

## RESEARCH ARTICLE

# Navigating disturbances in developing countries: Resilience strategies for cross-sector partnerships

Tamara Oukes<sup>1,2</sup>  | Stefanie Beninger<sup>3</sup> | Milou Derks<sup>4</sup> | André Nijhof<sup>1,5</sup>

<sup>1</sup>Entrepreneurship, Technology, Management, University of Twente, Enschede, The Netherlands

<sup>2</sup>Business and Finance Models, TNO, The Hague

<sup>3</sup>Marketing & Supply Chain Management, Nyenrode Business Universiteit, Breukelen, The Netherlands

<sup>4</sup>Industrial Engineering and Innovation Sciences, University of Technology Eindhoven, Eindhoven, The Netherlands

<sup>5</sup>Entrepreneurship, Governance & Stewardship, Nyenrode Business Universiteit, Breukelen, The Netherlands

## Correspondence

Tamara Oukes, Anna van Buerenplein 1 2595 DA The Hague, The Netherlands.  
Email: [tamara.oukes@tno.nl](mailto:tamara.oukes@tno.nl)

## Funding information

Nederlandse Organisatie voor Wetenschappelijk Onderzoek, Grant/Award Number: 438.17.901

## Abstract

The world faces significant challenges, particularly in low-income countries, where cross-sector partnerships strive to create positive social change. Operating under severe uncertainty, these partnerships encounter various disturbances threatening their progress. Despite these challenges, our study explores the resilience strategies that these partnerships use to foster positive social change, an area previously under-explored. Our study uses a qualitative multiple-case study of four cross-sector partnerships in sub-Saharan Africa. Specifically, we collected data via interviews, workshops, and archival sources and used thematic analysis to uncover key resilience strategies. Our findings reveal a cyclical process where, when facing disturbances, cross-sector partnerships respond with resilience strategies that help them mitigate disruptions, adapt to changing conditions, and continue expanding their positive impact. In doing so, they drive positive social change through core activities within their socio-ecological system. This research expands existing theories of organizational resilience by highlighting how cross-sector partnerships in low-income contexts can not only survive, but also expand their impact of positive social change, through resilience.

## KEYWORDS

cross-sector partnerships, low-income countries, positive social change, resilience, resilience strategies

## 1 | INTRODUCTION

The world faces a growing population and challenges including the COVID-19 pandemic, war, climate change, and resource scarcity are making it more difficult to meet humanity's basic needs (United Nations, 2022). In the face of such challenges, the need for positive social change is widespread, especially in low-income countries (Dentchev et al., 2022). Positive social change (PSC) is “the process of transforming patterns of thought, behavior, social relationships, institutions, and social structure to generate beneficial outcomes for individuals, communities, organizations, society, and/or the environment

beyond the benefits for the instigators of such transformations” (Stephan et al., 2016, p. 1252).

In low-income countries, organizations seeking to create such positive social change often work in partnerships (Dembek et al., 2018; Nijhof et al., 2008). Such partnerships can include formalized partnerships with other companies, governments, communities, and non-governmental organizations (NGOs), as well as informal partnerships, such as with community associations and small-scale informal businesses. This study focuses specifically on cross-sector partnerships, defined as collaborative initiatives that involve multiple organizations from different sectors working together to achieve a

This is an open access article under the terms of the [Creative Commons Attribution](https://creativecommons.org/licenses/by/4.0/) License, which permits use, distribution and reproduction in any medium, provided the original work is properly cited.

© 2024 The Author(s). *Business Strategy and Development* published by ERP Environment and John Wiley & Sons Ltd.

common goal and address social issues (Clarke & Crane, 2018). Recent research has shown that these types of partnerships are urgently required. For example, such partnerships were necessary to help provide access to drinking water for more people in a challenging situation in Kenya, a situation rife with changeable environmental, economic, and political issues (Nijhof & van Rossum, 2023).

However, more research is needed into how cross-sector partnerships navigate the range of disturbances they face (Dentchev et al., 2022; Dentoni et al., 2021). The functioning of cross-sector partnerships in low-income countries is characterized by severe uncertainty, which makes it difficult to understand and foresee cause-and-effect relationships (Bampoh et al., 2024; Gupta et al., 2015; Sanchez & Ricart, 2010). These uncertainties—or disturbances—cause challenges to cross-sector partnerships. A better understanding of how cross-sector partnerships face their range of disturbances, that is, their resilience—or how systems can maintain (Allenby & Fink, 2005) or even improve their functioning (van der Vegt et al., 2015) when facing disturbances—can help to provide insights into how such partnerships can sustain their work while simultaneously strengthening their impact of positive social change.

While past work has studied how organizations in isolation face and overcome disturbances, how cross-sector partnerships go about it is not well studied (Henry, 2023). Such research is needed because cross-sector partnerships are unique—they are characterized by “relatively intensive, long-term interactions between organizations from at least two sectors (business, government, and/or civil society) aimed at addressing social or environmental problems” (Clarke & Crane, 2018, p. 304) where they routinely deal with a diverse set of stakeholders. Further, cross-sector partnerships in low-income countries may face additional unique disturbances coming from additional external sources, such as declining support from subsidized and short-term governmental projects or dependence on volatile participation in nongovernmental (NGO) initiatives and humanitarian aid (Moore et al., 2020). In this way, their strategies related to handling disturbances and being resilient may differ.

The first knowledge gap we want to contribute to is the ongoing exploration of the specific resilience strategies used by cross-sector partnerships. Scholars have focused on how partnerships can support, for example, the resilience of places (Ryan et al., 2023) or communities (Chen et al., 2013). However, scant research has focused on the resilience of cross-sector partnerships themselves. In the only exception, Henry (2023) researched how such partnerships were able to continue operating during the recent COVID-19 pandemic, uncovering some resilience practices that supported the survival of the partnerships. Building on this foundation, our research seeks to further illuminate the resilience mechanisms within cross-sector partnerships, offering valuable insights for the partnerships in the face of future challenges.

The second contribution of this study to scientific knowledge is to understand how the cross-sector partnerships' activities changed to grow their contribution to positive social change in the face of disturbances. The survival of a cross-sector partnership does not automatically mean that they also increase their contribution to positive

social change. While most research so far focused on the survival of partnerships, an opportunity remains to not only explore the survival of partnerships (i.e., Henry, 2023), but also study their ability to grow their contribution to positive social change in the face of challenges. Past research has connected the drive for positive social change and entrepreneurial resilience (e.g., Pascucci et al., 2021), but how the drive for increased positive social change influences the resilience of cross-sector partnerships is a second research gap where we want to contribute. In other words, while survival is crucial, understanding how cross-sector partnerships can grow their contribution to positive social change in the face of disturbances is needed.

To explore what resilience strategies are enacted by cross-sector partnerships working towards growing positive social change in low-income countries, we draw on our expansive data set from a multi-year research project. Specifically, we answer the research question: *In what way are cross-sector partnerships enacting resilience in the face of disturbances to grow positive social change?* To address this question, we focused on organizations from different sectors (business, civil society, public, and community) involved in cross-sector partnerships that strive to create positive social change within the volatile environments of Sub-Saharan Africa. We theoretically sampled and studied four cross-sector partnerships operating in Burundi, Ghana, Nigeria, Rwanda, and Uganda, as they present a relevant setting for examining disturbances and actions taken by the partnerships in response. Sub-Saharan Africa, characterized by imperfect markets, uncertain prices, untested applications of technology, and unpredictable competitive responses (Thompson & MacMillan, 2010), provided an appropriate backdrop for our research. We find that all the cross-partnerships we studied encountered a range of disturbances, such as economic instability, social disruptions, and environmental challenges. Despite these varying disturbances, our findings reveal that these partnerships consistently engage in a set of resilience strategies aimed at sustaining their operations while continuing to grow their contribution to positive social change.

## 2 | CROSS-SECTOR PARTNERSHIPS IN LOW-INCOME COUNTRIES AND RESILIENCE

### 2.1 | Cross-sector partnerships

Cross-sector partnerships are collaborative initiatives that involve multiple organizations working together to achieve a common goal (Clarke & Crane, 2018; Parmigiani & Rivera-Santos, 2011). These partnerships bring together diverse actors from different sectors: business (e.g., small and medium-sized enterprises, multinationals), public (e.g., international bodies and governmental agencies), civil society (e.g., non-governmental organizations (NGOs) and academic institutes), and community (e.g., community-based organizations and informal organizations) (Clarke & MacDonald, 2019). Cross-sector partnerships are driven by the recognition that working together can create added value, overcome challenges, and unlock opportunities that might be unattainable when operating in isolation

(López-Duarte & Vidal-Suárez, 2021; Pedersen et al., 2021; Pinkse & Kolk, 2012).

Cross-sector partnerships are especially relevant in low-income countries because organizations are often confronted with a multitude of complex and interconnected challenges such as resource constraints, including financial restrictions, limited technical capabilities, inadequate policy frameworks, and insufficient physical infrastructure (Gradl & Jenkins, 2011; Nahi, 2018). Partnerships that leverage diverse perspectives and resources may be better equipped to tackle such challenges, as partnerships enable the pooling of financial, human, and technical resources from various stakeholders (Horton et al., 2009). Specifically in situations of rising disturbances, scholars are calling for research that focuses on partnerships, including those that involve a diverse group of organizations, those that span multiple sectors, and those that are linked through trade relationships and those that are not (Azadegan & Dooley, 2021).

The function of partnerships has become a central theme in research on creating positive social and ecological change in low- and middle-income countries (Clarke & Crane, 2018). The extensive literature on cross-sector partnerships has delved into various conceptual, empirical, practical, and methodological aspects, such as the effectiveness of cross-sector partnerships (e.g. Clarke & Fuller, 2010; Dentoni et al., 2018; van Tulder et al., 2016), the motivations and drivers for cross-sector partnerships (Hartman & Dhanda, 2018), interactions with institutional context (Austin & Seitanidi, 2012), and the methodological challenges and strategies for studying collaboration (Huxham & Vangen, 2013). These aspects have been thoroughly examined through systematic reviews conducted by several researchers, such as Clarke and Crane (2018) on partnerships in the non-profit sector; Bryson et al. (2015) on the complexities involved in designing and implementing cross-sector partnerships; Austin and Seitanidi (2012) on value creation in cross-sector partnerships; and Selsky and Parker (2005) on power dynamics, trust, and accountability in cross-sector partnerships. These works have comprehensively documented the breadth and depth of research in the domain of cross-sector partnerships.

In this stream of literature, it is widely acknowledged that cross-sector partnerships could be better equipped than individual organizations to deal with disturbances in low-income countries. The disturbances faced in low-income countries are immense: Organizations and partnerships are expected to navigate changeable constraints in market information, ineffective regulatory environments, lack of proper physical infrastructure, insufficient education, knowledge and skills, resource constraints, and lack of access to proper financial services support from key stakeholders (Chaurey et al., 2012; Doherty & Kittipanya-Ngam, 2021; Gradl & Jenkins, 2011), in addition to handle a volatile global business climate due to shocks such as COVID-19, war, and natural disasters.

As resources, knowledge, and skills can be leveraged from partners (Pedersen et al., 2021; Pinkse & Kolk, 2012), cross-sector partnerships may possess a greater capacity than individual organizations to navigate these disturbances and effectively enhance their contribution to positive social change in low-income countries. However, as mentioned in the Introduction, we know little about the

resilience strategies enacted by such cross-sector partnerships themselves in the face of disturbances (Dentoni et al., 2021), especially those with the drive to grow their positive social change.

