



Supporting biodiversity conservation ventures:
Assessing the Impact Investing sector for an investment strategy to support environmental entrepreneurism

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EXECUTIVE SUMMARY

The overwhelming majority of the financial sector has yet to show interest in biodiversity conservation. In great contrast, impact investing for social good is an emerging asset class. Recent estimates forecast the value of potential investment opportunities to provide social services to the base of the economic pyramid at \$4 billion to \$1 trillion over the next decade. Investments in forprofit ventures that produce biodiversity co-benefits are a small fraction of this growing amount of private capital being mobilized to do "good."

The purpose of this report is twofold. First, we assess the current state of the impact investment sector with respect to its focus on the environment. We do so by assessing environmentally focused investment funds. We review their financial and legal structures, along with the foci of their investments. We also analyze the standards and ratings currently present in the sector, and identify broad levels of risk to those investment funds. Our main purpose is to provide snapshot of the impact investment space as it relates broadly to environmental conservation.

Building on this assessment, the second purpose of this report is to scope a preliminary strategy around the creation of an investment vehicle that supports ventures that have the potential for high biodiversity impacts, while also being financially profitable. We refer to this potential vehicle as a biodiversity conservation venture fund (BCVF), since its goal would be to support high risk-high return investments with respect to biodiversity benefits. We refer to the types of investments the fund would support as biodiversity conservation ventures (BCV): for-profit organizations that are necessarily entrepreneurial in spirit, and exist explicitly to produce high-impact biodiversity conservation benefits while being financially sustainable.

Our assessment hopes to provide a viable roadmap to inform the next steps in developing an investment vehicle that supports BCVs. Originally, a BCVF was conceived as a stand-alone investment fund: a portfolio of investments that included both BCVs and more common investments currently present in the environmental sector (e.g., specialty coffee). Perhaps not surprisingly, our assessment raises as many questions as provides answers on how best to design a BCVF. We conclude that a stand-alone investment fund is likely not the most strategic approach to support BCVs, for reasons outlined in this report. Rather, we suggest some alternative strategies that might be viable approaches to supporting BCVs; those approaches will require additional research and due diligence.

Assessment of Environmentally Focused Investment Funds

Impact investing funds share many characteristics with traditional private equity funds, but are also subject to unique challenges. The legal structure and general management of investment funds focused on the environment tend to be similar to other traditional investment funds, as are the governance, legal, and reporting mechanisms. An important difference, of course, is the blended return as opposed to the expectation of a financial return on a single venture. This objective requires additional skill sets and expertise from management and a fund's board. It also might require the establishment of different financial compensation structures for the fund manager in order to ensure that incentives are in place to balance environmental returns with financial returns.

We screened 23 investments funds with investments that have the potential to produce environmental benefits. Funds were selected based primarily on whether one of their stated foci included the environment. Fund size ranged from \$2 to over \$100 million, with investment capital coming from a diversity of sources and sectors, including endowments, grants, corporate social responsibility, government, private sector firms, and private individuals. Philanthropic foundations, however, play a dominant role as investors in the environmental funds surveyed. The investment focus of the funds was diverse. Natural resources and conservation, sustainable agriculture (e.g., coffee, cocoa, and organic products), clean technology, and small and medium business development were the most common types of investments. With one exception, investments in sustainable fisheries were uncommon. Of funds that focused exclusively on the environment, many of them invested in a single sector: agriculture, forestry, ecotourism, land protection, or fisheries. While the funds invested in a variety of asset classes, the most common were debt, absolute return notes, and equity. Several established funds that focus exclusively on the environment provide insights into the environmental investing space, including the California Fisheries Fund, Beartooth Capital, and Verde Ventures. Those insights include 1) the tendency to focus on a single sector, 2) the need for an a priori detailed market assessment, and 3) market timing and preliminary funding by philanthropic sources are important.

For the same 23 funds, we also assessed standards and ratings, particularly those related to environmental impacts. While less than decade old, impact measurement is one of the most active areas in impact investing. The emerging standards and ratings are IRIS (Impact Reporting and Investment Standards) and GIIRS (Global Impact Investing Rating System). IRIS provides a standardized taxonomy and metrics for social, environmental and financial performance. GIRS is an investor-focused tool, which conducts third-party assessments of the social and environmental impact of both companies and funds. In addition to standards and ratings, B corporation certification is becoming increasingly common in the private sector. IRIS is the only standard that includes environmental metrics; however, those metrics are quite broad in scope. Over 50 percent of the funds surveyed used IRIS; many used IRIS in combination with custom metrics designed for a specific fund. Of the funds that use IRIS standards, 46 percent were GIIRS-rated. While, IRIS and GIIRS have emerged as the leading models to inform impact, there is still a lack of consensus on approaches and standards of measuring outputs and outcomes. For funds focused heavily on biodiversity conservation, current standards are limiting and lack the precision and accuracy to confidently document environmental benefits. Custom metrics will be needed that can work in conjunction with IRIS standards.

