Evaluation and Program Planning*, *66*, 147–155.

Scarlata, M., & Alemany, L. (2008). Philanthropic venture capital: Can the key elements of venture capital Be applied successfully to Social enterprises? *SSRN Electronic Journal*.

Scarlata, M., & Alemany, L. (2009). How do philanthropic venture capitalists choose their portfolio companies. *SSRN Electronic Journal*, 1–23.

Scarlata, M., & Alemany, L. (2010). Deal structuring in philanthropic venture capital investments: Financing instrument, valuation and covenants. *Journal of Business Ethics*, *95*(2), 121–145.

Scarlata, M., Gil, L. A., & Zacharakis, A. (2012). Philanthropic venture capital: Venture capital for social entrepreneurs? *Foundations and Trends in Entrepreneurship*, *8*(4), 279–342.

Shaerpa. (2022). *Venture philanthropy*. Shaping Impact Group http://www.shaerpa.org/ondersteuning/vp/

Šimić, M. (2015). Investment criteria set by venture capitalists. *Ekonomski Vjesnik/Econviews: Review of Contemporary Business*, *Entrepreneurship and Economic Issues*, *28*(2), 457–479.

Social Enterprise, N. L. (2019). Financieringsoverzicht. https://www.social-enterprise.nl/nieuws-en-evenementen/actueel/blog/financieringsoverzicht

Tyebjee, T., & Bruno, A. (1984). A model of venture capitalist investment activity. *Management Science*, *30*(9), 1051–1066.

Van Tulder, R., Van Tilburg, R., Francken, M., & Da Rosa, A. (2014). *Managing the transition to a sustainable Enterprise. Lessons from frontrunner companies* (1st ed.). Routledge.

Visagie, I. (2011). *Venture capital investment criteria, an analysis of criteria and their relative importance*. Business Mastery Project, Cass Business School, City University London.

Volery, T. (2002). Ecopreneurship: Rationale, current issues and futures challenges. http://www.kmu.unisg.ch/rencontres/band2002/band2002.html

Weerawardena, J., & Mort, G. S. (2006). Investigating social entrepreneurship: A multidimensional model. *Journal of World Business*, *41*(1), 21–35.

How to cite this article: Salimi, N., & ten Have, G. R. (2024). Aiding philanthropic venture capitalists investing in social enterprises: A multi-criteria decision-making approach. *Journal of Philanthropy and Marketing*, *29*(1), e1834. https://doi.org/10.1002/nvsm.1834

APPENDIX A: INVESTMENT CRITERIA AND SUB-CRITERIA OF PHILANTHROPIC VENTURE CAPITALISTS

Investment criterion	Sub-criterion	Description
Management team	1. Experience	The management team has relevant previous experience as entrepreneur.
	2. Personality	The personalities in the management team are characterised by authenticity to pursue dreams, strong social passion and clear vision.
	3. Educational background	The educational background of the management team in a relevant business, technical or social sector; or the educational level or prestige of the management team.
	4. Community-based social network	The management team has connections and can rely on a social network to realise change and find support for their social mission.
Potential	1. Social impact	The potential of the social enterprise expressed in the total societal impact the venture is able to realise.
	2. Financial sustainability and returns	The potential of the social enterprise expressed in the financial sustainability and economic returns the venture is able to realise.
	3. Scale	The potential of the social enterprise to scale the societal impact of the product or service of the venture to a regional, national, or even global level, reaching a significant amount of people.
External environment	1. Social market served	The specific social market or sector the social enterprise is targeting.
	2. Market size	The size of the targeted market where the product or service of the social enterprise is launched.
Organisational strategy/activity	1. Business strategy	The business strategy adopted by the social enterprise to pursue the social mission and create as much impact as possible.
	2. Revenue/funding model	The social enterprise has a credible model for funding and potential revenues.
	3. Technology	The social enterprise makes use of innovative assets and technology.
Assessment of the deal	1. Deal terms	The specific terms of the deal between the investor and the investee, related to e.g. contractual situation, degree of involvement, board seats.
	2. Fit in the portfolio	The extent to which the potential investment in the social enterprise fits within the investment policy and existing portfolio of the impact investor.