## 2.2 | Resilience

Resilience is about how systems can continue functioning, make changes, or even fundamentally transform (Allenby & Fink, 2005; Béné et al., 2014; van der Vegt et al., 2015; Wieland & Durach, 2021) when facing disturbances. The socio-ecological resilience of (sub)systems is a crucial, yet understudied topic (Dentoni et al., 2021; Henry, 2023), where cross-sector partnerships can be considered embedded “subsystems within the broader socio-ecological system” (Dentoni et al., 2021, p. 1221). As activities related to “building resilience vary depending on the level (firm, industry, social-ecological systems) at which resilience is meant to be achieved” (Kennedy & Linnenluecke, 2022, p. 2757), understanding such activities undertaken by cross-sector partnership in the face of disturbances is needed.

Resilience is called for in the face of disturbances, where disturbances can arise from economic (such as cash constrictions or changing buying power), political (such as changing laws or interference), social (such as shifting social norms or acceptance), and ecological (such as pandemics or climate disasters) aspects, or a combination thereof (Beninger & Francis, 2021). The origin of such disturbances can be endogenous or exogenous to a partnership (Bhamra et al., 2011; Dentoni et al., 2021) and can be minor or far-reaching in impact (Sutcliffe & Vogus, 2003). For example, disturbances can include small-scale equipment malfunctions (Bhamra et al., 2011) to significant societal unrest (van der Vegt et al., 2015). Low-income contexts especially face a wide range of disturbances given pressing social issues, where resilience in such contexts requires further business research (Beninger & Francis, 2022).

Strong partnerships may be important to resilient systems (Fiksel, 2003). While resilience in supply chains is an increasingly well-studied area (see Kochan & Nowicki, 2018 for a review), this line of research largely focuses on relationships between (formal) buyers and sellers. In contrast, cross-sector partnerships are distinct from supply chain partners (Dentoni et al., 2021). Such partnerships are usually heterogeneous (Henry, 2023) and not always characterized by buying-selling relationships, underscoring the need to study the resilience of cross-sector partnerships. Importantly, the various organizations that comprise a cross-sector partnership bring unique capabilities that can help deal with uncertainty (Dahan et al., 2010), where partnerships can, for example, draw upon the resources of needed (external) actors in the face of challenges (Henry, 2023). Indeed, business research has focused on how (informal or formal) relationships can support the resilience of, for example, supply chains (Azadegan & Dooley, 2021; Trunk & Birkel, 2022), markets (Beninger & Francis, 2021), and institutions (Krev, 2022).

However, little research has focused on the resilience of the partnerships themselves. The sole exception is that of Henry (2023).

When studying partnerships in developing contexts during the COVID-19 pandemic, he found that cross-sector partnerships drew on resources (including local knowledge and physical resources) in their context to form unconventional alliances, mobilize digital technologies, and build smaller subnetworks (e.g., organizing smaller training groups for farmers) to survive, but to also learn new skills, in the face of challenges. Much more needs to be done to uncover the range of strategies and activities that could be open to and useful for cross-sector partnerships in the face of disturbances.

Specifically, more research is needed to understand how cross-sector partnerships cannot only survive but also continue to impact positive social change and even grow that impact. While Dentoni et al. (2021) theorized that certain strategies of cross-sector partnerships can help bolster the ongoing functioning of wider socio-ecological systems (such as by reassessing their overall outcomes, exposing tensions and synergies between partners, and monitoring the external environment), empirical research on this topic is lacking. In sum, there is an opportunity to explore how cross-sector partnerships grow positive social impact in the face of disturbance.

Unique strategies may be needed. Resilience arguably requires “an efficient ability to create new attractive alternatives to strategies that are either innocuous or old” (Kamlot, 2017, p. 491). In this way, rather than being an abstract end goal, resilience can instead be viewed as a property of a system (Fiksel, 2003, p. 5330) in the face of disturbances. Diversity of systems is thought to be important to resilience, by, for example, diversifying networks and business sites (Kennedy & Linnenluecke, 2022), where diverse business practices may be useful to support resilient systems (Fiksel, 2003), such as that of cross-sector partnerships. At the same time, flexibility is likely also important to resilience (Allenby & Chester, 2018). Flexible resources (Parker & Ameen, 2018), product choices (Pereira & Da Silva, 2015), and relational structures may help support adaptation to external events, towards supporting resilience (Vanharanta & Wong, 2022). While flexibility has been discussed in relation to organizational resilience (Parker & Ameen, 2018) and supply chain resilience, it remains an overall under researched area (Kamalahmadi & Parast, 2016), including related to the resilience of cross-sector partnerships. In other words, how diversity and flexibility apply to the resilience of cross-sector partnerships has yet to be uncovered, especially in the volatile contexts of low-income countries.

## 3 | METHODOLOGY

### 3.1 | Research design

To understand how cross-sector partnerships enact resilience in the face of disturbances to grow positive social change, we adopt a pragmatic research approach. The pragmatic paradigm, rooted in finding practical solutions to real-world problems (Kaushik & Walsh, 2019), aligns perfectly with the investigation of the strategies employed by cross-sector partnerships in response to disturbances. Although pragmatic research has used a plurality of methods (Kaushik &

Walsh, 2019), we use a qualitative multiple-case study approach because of the exploratory nature of the research and the dearth of substantial empirical evidence (Eisenhardt, 1989). A case study involves “rich, empirical descriptions of particular instances of a phenomenon that are typically based on a variety of data sources (Yin, 1994)” (Eisenhardt & Graebner, 2007, p. 25). Additionally, it will enable us to dive deep into the dynamic interplay of factors over time, capturing the different ways these partnerships navigate disruptions and foster positive change (Miles & Huberman, 1994). Moreover, the multiple case study approach allows comparison between the cases within their natural environment and context (Yin, 2009).

### 3.2 | Research setting

We focused our study on sub-Saharan Africa because of the extreme circumstances in this region. While the poverty rate in sub-Saharan Africa has decreased from 56% in 1990 to 40% in 2018, the absolute number of people living in extreme poverty continues to rise (Derks et al., 2022; The World Bank, 2018). Disturbances are thought to have a disproportionate impact on individuals living in—and organizations operating in—conditions of poverty (George et al., 2016). As such, this is an appropriate group when studying resilience.

### 3.3 | Sample

We collected data from a purposeful sample of four cross-sector partnerships working with and for those in low-income countries in sub-Saharan Africa. When conducting case study research, we engaged in theoretical sampling, wherein the focus is on selecting cases that can illuminate the focus of our study (Eisenhardt & Graebner, 2007) and are expected to produce similar results, what Yin (2018) refers to as ‘literal replication’. In doing so, we sought cases that were similar enough to allow comparison, but distinct enough to offer a way to detect patterns in the cases towards theory building (e.g., Eisenhardt & Graebner, 2007). We intentionally involved a diversity of cases to capture a range of disturbances, seeking to explore if there were commonalities across the diverse cases, thereby allowing us to draw broader insights from the specific cases.

To select suitable cases, a list was made with 20 seemingly relevant cross-actor partnerships in sub-Saharan Africa in the authors' networks. This approach was chosen because comprehensive lists with all cross-sector partnerships per country do not exist. In addition, it provided access to cases that, due to limited online presence, were otherwise difficult to identify and reach. From this list, four cross-sector partnerships were selected following strict criteria that were willing to participate in our intensive data collection approach, namely:

1. targets the underserved in low-income countries as consumers, producers, and/or employees;
2. is trying to grow their activities to create positive social change;

3. focuses on creating economic, social, and (if applicable) ecological value;
4. collaborates formally or informally with business, civil society, and community partners.

Using more than one case study allows researchers to explore research questions in a broader way, where multiple cases also “create more robust theory because the propositions are more deeply grounded in varied empirical evidence” (Eisenhardt & Graebner, 2007, p. 27). We have used four cases, which is within Eisenhardt's (1989) suggestion to use between four and 10 cases when employing a case study approach. The sample size of four was also chosen to balance the need to gain access to rich and deep data, provided by participants who were committed to investing time and energy into ongoing interviews and workshops (see below) with the possibility for cross-case learning.

The cases operate in one or multiple sub-Saharan African countries, specifically Burundi, Ghana, Nigeria, Rwanda, and Uganda. Yet to ensure the confidentiality of the cases, direct country identification was removed, and their names were anonymized. The first cross-sector partnership ‘Talent’ provides access to high-quality solar panel installation training to young professionals based on an income-sharing agreement. It supports these professionals with job placement opportunities through matching and outsourcing activities at solar energy companies. The second cross-sector partnership ‘Pension’ offers flexible and high-quality pension products primarily to informal sector workers. The company aims to reduce old-age poverty and support people in saving for the future, eventually decreasing the existing income gap. The third cross-sector partnership ‘Fish’ focuses on establishing a fish farming supply chain involving the local population to stimulate entrepreneurship and reduce poverty. It supports the

farmers with the growing, processing, marketing, and sales of fish. The fourth cross-sector partnership ‘Insect’ creates access to affordable proteins and livelihood by setting up an inclusive cricket value chain for human consumption. The value chain includes different-sized farmers, food processors, retailers, and end-consumers. All four cases are examples of cross-sector partnerships that work with partners from multiple sectors. A detailed overview of the cases and the cross-sector partnerships is shown in Tables 1 and 2 respectively.

### 3.4 | Data collection

The case study method relies on multiple data sources, in combination with multiple research techniques, to increase both understanding and relevance (Strumińska-Kutra & Kołodkiewicz, 2018). Towards this effort, we made use of a combination of three data sources: semi-structured interviews, workshops, and archival data. The semi-structured resilience interviews, which focused on disturbances and resilience strategies, formed the core of our data collection. Other data sources (the initial interviews, workshops, and archival data) provided foundational and background information, as they did not initially concentrate on disturbances or resilience strategies. Nonetheless, these other data sources offered us a preliminary understanding of each cross-sector partnership, as well as provided initial insights into the disturbances and resilience strategies. They thus played a crucial role in preparing for the resilience interviews. A detailed overview of all collected data is provided in Table 3.