Risk assessment will be a critical component of any BCVF or any other investment vehicle that supports BCVs. Integrating social and environmental returns into an investment creates additional risk, which can discourage potential investors. No standard assessment for impact investing risk exists. Risk can be broken down into key components, including 1) liquidity risk, 2) impact risk, 3) measurement and reporting risk, 4) fund manager and mission-drift risk, 5) subordinate risk, and 6) legal, regulatory, and political risk. Because practices and standards differ between the investment and the environmental sector, managing a fund under investment best practices will help reduce risk and subsequently attract more investment. Some types of risk can be reduced through insurance. Insurance instruments can be particular important for funds operating internationally, particularly in scenarios with minimal governance, contract law, and regulatory oversight.

Designing an Investment Vehicle to Support Biodiversity Conservation Ventures

Prior to the commission of this research, a stand-alone investment fund (e.g., BCVF) was viewed as the appropriate approach to invest in and support BCVs. Our research focused on informing two important questions around designing an investment vehicle to support BCVs:

- Given the current investment fund landscape that is focused on environmental impact, what niches are most strategic to support high-risk, high-return BCVs?
- How can an investment vehicle that supports BCVs compliment and provide value-add to the current efforts of investment activities focused on the environment?

Three main findings from our research help inform these questions.

First, our research confirmed that the majority of for-profit investments being made in the environmental sector are focused on commodities that are produced in a way that also promote biodiversity conservation co-benefits. Coffee and to a lesser extent cocoa are the two premier examples. Investments in eco-tourism and sustainable fisheries are similar in that they produce co-benefits. While these investments produce a financial return, few, if any, are focused explicitly on generating a high-impact environmental return. A notable exception is Beartooth Capital, which leverages land speculation to protect and restore private lands in the western United States. Thus from a biodiversity conservation perspective, there is arguably the need (and potential space) for an investment vehicle the supports explicit investments in biodiversity conservation ventures that are high-risk but with a potential high return. This could include ventures such as payment for ecosystem services, biodiversity offsets, seafood products with integrated biodiversity benefits, and other innovative market-driven approaches that are emerging.

Second, our research suggests that BCVs are not commonplace, and the ones that do exist are often not tracking or quantifying their environmental return in sufficient detail. The majority of activities in the environmental sector are not focused on financial sustainability, let alone generating profits or returns. While this is partly due to a lack of demand and markets, it is also partly due to the history of culture and norms within the environmental sector. In great contrast to the social sector, support for entrepreneurism and innovation is glaringly absent in the biodiversity conservation sector. This may be changing, however, with the advent of market-driven approaches. Thus, investment vehicles that support entrepreneurism and innovation for conservation could be particularly timely. Nonetheless, this observation raises an important question that deserves additional attention: is there sufficient supply of BCVs currently to support a stand-alone investment vehicle?

Third, our research suggests that the philanthropic sector heavily supports the existing funds that are investing in the environmental space. While financial details are often unavailable, the fact that even "traditional" environmental investments (e.g., coffee cacao, and ecotourism) are heavily financed by philanthropic investments suggests that they are viewed as high-risk, low-return investments by those in private sector with capital to invest. If this is true, it seems unlikely a BCVF—which would likely carry additional risks and lower financial returns—would be able to currently attract funding from the private sector.

The three findings above suggests that a stand-alone fund with a typical structure as outlined in Part I of this report is unlikely to be the most strategic approach to support BCVs. In fact, such a fund may not be viable, due to the lack of both supply (i.e., ventures) and demand (i.e., willing investors—private capital or philanthropic). Thus, alternative strategies and financial structures may be needed to support BCVs.

One alternative might be through the use of Conservation Trust Funds (CTFs) to support BCVs. Conservation Trust Funds have now been established in more than 50 developing countries and transition economies. In most cases, these CTFs are non-governmental, independent grant-making institutions whose primary aim is to raise, invest, and re-grant financial resources for biodiversity conservation and other uses. Integrating the types of investments discussed here (i.e., BCVs) into the portfolio of some CTFs might make sense from a number of different perspectives:

- Many CTFs have long-term goals. Thus, supporting a sector whose explicit goal is financial sustainability and biodiversity conservation benefits would align well with the goals of many CTFs and their stakeholders.
- While supporting BCVs is high-risk with some failures inevitable, that risk is likely comparable to some projects that CTFs are already investing in, but lack the co-objective of financial sustainability. Thus, a lack of financial return from a BCV (i.e., "investment failure") may have a similar outcome in the end than some of investments CTFs are already making (e.g., financially-dependent environmental benefits over some time period). Thus, from the perspective of some CTFs, investing in BCVs would not carry additional risk, while the potential return is substantial.
- CTFs that support in-country entrepreneurism that is environmentally focused would help nudge local, growing private sectors toward more sustainable practices. The support, however, would have to go beyond financial support to include capacity building and technical assistance. While these services would increase transaction costs, the additional investment could produce viable social, environmental, and economic returns.
- Environmental and conservation friendly enterprises are still relatively new with limited market opportunities. Grant financing that can help the development of these enterprises in order to make them "investment ready" can have a significant impact on conservation outcomes and increase stakeholder participation in conservation efforts. CTFs are well placed to help develop entrepreneurial enterprises, and could dedicate funds specifically aimed at building new conservation-friendly enterprises. Such an approach could leverage the vast experience, network, and potentially the capital of the social entrepreneurship sector. Doing so could inject large amounts of innovation into the environmental sector.