Before the resilience interviews, we started our research process with 13 semi-structured initial interviews between September 2019 and May 2021 with one or more representatives of the cross-actor partnerships. They lasted on average 45 min and were either recorded

**TABLE 1** Overview of cross-sector partnerships in the sample.

Cross-sector partnership	Talent	Pension	Fish	Insect
Start date	2020	2015	2018	2013
Starting societal challenges it was aiming to address	Improve energy access and increase employment opportunities in sub-Saharan Africa	Reduce old-age poverty in sub-Saharan Africa	Decrease malnutrition, improve the livelihood of farmers, and preserve the environment	Decrease malnutrition, improve the livelihood of farmers, and reduce the environmental footprint
Industry	Energy	Finance	Agriculture	Agriculture
Involvement of people with low income	Consumers	Consumers	Suppliers Consumers	Suppliers Consumers
Environmental impact ambition	Boost the development of the sustainable energy sector	n.a.	Preserve the environment by minimizing energy and water consumption, and organic fertilizers	Contribute to the global protein transition Owing to the warm climate huge energy savings can be realized
Social impact ambition	Provide outstanding and affordable education to youth Ensure stable and reliable energy access to improve living conditions	Reduce the income gap of the population to a minimum Provide access to savings for education, health, and retirement	Improve the livelihoods of local communities Increase the socio-economic conditions in the region	Provide access to affordable proteins and micronutrients Provide a source of livelihood for smallholder farmers



**TABLE 2** Detailed overview of partners in the cross-sector partnerships.

Cross-sector partnership	Partners	Sector	Activity	Governance
Talent	Talent Inc.	Business	Focal organization; provide training and matchmaking	Formal relationship bound by contract with the focal organization
	Solar companies	Business	Provide work opportunities to talents and mentorship	
	Talents	Community	Follow the training and are placed at solar companies	
	Mentor platform	Business	Support with platform and program development	Informal relationship with the focal organization
	University	Civil society	Support talent recruitment and curriculum development	
	NGOs	Civil society	Provide access to talents and fund projects	
	Network associations	Civil society	Share application circles and recommend the platform	
Pension	Pension Co.	Business	Focal organization; collects digital pension savings	Informal relationship with the focal organization
	Trade associations	Civil society	Engage new customers to save for pension	
	Sales agents	Business	Collects cash pension savings and educates informal workers	Formal relationship bound by contract with the focal organization
	Investor	Business	Provides funding to the focal organization	
	Telecom-companies	Business	Engage new customers to save for pension	
	Developers	Business	Develop a platform for digital pension savings	
	Fund manager	Business	Provide investment advice to secure pension savings	
	Custodian	Business	Safe keep the pension savings and premiums	
	Regulator	Public	Set and enforce regulations for the financial sector	
	Informal workers	Community	Save, digitally or in cash, for pension	
Fish	Fish Inc.	Business	Focal organization; build a fish farming supply chain	Formal consortium funded by a foreign government
	Consultant	Business	Provide fish, feed, and equipment to fish farmers	
	Government	Public	Authorization and legitimization of activities	
	Grant provider	Public	Provide financial funding for the consortium	
	Local university	Civil society	Research locally applicable fishing practices	
	Foreign university	Civil society	Provide entrepreneurial training to fish farmers	
	NGO	Civil society	Provide sensitization practices to fish farmers	
	Cooperatives	Civil society	Provide support to farmers and sell fish to off-takers	Informal relationship with the consortium
	Fish farmers	Community	Set up and maintain fish farming business activities	
Insect	Research institute	Civil society	Focal organization; orchestrate insect breeding supply chain	Formal consortium funded by a foreign government
	University	Civil society	Research locally applicable insect breeding practices	
	Grant provider	Public	Provide financial funding for the consortium	
	Foreign insect breeder	Business	Provide equipment and insects to farmers	
	Foreign insect trainer	Business	Train local insect farmers to breed insects sustainably	Informal relationship with the consortium
	Food processors	Business	Process the insects into consumable products	
	Insect farmers	Community	Set up and maintain insect farming business activities	

and transcribed or notes were taken. The interviews with Insects took place offline, and the other interviews took place using video conferencing (e.g., Teams, Zoom, or Google Meet). The detailed questionnaire for the preparation interview can be found in Appendix A.

Following the preparation interviews, we did a workshop with each cross-sector partnership to develop a scaling strategy between November 2019 and August 2021. We requested the focal organization of each cross-sector partnership to invite their key partners to

the workshop. As a result, the workshop had a representation of two to four partners from each partnership (refer to Table 3). In the online workshop, the partnerships used a five-step-to-scale method to identify suitable scaling strategies and associated business model adaptations designed and facilitated by the first and second authors (Derks et al., 2022). Next to the workshop recordings, data was collected in the following five ways: (a) results noted at the online whiteboard during the workshop, (b) group feedback sessions after each workshop,

**TABLE 3** Overview of interview, workshop, and archival data collected.

	Talent	Pension	Fish	Insect
Preparation interviews				
Number of interviews	4 interviews	5 interviews	2 interviews	2 interviews
Interviewees	CEO Talent Inc. <sup>a</sup> Advisor Talent Inc. <sup>a</sup> Program coordinator Talent Inc. <sup>b</sup> Team lead Talent Inc. <sup>b</sup> CEO Mentor platform CCO Solar company	CEO COO Business developer formal sector Business developer informal sector Data analyst from Pension Co.	CEO Fish Inc. Manager Fish Inc.	Program director research institute Associate professor university
Representative(s) of	Talent Inc. Solar company Mentor platform	Pension Co.	Fish Inc.	Research institute University
Period	May 2021	March 2021	May 2020–June 2020	September 2019
Workshop				
Number of sessions	1 session	3 sessions	4 sessions	3 sessions
Participants	CEO Talent Inc. Advisor Talent Inc. Program coordinator Talent Inc. Team lead Talent Inc. CEO Mentor platform CCO Solar company	CEO COO Communication manager Business developer formal sector Business developer informal sector Data analyst from Pension Co. Customer Care Specialist from Tele- company	CEO Fish Inc. Manager Fish Inc. Researcher local university Assistant professor university	Program director research institute Associate professor university Advisor grant provider CEO Foreign insect breeder CEO Foreign insect trainer
Representative(s) of	Talent Inc. Solar company Mentor platform	Pension Co. Telcom-company	Fish Inc. Local university Foreign university NGO	Research institute University Insect breeder Insect trainer
Period	August 2021	June 2021	November 2020–December 2020	November 2019– January 2021
Follow-up interviews				
Number of interviews	1 interview	1 interview	1 interview	1 interview
Participants	CEO Talent Inc. Advisor Talent Inc.	CEO Pension Co.	CEO Fish Inc. Manager Fish Inc.	Program director research institute
Representative(s) of	Talent Inc.	Pension Co.	Fish Inc. Foreign university	Research institute
Period	November 2022	November 2022	December 2022	November 2022
Archival data				
	Website Business case	Website	Website Grant proposal Video	Website Grant proposal Grant report Business case Master plan News articles

<sup>a</sup>Participated in interview 1.<sup>b</sup>Participated in interview 2.

(c) the online chat, (d) post-workshop questionnaire (refer to Appendix C), and (e) a results report sent to all workshop participants for validation.

During the initial interviews and workshops, we inadvertently discovered that all the partnerships encountered various disturbances on their path to increasing their contribution to positive social change.

Additionally, we noticed that the partners employed different approaches or strategies to address these disturbances. Consequently, we decided to conduct an additional round of 'resilience interviews' to explore in more detail the disturbances they faced and the methods they used to overcome them. Given that these interviews were intended to confirm and expand on our findings, we limited the number of interviews to include only the representatives most knowledgeable about these specific topics. This targeted approach allowed us to gain deeper insight while avoiding redundancy.

The four resilience interviews, which form the core of our data collection, were held in November and December 2022. Semi-structured interviews were chosen because we want to understand the complex behavior of the organizations without imposing any *a priori* categories that can narrow our research (Gudkova, 2018). The resilience interviews lasted on average 60 min and were all recorded and transcribed. They were held using video conferencing because of the travel distance between the researcher and interviewees. In the four resilience interviews, we discussed the disturbances and actions, as well as their impact, taken since the workshops had taken place. The questions asked during the follow-up interview can be found in Appendix B.

Finally, throughout the data collection period, we collected relevant archival data for each case, such as websites, business cases, grant proposals, videos, reports, master plans, and news articles. We sourced Google News, Nexis Uni, and YouTube for relevant data about each case. Our search employed the names of the cross-sector partnerships and their focal organization as search terms. Furthermore, we obtained supplementary documentation directly from the partners we interviewed.

### 3.5 | Data analysis

The data analysis was supported by a qualitative data analysis software, Atlas.ti, using thematic analysis. Thematic analysis identifies, organizes, and interprets themes in detailed qualitative textual data to highlight and convey key messages. We specifically used Template Analysis, which is a flexible form of thematic analysis that can be adapted to the requirements of the research aims and setting rather than a methodology that should be applied as a whole package, such as Interpretative Phenomenological Analysis or Grounded Theory (King et al., 2018). Following the seven steps proposed by King et al. (2018), two authors started familiarizing themselves with the data set.

Once we felt familiar with the data, we began with preliminary coding of the four resilience interviews. We started with these interviews because their retrospective nature enabled us to identify the disturbances faced by the cross-partnerships and their corresponding responses. For this, we used a set of *a priori* themes related to resilience, cross-partnerships, and their impact and growth (e.g., scaling). Although *a priori* themes are explicitly permitted in Template Analysis, it is important to note that they are also subject to revision or removal as the analysis progresses (King et al., 2018). In the next step, we clustered the codes (including the *a priori* themes) to begin to identify the

themes and possible relationships between them. This clustering resulted in the development of an initial version of our coding template. This template consisted of four themes: disturbances, resilience strategies, scaling strategies, and scaling challenges of the cross-sector partnerships.

Then we went through an iterative process coding the data from the preparatory interviews and workshops with it, noting where there are problems or limitations, and modifying the template. The final template, presented in Figure 1, included four overarching dimensions: disturbances, preserve, diversify, and replace, where the latter three each represent a distinct resilience strategy. Notably, we decided to integrate the scaling strategies and challenges into the resilience strategies and disturbances respectively because of the substantial overlap in codes representing these dimensions. Using this template, the first author and a third experienced coder did a full re-coding of all the data. In the final step, the first author, second author, and third coder used the final template and data coding to interpret the data and conduct a cross-case analysis through a process of pattern-finding and prioritization using a meta-matrix (Miles & Huberman, 1994). This process resulted in the creation of Table 4. In this table, we showcase the cross-partnerships' initial way to advance their beneficiaries, cultivate their value offering, generate income, and develop their partnership. Subsequently, we outlined the disturbances they faced and whether they preserved, diversified, or replaced their original way of doing business. By presenting the cases side by side, we facilitated comparison for better understanding.

In the Findings below, we provide representative participant quotes from each respective case study's interviews and workshops to support the themes presented in the Figures and in Table 4. Through providing "sufficient thick descriptions of the phenomenon under investigation" (p. 70) we seek to strengthen study trustworthiness (Shenton, 2004), while also providing a voice to our participants.

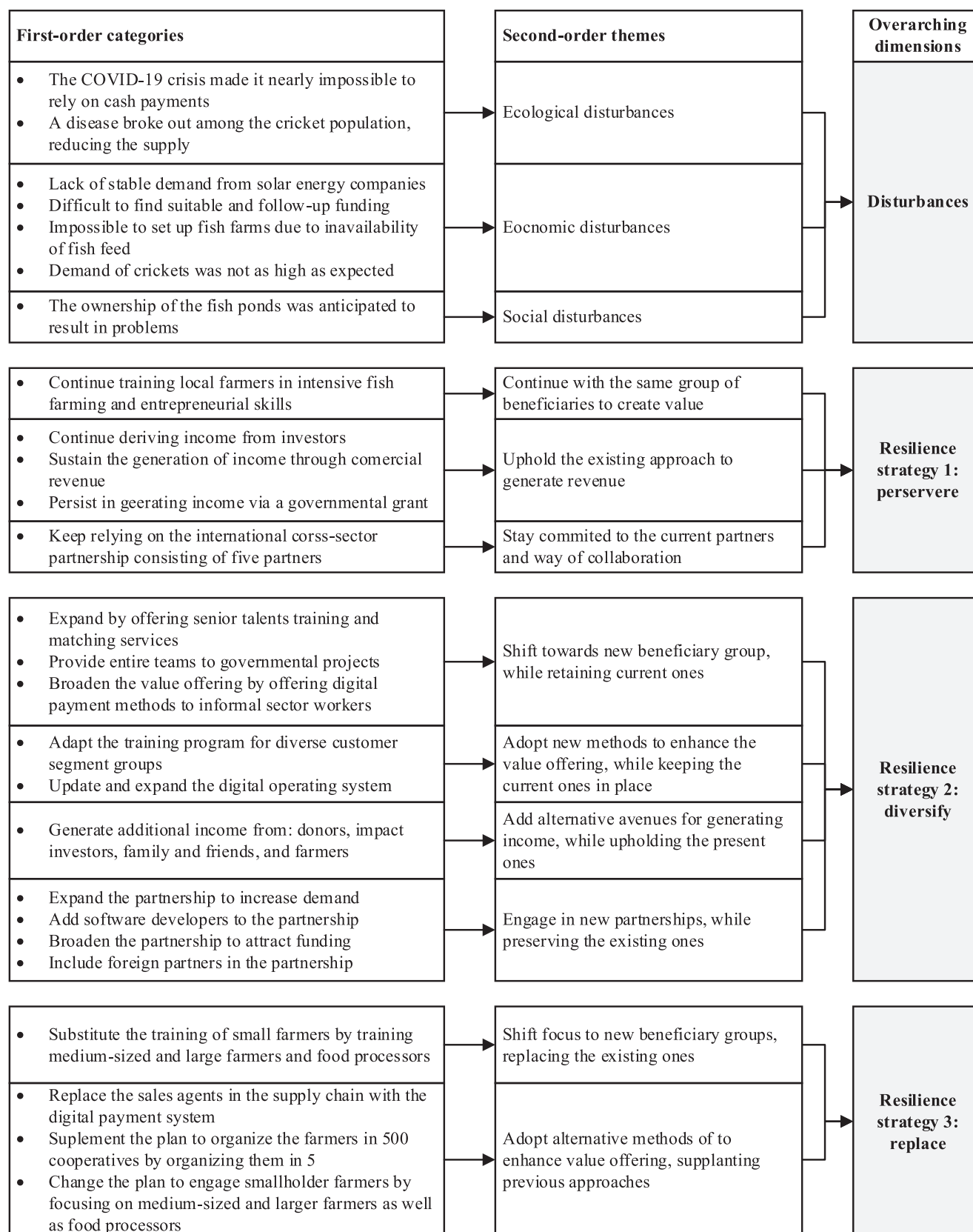
## 4 | FINDINGS

In what follows, for each case, we briefly explain the cross-sector partnership, including how it seeks to impact positive social change. We then turn to describing the disturbances that arose and how the partnership acted in response. In the face of disturbances, the cross-sector partnerships changed the way they advanced beneficiaries, adapted their offering, diversified income streams, and modified partners. An overview is also presented in Table 4.

### 4.1 | Case 1: Talent

Talent is a cross-sector partnership that provides solar installation training to young professionals and supports these talents with job placement opportunities through matching and outsourcing activities at solar energy companies. It sought to create positive social impact on the interrelated challenges of energy access and employment opportunities. Regarding the former, in their own words, access to





**FIGURE 1** Final coding template.

“power is a huge, huge hurdle in this country”, where, in the country, they “only have about 60% energy access and, even those who have access... the power is very erratic.” Further, the country faces

widespread pollution, such as “a lot of oil pollution problems in the water”, among other pollution issues, prompting interest in renewable energy. However, there are “not enough qualified technicians” to

**TABLE 4** Overview of findings on societal challenges, initial resilience strategy, disturbances, and adjusted resilience strategy per case.

	Talent	Pension	Fish	Insect
Advance beneficiaries	Raising awareness for the training program among talents	Creating awareness and teaching informal sector workers about the need to save for retirement	Training local farmers in intensive fish farming and entrepreneurial skills	Training smallholder farmers in rearing crickets
Cultivate the value offering	Training young talents in installing and maintaining solar panels and outsourcing them to solar energy companies	Offering pension products primarily to informal sector workers based on cash payments	Establishing a central fish farm and 5 fish farms with 10 fishponds organized by 500 cooperatives	Establishing a new sustainableagri-food value chain in sub-Saharan Africa of crickets
Generate income	Generating income from commercial revenue	Generating income from investors and commercial revenue	Generating income from a governmental grant	Generating income from a governmental grant
Develop partnerships	Forging partnerships with senior engineering, educational institutes, and associations	Forging partnerships with the custodian, fund manager, regulator, and sales agents	Forging an international cross-sector partnership of five organizations	Forging an international cross-sector partnership of four organizations
Disturbances	Lack of stable demand from solar energy companies for young talents It was difficult to find suitable funding for the organization	The COVID-19 crisis made it nearly impossible to rely on cash payments	The unavailability of fish feed made it impossible to set up the fish farms The ownership of the fishponds was anticipated to result in problems	The demand for crickets was not as high as initially expected A disease broke out among the cricket population, reducing the supply It was difficult to find follow-up funding for the project
Δ Advancing beneficiaries	<b>Diversify</b> by offering senior talents training and matching services; provide entire teams to governmental projects	<b>Diversify</b> by offering pension products primarily to informal sector workers based on digital payment methods	<b>Preserved</b>	<b>Replace</b> the training of small farmers with the training of medium-sized and large farmers and food processors
Δ Cultivate the value offering	<b>Diversify</b> by offering adapted training programs, suitable for senior professionals, solar energy companies, and NGOs	Initially <b>diversify</b> by updating and expanding the digital operating system Gradually <b>replace</b> the sales agents in the supply chain with the digital payment system	<b>Replace</b> the plan to organize the farmers in 500 cooperatives by organizing them in five cooperatives	<b>Replace</b> the existing cricket-rearing process so that the eggs remain separate from the crickets <b>Replace</b> the plan to engage smallholder farmers by focusing on medium-sized and large farmers and processors
Δ Generate income	<b>Diversify</b> by generating income from donors, impact investors, and family and friends	<b>Preserved</b>	<b>Preserved</b>	<b>Diversify</b> by generating income from farmers and investors
Δ Develop partnerships	<b>Diversify</b> partnerships to increase demand and attract funding	<b>Diversify</b> partnerships, including software developers and foreign partners	<b>Preserved</b>	<b>Diversify</b> partnerships to attract new funding

Note: bold words refer to the resilience strategy used for a cross-sector partnership's activity.

implement solar energy, and, simultaneously, people in the community face “limited opportunity” related to jobs, where “education and training is the key.”

Talent originally created a training program and matching services for young professionals. The training program was based on a blended learning experience, including an online learning environment,

practical exercises, and experience in the field. To participate in the training, the prospective trainees, who faced widespread poverty, were asked to pay a small amount of money (\$10). After completion of the training, Talent worked with the trainees “to get employed or get placed in a company” for 6 months to 2 years. Based on an income-sharing agreement, the trainees eventually “pay back the costs of the training over a period of time.” The partnership also earned revenue by providing specialized training services for private companies and government organizations.

To offer these services, Talent formed a cross-sector partnership. Their programs are created and taught “in collaboration with technical senior engineers across the different high-quality solar companies that exist in the country.” It also worked with “the lecturers and education institutions for them to recommend their talents,” in addition to utilizing social media networks, such as “WhatsApp groups.” Regarding the latter, it forged informal partnerships with “certain engineering groups on Facebook and WhatsApp... that [it] collaborate with closely.” For example, a female society of engineers “is a key partner that shares” in awareness raising for trainees, as are other “organizations that are associated with the STEM education and the rest.”

This cross-partner partnership was beset by disturbances. It faced a lack of stable demand for young professionals from solar energy companies, especially in the face of COVID-19. The partnership asked companies to “give us information on the number of talents that they needed... And at the time that we thought we were getting a reasonable number.” However, the “coronavirus hit really hard”, a number of these companies were “not actively operating in the market and those who were actively operating in the market had a slow start or a slow restart.” It also appeared that “a large number of companies do project management, so don't hire people or hire for a short time.” For Talent to provide talents on a project basis, it needed to plan the number of professionals needed and the location well in advance. However, “it is very hard for you to even know when your project is going to start because a lot of it depends on government funding or funding from sources that are so dependent on the economics of the country... that projects are often delayed.” Additionally, the solar installation companies were not always prepared to pay the amount Talent asked for. It has “a minimum of what we think our talent should be hired for in terms of salary. So, our focus is usually on companies that can make that,” limiting the number of available places.

Relatedly, “one of the challenges” is funding. Currently, Talent mostly uses family and friends to raise funding “to sort of stop that gap of the initial investment that goes into training the talents and then placing them later.” Although there is a lot of money “for solar technology and solar jobs, there is a lot of funding in startups as well... the issue is more what combination or what balance of investments and funding is right to keep the DNA and spirit of the company, to keep the value and goals and mission alignment, consistent with the money, capital that is coming in.” Thus, the partnership is looking for funding providers whose ambitions are aligned with what it wants to develop, and that is not an easy task.

In response to the lack of steady demand for junior professionals, the cross-sector partnership evolved to include “more senior talent,

where we had to create a new service/product line that is targeted at finding and fixing senior talent in organizations.” There was a big demand in the market for more senior professionals, who often informally work in the solar industry but without any form of official registration. To increase demand, it also forged several new partnerships. First, it built relationships with organizations that provide loans for solar installation projects. In this way, the partnership can offer, besides the talents, the funding for a solar installation project. Second, it is also “working quite closely with the Renewable Energy Association,” providing “access to the talent that the members of that association need.” Third, it partnered with an impact investment organization that, every time it invests in “a new entrant into the solar energy market and this new entrance is looking to set up a team”, typically sends those new entrants to Talent.

To handle its funding challenge, Talent sought to find alternative partners to continue their work. In this way, it is diversifying its relationships by aiming to find “government, state, organizations, international donors, that would start large projects and that would have people trained,” meaning it does not “rely only on the companies but also on funders in the public or private sphere who do large solar energy projects for example.” In addition, it actively pursues “angels, friends, and families” and “impact investment companies, some government organizations” to “get all the money that we need to really develop.”

## 4.2 | Case 2: Fish

The cross-sector partnership Fish started in 2019 to develop fish farming in sub-Saharan Africa. In doing so, Fish tackled the poor nutrition in certain communities, while “helping to improve the economic situation of its sellers or buyers” and, by extension, “improve the income of the local population,” specifically farmers and their families who “have limited access to finances.” The partnership sought to simultaneously preserve the environment, by minimizing its energy and water consumption and supporting green technologies.

The cross-sector partnership of Fish consists of five organizations that are financed by a European governmental institute: Fish Inc., a local and foreign research institute, a consultancy with expertise in fish farming, and an NGO. The partnership also informally partnered together with the local government as it seeks to engage local communities. This partnership established a fish supply chain, starting with one province but expanding to multiple provinces, in which fish farmers produce fish supported by a cooperative. The cooperatives supply the fish to local market traders, preferably women, who will sell the fish to the end consumers.

To realize this, the partners work on a project consisting of three components: the training component, “the fish farm component, and also the cooperative, community component.” First, the plan was “to train the farmers... so that we can change their mindset and make them more resilient... Then after that, we had to also train them in fish farming itself.” The partners specifically taught farmers how they can plan, invest, share the work, and reach their goals as a family. Second,



the partnerships aimed to build one central fish farm, as well as an additional 80 fish farms organized as cooperatives. The central fish farm would “be in charge of the production of the fish”, as well as supporting the cooperatives with training, technical equipment, and marketing. Third, the partnership organized the farmers into cooperatives or producer organizations. It aimed to develop 50 fish farm cooperatives with 80 fish farmers each, resulting in 4000 new fish farmers.

By 2022, the cross-sector partnership “had the central fish farm operational,” “started to produce fingerlings,” and was “able to train 4700 or almost 5000” farmers. The main disturbance it faced was the unavailability of fish feed. The fish feed had to be imported from Europe. However, due to COVID-19, securing the food was impossible, so they remained “still waiting for fish feed.” At the same time, “also due to war in Ukraine, all the prices have gone up.” The partnership had already investigated how to process fish feed locally. However, it “had to order some equipment that can process fish feed in China.” This was problematic because the engineers who needed to install the equipment were not allowed to travel due to COVID-19, meaning “there’s a lot of delays now.” The problem was clear: They could not start realizing their goals of having “the big fishponds in the communities” given that it “cannot deliver fingerlings if we do not have fish feed.” It faced “a kind of tricky situation” where the central “farm itself is there and it produces fish, but the ones on-site, for the farmers, are not yet there.”

The partnership also anticipated that their plan to organize the fish farms with one pond for 80 farmers organized in 50 cooperatives would lead to problems. Eighty farmers “do not have tasks to do in a particular fishpond,” where only five people are needed to maintain the pond. The 75 “remaining are not really working or interacting with the ponds.” Also, 10 cooperatives would share one site consisting of 10 fishponds, which also posed challenges. For example, “let’s say we have predators, they make losses and others will make profit... but they are on the same site”, “how do they feel that they really have ownership of the fishpond itself” and will they feel they have been treated fairly?

The cross-sector partnership dealt with the disturbances by “first of all trying to reset.” It “reset everything based on the new situation, like the goal... the business case itself. To see what can be done.” In response to the delays caused by the unavailability of fish feed and the right equipment, they adjusted their goals accordingly. To increase the feeling of ownership of the fishponds, the partnership “reshuffled everything.” It now plans to have five different sites on which one cooperative, including 800 farmers, maintains 10 fishponds. In this way, “they share the risk... they will have the business aspects of producing fish feed and marketing fish. But they will also have some social aspects that they will do... do some community development activities.”

### 4.3 | Case 3: Pension

Pension is a cross-sector partnership that provides pension alternatives to underserved communities. For many people, such as “the taxi

drivers, [and] the market women...there is no pension scheme.” Pension wants to avoid these people “going on retirement without having any funds on them.” Pension believes that, if people save for their retirement, this will improve all aspects of life, including the health and education of their (grand)children.

Pension “venture[d] into the informal sector pensions” industry by offering small-scale pensions to those in poverty. It offered pension schemes to employers, who then could offer and manage mandatory pensions for their employees, as well as directly to employees who want to save more. To do so, Pension is comprised of four key partners: the small-scale pension provider, the custodian bank, the fund manager, and then the regulatory authority, where the latter licenses the fund manager to offer services. Customers who sign up get access to a savings account and a retirement account. Although a digital payment system was in place, most of these savings are collected in cash periodically by Pension’s sales agents. Owing to incidents of fraud by financial institutions and lack of personal contact with existing institutions, as well as digital illiteracy, most informal sector workers “are very skeptical about the whole mobile money industry,” requiring that Pension engages in the education of their customers.

In this case, Pension needed “to convince the workers in the informal sector” those “people who have little knowledge on retirement and then pensions”, about the importance of retirement savings. It stressed to the beneficiaries that, “depending on children, on your children, depending on the family or depending on the funds that will come from a rent, will not be sufficient for you at the time of retirement.” To do so, it raised awareness through informal partnerships with “referrals” by drawing on relationships within their social networks, past customers, and with some managers of the national insurance trust.

As with any company, Pension was hugely affected by COVID-19 because “the informal sector suffered a huge blow”, where people could not go to the market to sell their products. Further, “handling physical cash had become very difficult for people” because it was uncertain (for a time) whether handling physical cash was a mode of COVID-19 transmission. It also was not possible for the sales agents to go into the field to collect savings in cash or educate people. In sum, Pension faced the challenge of “not getting many companies to register or to enroll. The reason is that the companies themselves were not doing well, so all attention went towards how to survive as a company on their own.” While Pension “empathized with them, we made them got to understand that we understand”, “COVID-19 had us sort of slow down on it because it involved a lot of physical interaction and all of that, and COVID was not friendly to that, so we slowed down a little bit.”

Although Pension did not achieve its targets in the first year of COVID-19, it took the crisis as an opportunity to “move faster to the digital way of doing things.” The organization increased its efforts to get its members to sign up to digital. Instead of conducting physical visits, the sales agents started calling people to stay in touch during the lockdown, and “introducing them to the mobile money platforms” and asking, “why don’t you continue your savings by signing up for

the digital payment option?" Many members were still willing to make payments. "Most informal sector people, who were previously very uncomfortable with doing digital, have eventually signed up during the COVID time, to be able to pay their pension." Pension had to make some major changes to its operational system to facilitate its digitization process, including working with an IT company to develop the system.

Eventually, COVID-19 helped Pension to "speed the process to moving digitally" from 85% cash collection in 2020 to 15% in 2021. This digitalization is also "very, very critical" for the organization because it moved from a "high touch to a high-tech" business. When a lot of members use the digital offering, Pension can reduce physical interaction and limit the number of sales agents. With sales agents, "you have to pay for their transportation, you have to buy calling credit for them at times, and all of that." As a result, the overhead cost decreased by 75% due to digitalization. This move also enabled Pension to explore opportunities to expand its business into other sub-Saharan African countries through collaborating with other partners, such as insurance and pension providers, rather than entering the market itself. Further, it stimulated digital recurring payments. A customer can sign up using a code and "then depending on the amount and the frequency that you choose, your money will just be transferred automatically from your wallet into your pension account." Thus, "COVID has been a form of a blessing" to the organization.

#### 4.4 | Case 4: Insect

The Insect cross-sector partnership created a new sustainable agri-food value chain in countries in sub-Saharan Africa, one focused on crickets reared for human consumption. It sought to provide a source of livelihood for local smallholder farmers. Cricket rearing is easy, where "smallholders spend just 60-90 minutes per day to take care of the crickets," where crickets "reproduce fast, it takes 12 weeks from egg to harvest." This results in an attractive "business model for farmers ... with high returns." The partnership also wanted to decrease malnutrition among the growing population: "Crickets are tasty, affordable and very nutritious... Crickets are a natural nutrition powerhouse!" Lastly, it aimed to reduce the environmental footprint of protein production, where "[c]ricket farming is an environmentally friendly alternative for conventional cattle, pig or chicken farming."

The Insect cross-sector partnership is "an international public-private partnership" that consists of four organizations: a university, an institute for applied research, a training institute on rearing crickets, and an insect breeder. It sought to set up a value chain comprised of smallholder farmers, medium-sized farmers, and large farmers, as well as food processors, retailers, and consumers, all supported by a Cricket Business Center (CBC).

A farmer would buy a starter kit that includes equipment, cricket feed, and crickets, and partake in a multi-day basic training with a refresher training after several months, and over a dozen support visits. For the purchase of the kit, a smallholder farmer receives a grant and a loan from a microfinance institute. The farmers can eat

the crickets themselves or sell them to a local food processor. The distribution is done by the trainers who take the crickets from the farmers to the food processor. The idea was that in each country the partnership would "train 10 middle-sized farmers, who will train 1000-1500 smallholder farmers."

In 2018, an entire sustainable supply chain, with the involvement of the private sector in the production of inputs and equipment, processing, packaging, distribution, and retail, was established in two sub-Saharan African countries. At the end of the consortium's pilot project in these two countries, however, "the project has had quite a few setbacks." Despite that "700 smallholder farmers were trained", only 120 smallholder farmers were rearing crickets. An important reason was that a bacterial infection broke out among the crickets, where "most small growers [had to] wipe out their entire cultivation." Some farmers started again, but many did not. Also, the "market side was not well organized, so the cricket products as food for end consumers. They have not yet been accepted," where the demand for cricket products was not as expected. As a result, the food processors did not have enough supply or demand to continue or repay their investors. In turn, the smallholder farmers could not pay off their microcredit to the Micro Finance Institute (MFI). Consequently, "nobody could pay anybody anymore and nobody believed in the project anymore." As a result, it was "difficult to find funding for follow-up projects" for several years. Investors perceived there was insufficient track record because the new production process is still a concept, and the "star case" basically failed. Also, the initial funding provider wrote a report in which the diseases were a very prominent subject, which resulted in negative publicity and continued "to haunt" them.

To prevent the disease from happening in the future, the partnership learned that "it is important that not all the stages (e.g., egg, larva, cricket) are performed by the same farmer." Also, it is wise to rear the eggs at a great distance from the crickets. In that way, the chance of a disease is minimized, and the eggs are kept as clean as possible. Further, it learned that such endeavors "need sufficient financial resources to get something off the ground ... And you see that those small farmers do not have enough capital to properly set up a value chain." Moreover, "they should have had a stronger [local] person in every country who really wants to make this happen, an 'innovation champion'. This was really missing." Therefore, the partnership chose to focus on larger scale local farmers and processors with the entrepreneurial spirit to invest in cricket rearing and start with market development. Thus, the partnership had to "put many more entrepreneurs in the lead, so they have to develop that market" while focusing on creating "the entire surrounding ecosystem in such a way that these entrepreneurs have a better chance of success." It is now working to expand their offering "by bringing parties together and getting mutual learning done," as well as training larger scale farmers to support them.

To attract follow-up funding for its initiative, the partnership now funds its initiative by making sure that larger-scale farmers invest themselves in the necessary equipment, complemented with an investment from an investor. To provide the needed training, the partnership also searched for new sources of funding and applied for



grants of which “some were granted, others were not.” To be able to do so, the partnership convinced the initial funding provider, who had written the negative report, to add a correction about the project results. However, this “does not take it away completely, that is actually continuing locally and showing new results.” Over the years, the partnership could show that the disease never broke out again, the supply chain is evolving, there is “access to cricket products that people actually want to buy”, and farmers have made a livelihood out of cricket farming. To do so, it focused originally on just one country, “just do it very well and then you have a start case that you can use in other countries as well... prove them wrong.”

#### 4.5 | Three resilience strategies of cross-sector partnerships

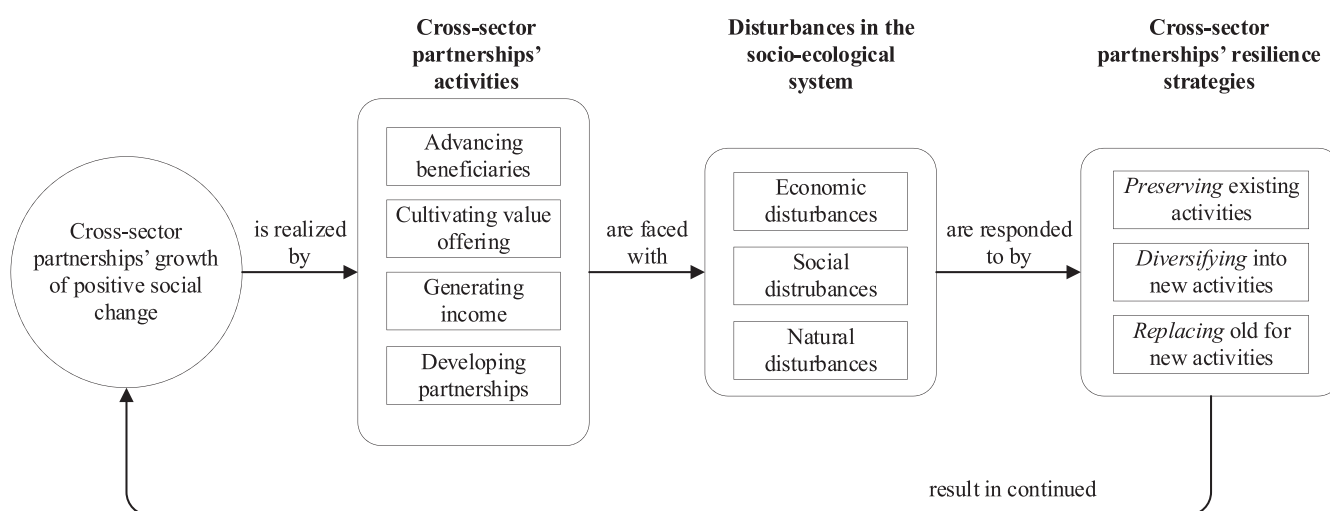
Figure 2 illustrates the dynamic process through which the cross-sector partnerships navigate disturbances within the socio-ecological system, implement resilience strategies, and, simultaneously, grow their impact and contribute to positive social change. The process begins with their goals to realize positive social change, driven by a series of core activities undertaken by the partnerships. As they carry out these activities, the partnerships inevitably face various disturbances within the socio-ecological system. In response, they employ resilience strategies aimed at not only maintaining, but also enhancing their operations. By adopting these strategies, the partnerships can mitigate the effects of disturbances, adapt to evolving conditions, and persist in their efforts to generate positive social change. We will now delve into each facet of this process in greater detail.

The partnerships all sought to enact positive social change, including rectifying the lack of access to food, energy, and income sources. As they worked to not only continue to exist, but also grow their positive societal impact, all these partnerships faced several disturbances, requiring their resilience. These disturbances were often interrelated and multifaceted, where, for example, COVID-19

dramatically impacted economic realities and shifted customer buying and saving patterns, and disease (such as that experienced with the crickets) led to constricting supply. In the face of such disturbances, the partnerships enacted three resilience strategies to continue to bring about positive change: *preserving*, *diversifying*, and *replacing*. Our findings suggest that partnerships sought to weather their disturbances by employing these strategies with an iterative process of four key activities, namely advancing beneficiaries, adapting products and services, generating additional income, and modifying partnerships. A detailed exploration of these activities for each strategy follows.

The first approach is when the cross-partnerships are engaged in *preserving* what they are currently doing, not adapting, or replacing its beneficiaries, products and services, income sources, or partners. This strategy empowers them to continue and sometimes even grow their contribution to positive social change by maintaining their current activities in the face of disturbances. In response to the COVID-19 crisis, for example, Fish decided to maintain its existing way of obtaining fish feed, making only minor adjustments to its targets. Moreover, they refrained from seeking out new partners or exploring alternative sources of income beyond the governmental grant they were already receiving. Similarly, Pension adhered to its established method of generating income, replying to a combination of investments and commercial revenue throughout the COVID-19 crisis. Thus, *persevering* means that cross-sector partnerships remain committed to their current activities, either because they believe it will help them grow regardless of the disruptions (as in the case of Pension) or because they perceive limited alternative options (as in the case of Fish).

*Diversifying*, the second and most widely adopted approach, refers to a cross-sector partnership that adds new groups of beneficiaries, products and services, income sources, and/or new partnerships alongside existing ones. This strategy allows them to increase their contribution to positive social change during a disturbance, with new initiatives co-existing alongside the original activities. This approach is exemplified by Energy which offers various training programs to new customer groups (e.g., senior professionals, NGOs, and governmental



**FIGURE 2** The way partnerships adjust their resilience strategy in the face of disturbances.



programs), next to the original training program developed for young professionals, in the face of the disturbance of declining demand for young professionals. It also included a loan provider, impact investor, and energy association in their partnership as well as (non-) governmental donors. Generating additional income was also needed when disturbances hit. For example, Insect sought to raise funding from large farmers and investors when governmental grants were difficult to get. In essence, *diversifying* entails that cross-sector partnerships incorporate supplementary activities alongside their existing ones when they recognize that their current endeavors may not suffice to grow their operations and achieve their desired positive social impact.

*Replacing* is where the cross-sector partnership focuses on entirely different customers, products and services, income sources, and/or partners than it did before. This strategic shift allows them to continue their desired contribution to positive social change by replacing less effective activities with more suitable ones. At times, disturbances required partners to reconfigure the way they delivered their offering, as demonstrated by Fish, which changed the way it organizes the fish farmers in cooperatives to increase ownership. Additionally, Pension set up a partnership with a software developer, but at the same time ceased relationships with many of its sales agents. Further, Insect completely changed the way the cricket-rearing process was performed and refocused on medium-sized to large farmers rather than smallholder farmers after the cricket disease broke out. In summary, *replacing* involves substituting existing activities with new ones when the partnerships perceive the old activities as ineffective in their mission to advance positive social change.

Except for Talent, the cases under study employed multiple resilience strategies concurrently to keep scaling social impact in the face of disturbances. While Fish primarily focused on *preserving* most of its activities, such as its approach to benefiting customers, income generation, and partnerships, it also engaged in *replacing* its value offering by reducing the number of cooperatives from 500 to five. In the case of Insect, a combination of *replacing*, wherein they tailored a new value offering for different beneficiary groups, and *diversifying*, which entailed creating additional income streams and cultivating new partnerships, was employed. Pension, which already had a digital payment system in place, sped up the digitization process quickly when COVID-19 hit. It expected that it would eventually replace its cash payments entirely. Notably, the percentage of cash payments has decreased substantially, dropping from 85 percent before COVID-19 to 15 percent in 2021 and further declining to 5% in 2022. In conclusion, cross-sector partnerships often utilize a blend of the three resilience strategies simultaneously to effectively address disruptions.

Further, this study makes a scientific contribution by identifying four key activities used to leverage the resilience strategies. Taken together, they allow cross-sector partnerships to positively impact the socio-ecological systems they are embedded in, making judicious decisions around whether to *preserve*, *diversify*, or *replace* the four key activities related to beneficiaries, products and services, additional income, and partnerships. This process is inherently cyclical: the successful implementation of resilience strategies not only fosters continued growth in positive social change but also enhances the

partnerships' ability to engage in their core activities, navigate new disturbances, and apply resilience strategies as needed. In essence, these resilient strategies enable these partnerships to endure but also to continue fostering positive social change.

## 5 | DISCUSSION

Our research began with the question: *In what way are cross-sector partnerships enacting resilience in the face of disturbances to grow positive social change?* Our findings revealed that the cross-sector partnerships were driven by a desire to increase their contribution to positive social change. However, due to the challenging circumstances, the partnerships inevitably encounter various forms of disturbances, including economic, social, and natural disruptions. In response to these challenges, partnerships employ different strategies to change their activities, that is *diversify* or *replace*, while some opt to *preserve* their existing approaches. To do so, they engaged in four specific activities: advancing beneficiaries, cultivating products and services, generating income, and developing partnerships.

While resilience has received widespread – and increasing – attention, there exists a noticeable research gap when it comes to its exploration in cross-sector partnerships. Although Henry (2023) started to explore this topic, there remained a pressing need to further investigate how cross-sector partnerships actively enact resilience when confronted with disturbances. We thus built on previous theorizing related to strategies of cross-sector partnerships, such as understanding the external world and managing tensions, that could contribute to socio-ecological resilience (Dentoni et al., 2021).

Resilience is how systems can maintain (Allenby & Fink, 2005) or improve (van der Vegt et al., 2015), which can involve the capacity to “persist, adapt, or transform in the face of change” (Wieland & Durach, 2021, p. 316). We add nuance to this theorizing by finding that disturbances resulted in *preserving*, *diversifying*, or *replacing*. In this way, our findings suggest that adapting, in the form of making incremental changes, can involve either *diversifying* or *replacing*. Therefore, we submit that, building on Wieland and Durach (2021), perhaps it would be more accurate and nuanced to describe this as *preserving*, *diversify*, *replace*, or *transform* in the face of disturbances. Echoing Beninger and Francis (2021), and following Dentoni et al. (2021), we also argue for the use of ‘disturbances’ in place of ‘change’ given its more specific nature.

We provide empirical weight to the contention that diversity can support resilience (Kennedy & Linnenluecke, 2022). Our findings suggest that partnerships often simultaneously employ the three strategies (*preserving*, *diversifying*, *replacing*) in the face of a disturbance, where diversity of such approaches may help businesses survive, where, for example, some partnerships chose to replace aspects while preserving other aspects. While having diverse business strategies was theorized to be able to help resilience (Fiksel, 2003), and our data reveals three specific resilience strategies in this regard, our findings also suggest that there may be some combinations of resilience strategies that are more effective in not only helping a cross-sector



partnership to continue to survive, but also to grow their contribution to positive social change. We therefore emphasize the need for more research on the combination of resilience strategies for impactful scaling of cross-sector partnerships in low-income countries.

Additionally, we identified four key activities involved in the resilience strategies relevant to partnerships, involving their beneficiaries, products and services, income, and partnerships. Like Henry (2023), we found that, to support their resilience, partnerships can seek to mobilize digital technologies. However, we found that beyond just utilizing digital technologies, partnerships can engage in a range of changes to their products and services even beyond the digital realm. While partnerships can remain the same or shift in the face of crises (Krlav, 2022), such as by forging alliances (Henry, 2023), we found that partnerships may also be diversified or terminated. We also uncovered the novel findings that the partnership changed its approach towards (other) beneficiaries and sought to generate additional income from alternative sources. These four activities also provided flexibility in responses available to the partnership in the face of disturbances. Flexibility was surmised to be important resilience (e.g., Pereira & Da Silva, 2015; Vanharanta & Wong, 2022), and our findings provide empirical evidence that cross-sector partnerships draw on a range of flexible activities is the case for the resilience of cross-sector partnerships. Importantly, cross-sector partnerships could perhaps interject more flexibility than other subsystems (e.g., organizations and supply chains) given the range of options open to them.

Together with Henry (2023), we also provide the first findings into how partnerships can survive. While focusing on the survival of a partnership is important, differing from Henry (2023), we find that partnerships can also engage in resilience strategies that help them expand their impact on positive social change. Such efforts are especially needed in low-income countries, where wider socio-ecological systems desperately need the offerings provided by these embedded cross-sector partnerships. In this way, it behooves us to appreciate resilience as not only about surviving in times of disturbances, but also growing. Various scholars (e.g., Azadegan & Dooley, 2021; Dentchev et al., 2022) have emphasized the importance of investigating how cross-sector partnerships can sustain and enhance their positive social impact even in the face of disruptions, and our research offers empirical insights into how cross-sector partnerships can do so.

To conclude, these findings make two major contributions to scientific knowledge. First, we contribute to the understanding of resilience theory related to the largely overlooked area of cross-sector partnerships. We found three resilience strategies applied by cross-sector partnerships: preserving, diversifying, and replacing. However, we also found that in the face of disturbances there may be some combinations of resilience strategies that are more effective in not only the survival of a cross-sector partnership but also to grow their contribution to positive social change. Second, we empirically support Dentchev et al.'s (2022) suggestion to consider how cross-sector partnerships contribute to positive social change by navigating the range of disturbances they are confronted with, by naming four specific activities they undertake to do so, namely advancing beneficiaries,

adapting products and services, generating additional income, and modifying partnerships. Taken together, we enrich knowledge at the nexus of resilience, cross-sector partnerships, and positive social change while making several practical contributions relevant for cross-sector partnerships.

## 5.1 | Contribution to practice

From a practical perspective, while cross-sector partnerships can start by clearly defining what positive social change they want to make, they should recognize that an array of disturbances are inevitable. When confronted with such disturbances, they should carefully evaluate whether it is more appropriate to *preserve*, *diversify*, or *replace* existing beneficiaries, products and services, income streams, and partnerships. Cross-sector partnerships need to carefully consider the alternatives in front of them, whereas Figure 2 could be quite useful as an organization device for discussions within the cross-sector partnership.

However, caution must be noted for partnerships when taking this above advice. Importantly, our study focused on cross-sector partnerships that were reacting to disturbances. While the three strategies we uncovered can be appropriate in the face of disturbances, we posit that cross-sector partnerships likely also need to seek to assess what future disturbances could look like and make appropriate changes in advance. Literature on supply chain resilience stresses the need to seek to anticipate when disturbances may occur (Kamalahmadi & Parast, 2016) to prepare for what is coming, and cross-sector partnerships can likely employ such tactics. Given that diversity is important for resilience, and that cross-sector partnerships are, by definition, diverse (with different experiences, viewpoints, and resources), partnerships may be well placed to seek to anticipate and prepare for disturbances.

## 5.2 | Future research and limitations

A limitation of this research is that it included only four cases. Four cases are the lower end of Eisenhardt's (1989) recommended number of cases to include in such a study. Future research can study additional cases, especially homogeneous cases as our study focused on four heterogeneous cases, to see which of these strategies were most useful in supporting ongoing resilience and growing positive social change and whether other different strategies are used in reaction to varying disturbances, as well as associated outcomes. The studied cases were from contexts beset by a high number of disturbances. While a useful setting to understand resilience, research could also be undertaken in more stable situations, such as understanding pressing disturbances facing partnerships and other sub-systems in a variety of contexts. Further, as partnerships strive to weather the disturbances they face, there are undoubtedly moments of trade-offs. Future research can explore under which conditions trade-offs are present and the consequences.

Our research focuses on the cross-sector partnerships themselves, an important subsystem of wider socio-ecological systems. We found indications that there was a positive impact on these wider systems, as relayed by these partnerships. However, we did not collect systematic data on the wider system itself, such as on the impact on the natural environment. Future research could conduct such research on wider systems, to understand the impact on the wider systems as cross-sector partnerships seek to not only survive, but also grow their social impact. The interlinked nature of resilience needs further exploring (Beninger & Francis, 2022; McKnight & Linnenluecke, 2016; Vanharanta & Wong, 2022), where future work needs to understand how the resilience of diverse subsystems, including organizations, partnerships, and communities, is interconnected.

Owing to the COVID-19 crisis, the collection of data for the cross-partnerships predominately relied on online methods. Consequently, direct face-to-face interactions with partnership representatives were limited, potentially leading to the oversight of crucial nuances and unspoken insights during the interviews and workshops. The study could have been enriched by observations that in-person approaches would have afforded. However, the virtual nature of our research also allowed the engagement of numerous partners in our data collection, especially in the workshops. This situation would have been challenging to achieve in offline settings because of the substantial geographical distances between the partners. Therefore, we advocate for a hybrid approach, wherein scholars combine online and offline data collection methods to comprehensively investigate how cross-sector partnerships in low-income countries demonstrate resilience in the face of disruptions.

Finally, the four studied partnerships fought to survive while still creating (growing) positive social impact, where their actions, in effect, seek to ultimately decrease disturbances (e.g., tackling poverty and its associated ills) in the wider system in the future. We echo the calls of other researchers to further explore how the resilience of one subsystem (e.g., partnerships) impacts the resilience of other systems (e.g., natural environment, communities, organizations, departments, and even individuals), taking a multilevel and longitudinal approach (Beninger & Francis, 2022; Kennedy & Linnenluecke, 2022; Linnenluecke, 2017; Vanharanta & Wong, 2022). Longitudinal studies are particularly crucial as they allow us to observe how resilience develops, evolves, and impacts various systems over extended periods, providing insights that shorter-term studies cannot capture. Therefore, further research is urgently needed to explore this multi-level nature of resilience across longer time frames, offering a more comprehensive understanding of its dynamics and effects.

## ACKNOWLEDGMENTS

This research was funded by NWO (grant number 438.17.901).

## ORCID

Tamara Oukes  <https://orcid.org/0000-0002-4273-1966>

## REFERENCES

Allenby, B., & Chester, M. (2018). Reconceptualizing infrastructure in the Anthropocene. *Issues in Science and Technology*, 34(3), 58–63.

- Allenby, B., & Fink, J. (2005). Toward inherently secure and resilient societies. *Science*, 309(5737), 1034–1036.
- Austin, J. E., & Seitanidi, M. M. (2012). Collaborative value creation: A review of partnering between nonprofits and businesses: Part I: Value creation spectrum and collaboration stages. *Nonprofit and Voluntary Sector Quarterly*, 41(5), 726–758.
- Azadegan, A., & Dooley, K. (2021). A typology of supply network resilience strategies: Complex collaborations in a complex world. *Journal of Supply Chain Management*, 57(1), 17–26.
- Bampoh, D., Sdzunik, J., Sinfield, J., McDavid, L., & Burgess, W. (2024). Investigating the robustness and relevance of an evidence-based sense-making construct to bridge the research-practice gap in cross-sector partnerships. *Business Strategy & Development*, 7, 301.
- Béné, C., Newsham, A., Davies, M., Ulrichs, M., & Godfrey-Wood, R. (2014). Resilience, poverty and development. *Journal of International Development*, 26(5), 598–623.
- Beninger, S., & Francis, J. N. (2021). Collective market shaping by competitors and its contribution to market resilience. *Journal of Business Research*, 122, 293–303.
- Beninger, S., & Francis, J. N. (2022). Resources for business resilience in a COVID-19 world: A community-centric approach. *Business Horizons*, 65(2), 227–238.
- Bhamra, R., Dani, S., & Burnard, K. (2011). Resilience: The concept, a literature review and future directions. *International Journal of Production Research*, 49(18), 5375–5393.
- Bryson, J. M., Crosby, B. C., & Stone, M. M. (2015). Designing and implementing cross-sector collaborations: Needed and challenging. *Public Administration Review*, 75(5), 647–663.
- Chaurey, A., Krithika, P. R., Palit, D., Rakesh, S., & Sovacool, B. K. (2012). New partnerships and business models for facilitating energy access. *Energy Policy*, 47(Suppl 1), 48–55.
- Chen, J., Chen, T. H. Y., Vertinsky, I., Yumagulova, L., & Park, C. (2013). Public-private partnerships for the development of disaster resilient communities. *Journal of Contingencies & Crisis Management*, 21, 130–143.
- Clarke, A., & Crane, A. (2018). Cross-sector partnerships for systemic change: Systematized literature review and agenda for further research. *Journal of Business Ethics*, 150(2), 303–313.
- Clarke, A., & Fuller, M. (2010). Collaborative strategic management: Strategy formulation and implementation by multi-organizational cross-sector social partnerships. *Journal of Business Ethics*, 94, 85–101.
- Clarke, A., & MacDonald, A. (2019). Outcomes to Partners in Multi-Stakeholder Cross-Sector Partnerships: A resource-based view. *Business and Society*, 58(2), 298–332.
- Dahan, N. M., Doh, J. P., Oetzel, J., & Yaziji, M. (2010). Corporate-NGO collaboration: Co-creating new business models for developing markets. *Long Range Planning*, 43(2–3), 326–342.
- Dembek, K., York, J., & Singh, P. (2018). Creating value for multiple stakeholders: Sustainable business models at the base of the pyramid. *Journal of Cleaner Production*, 196, 1600–1612.
- Dentchev, N. A., Michelini, L., Verbeke, A., Hall, J., & Hillemann, J. (2022). New perspectives on base of the pyramid strategies. *Business & Society*, 61(8), 1977–1991.
- Dentoni, D., Bitzer, V., & Schouten, G. (2018). Harnessing wicked problems in multi-stakeholder partnerships. *Journal of Business Ethics*, 150(2), 333–356.
- Dentoni, D., Pinkse, J., & Lubberink, R. (2021). Linking sustainable business models to socio-ecological resilience through cross-sector partnerships: A complex adaptive systems view. *Business & Society*, 60(5), 1216–1252.
- Derks, M., Oukes, T., & Romijn, H. (2022). Scaling inclusive business impacts at the base of the pyramid: A framework inspired by business model ecosystems research. *Journal of Cleaner Production*, 366, 132875.



- Doherty, B., & Kittipanya-Ngam, P. (2021). The role of social enterprise hybrid business models in inclusive value chain development. *Sustainability*, 13(2), 1–24.
- Eisenhardt, K. M. (1989). Building theories from case study research. *Academy of Management Review*, 14(4), 532–550.
- Eisenhardt, K. M., & Graebner, M. E. (2007). Theory building from cases: Opportunities and challenges. *Academy of Management Journal*, 50(1), 25–32.
- Fiksel, J. (2003). Designing resilient, sustainable systems. *Environmental Science & Technology*, 37(23), 5330–5339.
- George, G., Kotha, R., Parikh, P., Alnuaimi, T., & Bahaj, A. S. (2016). Social structure, reasonable gain, and entrepreneurship in Africa. *Strategic Management Journal*, 37(6), 1118–1131.
- Gradl, C., & Jenkins, B. (2011). *Tackling barriers to scale: From inclusive business models to inclusive business ecosystems*. The CSR Initiative at the Harvard Kennedy School.
- Gudkova. (2018). Interviewing in qualitative research. In *Qualitative methodologies in organization studies* (pp. 75–96). Palgrave Macmillan.
- Gupta, S., Beninger, S., & Ganesh, J. (2015). A hybrid approach to innovation by social enterprises: Lessons from Africa. *Social Enterprise Journal*, 11, 89–112.
- Hartman, L., & Dhanda, K. (2018). Cross-sector partnerships: An examination of success factors. *Business and Society Review*, 123, 181–214.
- Henry, L. A. (2023). Navigating disruptive times: How cross-sector partnerships in a development context built resilience during the covid-19 pandemic outbreak. *Business & Society*, 63(4), 745–773.
- Horton Douglas & Prain Gordon & Thiele Graham. (2009). *Perspectives on partnership: A literature review*. International Potato Center (CIP).
- Huxham, C., & Vangen, S. (2013). *Managing to collaborate: The theory and practice of collaborative advantage*. Routledge.
- Kamalahmadi, M., & Parast, M. M. (2016). A review of the literature on the principles of enterprise and supply chain resilience: Major findings and directions for future research. *International Journal of Production Economics*, 171, 116–133.
- Kamlot, D. (2017). Organizational resilience and social marketing: An assessment of foundations and affinities. *Cadernos EBAPE*, 15, 482–495.
- Kaushik, V., & Walsh, C. A. (2019). Pragmatism as a research paradigm and its implications for social work research. *Social Sciences*, 8(9), 255.
- Kennedy, S., & Linnenluecke, M. K. (2022). Circular economy and resilience: A research agenda. *Business Strategy and the Environment*, 31(6), 2754–2765.
- King, N., Brooks, J., & Tabari, S. (2018). Template analysis in business and management research. In *Qualitative methodologies in organization studies* (pp. 179–206). Palgrave Macmillan.
- Kochan, C. G., & Nowicki, D. R. (2018). Supply chain resilience: A systematic literature review and typological framework. *International Journal of Physical Distribution and Logistics Management*, 48(8), 842–865.
- Krlev, G. (2022). Let's join forces: Institutional resilience and multistakeholder partnerships in crises. *Journal of Business Ethics*, 186(3), 571–592.
- Linnenluecke, M. K. (2017). Resilience in business and management research: A review of influential publications and a research agenda. *International Journal of Management Reviews*, 19(1), 4–30.
- López-Duarte, C., & Vidal-Suárez, M. M. (2021). Exploring the nexus between business activity and development aid in favor of the development agenda. *Business Strategy & Development*, 4(4), 499–514.
- McKnight, B., & Linnenluecke, M. K. (2016). How firm responses to natural disasters strengthen community resilience: A stakeholder-based perspective. *Organization & Environment*, 29(3), 290–307.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook*. SAGE Publications Inc.
- Moore, E. M., Dau, L. A., & Doh, J. (2020). Does monetary aid catalyse new business creation? Analysing the impact of global aid flows on formal and informal entrepreneurship. *Journal of Management Studies*, 57(3), 438–469.
- Nahi, T. (2018). Co-creation for sustainable development: The bounds of NGO contributions to inclusive business. *Business Strategy & Development*, 1(2), 88–102.
- Nijhof, A. H. J., de Bruijn, T., & Honders, H. (2008). Partnership for corporate social responsibility: A review of concepts and strategic options. *Management Decision*, 46(1), 152–167.
- Nijhof, A. H. J., & van Rossum, S. (2023). *Position Paper: Actieplan voor de transitie naar een duurzame watersector* (pp. 1–36). Nyenrode Business Universiteit.
- Parker, H., & Ameen, K. (2018). The role of resilience capabilities in shaping how firms respond to disruptions. *Journal of Business Research*, 88, 535–541.
- Parmigiani, A., & Rivera-Santos, M. (2011). Clearing a path through the Forest: A meta-review of Interorganizational relationships. *Journal of Management*, 37(4), 1108–1136.
- Pascucci, T., Hernández-Sánchez, B. R., & Sánchez-García, J. C. (2021). Cooperation and environmental responsibility as positive factors for entrepreneurial resilience. *Sustainability*, 14(1), 424.
- Pedersen, E. R. G., Lüdeke-Freund, F., Henriques, I., & Seitanidi, M. M. (2021). Toward collaborative cross-sector business models for sustainability. *Business and Society*, 60(5), 1039–1058.
- Pereira, C. R., & Da Silva, A. L. (2015). Key organisational factors to building supply chain resilience: A multiple case study of buyers and suppliers. *Journal of Operations and Supply Chain Management*, 8(2), 77–95.
- Pinkse, J., & Kolk, A. (2012). Addressing the climate change-sustainable development nexus: The role of multistakeholder partnerships. *Business and Society*, 51(1), 176–210.
- Ryan, A., Geiger, S., Haugh, H., Branzei, O., Gray, B. L., Lawrence, T. B., & McKeever, E. (2023). Emplaced partnerships and the ethics of care, recognition and resilience. *Journal of Business Ethics*, 184(4), 757–772.
- Sanchez, P., & Ricart, J. E. (2010). Business model innovation and sources of value creation in low-income markets. *European Management Review*, 7, 138–154.
- Selsky, J. W., & Parker, B. (2005). Cross-sector partnerships to address social issues: Challenges to theory and practice. *Journal of Management*, 31(6), 849–873.
- Shenton, A. K. (2004). Strategies for ensuring trustworthiness in qualitative research projects. *Education for Information*, 22(2), 63–75.
- Stephan, U., Patterson, M., Kelly, C., & Mair, J. (2016). Organizations driving positive social change: A review and an integrative framework of change processes. *Journal of Management*, 42(5), 1250–1281.
- Strumińska-Kutra & Koładkiewicz. (2018). Case study. In *Qualitative methodologies in organization studies* (pp. 1–31). Palgrave Macmillan.
- Sutcliffe, K. M., & Vogus, T. M. (2003). Organizing for resilience. In J. E. Dutton & M. A. Glynn (Eds.), *Positive organizational scholarship* (pp. 94–104). Berrett-Koehler.
- The World Bank. (2018). People lived below the poverty line in 2018. <https://pip.worldbank.org/home>
- Thompson, J. D., & Macmillan, I. C. (2010). Business models: Creating new markets and societal wealth. *Long Range Planning*, 43, 291–307.
- Trunk, A., & Birkel, H. (2022). No resilience without partners: A case study on German small and medium-sized enterprises in the context of COVID-19. *Schmalenbach Journal of Business Research*, 74(4), 537–574.
- United Nations. (2022). Goal 1: End poverty in all its forms everywhere. United Nations. <https://www.un.org/sustainabledevelopment/poverty>
- van der Vegt, G. S., Essens, P., Wahlström, M., & George, G. (2015). From the editors: Managing risk and resilience. *Academy of Management Journal*, 58(4), 971–980.
- van Tulder, R., Seitanidi, M. M., Crane, A., & Brammer, S. (2016). Enhancing the impact of cross-sector partnerships: Four impact loops for channeling partnership studies. *Journal of Business Ethics*, 135, 1–17.



- Vanharanta, M., & Wong, P. (2022). Critical realist multilevel research in business marketing: A laminated conceptualization of resilience. *Journal of Business & Industrial Marketing*, 37(10), 2010–2021.
- Wieland, A., & Durach, C. F. (2021). Two perspectives on supply chain resilience. *Journal of Business Logistics*, 42(3), 315–322.
- Yin, R. K. (2009). *Case study research: Design and methods* (Vol. 5). SAGE Publications Inc.
- Yin, R. K. (2018). *Case study research and applications: Design and methods* (6th ed.). SAGE Publications Inc.
- Yin, R. K. (1994). *Case study research: Design and methods* (Vol. 2.). Sage Publications Inc.

**How to cite this article:** Oukes, T., Beninger, S., Derks, M., & Nijhof, A. (2024). Navigating disturbances in developing countries: Resilience strategies for cross-sector partnerships. *Business Strategy & Development*, 7(4), e70020. <https://doi.org/10.1002/bsd.70020>

## APPENDIX A

### A.1 | Questionnaire semi-structured preparation interviews

#### Warm-up questions

1. What are your backgrounds?
2. What are your responsibilities at [organization]?
3. What are your daily activities?
4. Why do you work at [organization]?

#### Questions to understand the representative's organization

5. When why and by whom was [organization] established?
6. How many employees does [organization] have?
7. How does [organization]'s business model work?
  - a. What customer problem do you solve?
  - b. How do you solve this problem?
  - c. Who are your customers?
  - d. How do you market your product to customers?
  - e. How do you retain customers?
  - f. How do your customers pay for your products/services?
  - g. What are your key activities?
  - h. What are your key resources?
  - i. What are your most important costs?

#### Questions to understand the cross-sector partnerships

8. What are [cross-sector partnership]'s key partners?
9. What are the key partners' resources and activities?
10. What are the key partners' interest in and influence on the business model?
11. What is going well and what could be improved in collaborating with the key partners?

12. How do you manage the relationships with the key partners?
13. What is essential for good collaboration between the partners?

#### Questions to understand the scaling ambition of the cross-sector partnership

14. What is [cross-sector partnership]'s scaling ambition?
15. How does [cross-sector partnership] intend to realize this ambition?
16. What are the challenges for scaling [cross-sector partnership]'s business model?

#### Questions to understand the impact of the cross-sector partnership

17. What impact does [cross-sector partnership] aim to create for whom?
18. How does [cross-sector partnership] measure and monitor its impact?
19. What successes (in creating impact) has [cross-sector partnership] achieved to date?

#### Questions to understand the cross-sector partnership's context

20. What are opportunities in the [country] for [cross-sector partnership]?
21. What are the threats in [country] for [cross-sector partnership]?
22. How does the government influence [cross-sector partnership]?
23. How does [cross-sector partnership] cope with the government's influence?
24. Who are [cross-sector partnership]'s competitors?
25. What distinguishes [cross-sector partnership]'s business model from those of competitors?

## APPENDIX B

### B.1 | Questionnaire semi-structured resilience interviews

#### Warm-up question

1. Can you tell me a little about how the organization is doing today?

#### Questions to understand scaling progress

2. When we did the workshop, the organization was trying to scale up. Can you tell me how the organization is progressing regarding that goal to scale up?
3. What strategies have you used to scale up?
4. What has your organization done to realize these strategies?
5. Who has been involved in helping your organization to realize these strategies?
6. What sort of resources has your organization used to realize these strategies?



Questions to understand the disturbances and actions taken

7. Thinking back over the period after we did the workshop, can you tell me about the biggest challenge your organization has been facing?
  - a. What [and who] has caused this challenge, in your opinion?
  - b. What has your organization done to deal with this challenge if anything?
  - c. Who has been involved in helping your organization deal with this challenge if anyone?
  - d. What sort of resources has your organization used to deal with this challenge, if any?
  - e. [if challenge not yet resolved] What is your view on how this challenge will impact your organization moving forward?
8. We have talked a lot about [the major challenge mentioned in 2]. What other challenges is your organization facing, if any?
  - a. What [and who] has caused this challenge, in your opinion?
  - b. What has your organization done to deal with this challenge if anything?
  - c. Who has been involved in helping your organization deal with this challenge if anyone?
  - d. What sort of resources has your organization used to deal with this challenge, if any?
  - e. [if challenge not yet resolved] What is your view on how this challenge will impact your organization moving forward?

Wrap-up

9. Before we finish, is there anything else you would like to tell me about your organization?
10. Do you have any questions for me?

## APPENDIX C

### C.1 | Post-workshop questionnaire

1. To what extent do you expect the workshop to support you in scaling the inclusive business model?
2. To what extent do you think that the workshop fits well with your organizational context?
3. To what extent do you believe the workshop was complete?
4. To what extent do you believe the workshop was simple?
5. To what extent do you believe the workshop was clear?
6. To what extent do you think the workshop was easy to follow?
7. To what extent do you think the workshop achieved its goal in time?
8. To what extent do you think the workshop was worth the effort?
9. To what extent do you expect that the workshop can be used in different contexts?
10. To what extent do you expect that the workshop supports learning from experience?
11. On a scale from 0 to 10, how likely are you to recommend the workshop to other inclusive businesses?