Sustainability goals are increasingly embracing biodiversity conservation objectives. Ethical sourcing is creating demand for new and innovative products, and is sparking more effective production practices. This growth often occurs within a specific niche where buyers are looking for high-quality, environmental friendly products that may be quite limited in quantity. Relatedly, younger consumers are becoming more interested in products with positive impacts as opposed to those with minimal harm. Growing consumer awareness is creating demand for new products and commodities that provide environmental benefits, and opportunities to market these products are increasing. Like all emerging markets with little and sporadic demand, markets focused on products with explicit positive environmental impacts would benefit from subsidies supported by philanthropic sources. Conservation Trust Funds, and other funding ventures that are willing to take on the risk of success or failure, have an important role to play in building these new ventures, and graduating them to the point where they can access debt and equity investors. If successful, Conservation Trust Funds that support successful Biodiversity Conservation Ventures may eventually be in a position to launch their own investment funds as a way to generate a return on their capital.

INTRODUCTION

The majority of large nonprofit conservation organizations now have explicit programs that focus on "business and biodiversity" (Conservation International 2013; The Nature Conservancy 2013b; Wildlife Conservation Society 2013; WWF 2013). These programs focus on partnerships to inform and stimulate businesses to reduce their impacts and protect biodiversity and ecosystem services to the extent possible. Many businesses have responded favorable, particularly those operating natural resource dependent sectors. With few exceptions, this has not been the case for the financial sector—investors, banks, and insurance firms (Mulder 2013).

There are signs that this situation may be slightly shifting. At the RIO+20 Summit in 2012, 39 CEOs of financial institutions endorsed the Natural Capital Declaration (Natural Capital Declaration 2013). This declaration has the following four commitments,

- 1. Understand impacts and dependencies in relation to natural capital;
- 2. Embed natural capital in financial products and services, including loans, equities, bonds, and insurance products;
- 3. Account for natural capital through accounting frameworks; and
- 4. Disclose and report on natural capital.

Despite this nudge, however, the overwhelming majority of the financial sector has yet to shown interest in biodiversity conservation. In great contrast, impact investing for social good is an emerging asset class. Social entrepreneurship and investment funds to support them have exploded over the past decade. Recent estimates forecast the value of potential investment opportunities to provide social services to the base of the economic pyramid at \$4 billion to \$1 trillion over the next decade (O'Donohoe et al. 2010). In 2007, investments in microfinance reached \$25 billion (Monitor Institute 2009). Investments in ventures that produce biodiversity co-benefits pale in comparison: certified coffee imports to North America was worth \$330 million in 2006 (Blackman & Rivera 2011). This discrepancy is even greater considering the evidence linking certification to environmental benefits is currently weak (Blackman & Rivera 2011).

The purpose of this report is conduct a preliminary assessment of the Impact Investing sector in order to help inform an investment strategy to support environmental entrepreneurism. There is need to assess the current state of the impact investment sector with respect to its focus on the environment, biodiversity conservation in particular. We do so by assessing environmentally focused investment funds. We review their financial and legal structures, along with the foci of their investments. We also analyze the standards and ratings currently present in the sector, and identify broad levels of risk to those investment funds. Our main purpose is to provide snapshot of the impact investment space as it relates to biodiversity conservation broadly.

We hope that this assessment will help inform a financing strategy to support entrepreneurs that are focused on biodiversity conservation. The majority of the biodiversity-focused investment funds are operating in the commodities or services sector, such as ecotourism, sustainable agriculture, forestry, and fisheries. While these investments are often financial viable and have some biodiversity co-benefits, they are often not explicitly focused on biodiversity conservation—species,

habitats, and ecosystems. The commission of this assessment was initiated due to interest around the creation of an investment fund that supports ventures that have the potential for high biodiversity impacts, while also being financially profitable. This is akin to a venture capital fund for biodiversity conservation.

Originally, this Biodiversity Conservation Venture Fund (BCVF) was conceived as a stand-alone investment fund. This report is the first step to assess the feasibility and wisdom of that strategy. Perhaps not surprisingly, this report raises as many questions as provides answers on how best to design a BCVF.

The Executive Summary provides a summary of each section of this report, as well as our conclusions with respect to the creation of a BCVF. The first section of this report is intended to be an investment fund primer and assessment, and will be most useful to those lacking a financial background. The following two sections assess the current marketplace with respect to investment funds focused on some aspect of the environment, and review the current standards and ratings being used. Lastly, we include a brief section on risk mitigation, which like the first section will be most useful to those lacking a financial background.

INVESTMENT FUND ASSESSMENT & PRIMER

1. PURPOSE

Impact investing funds share many characteristics with traditional private equity funds, but are also subject to many unique challenges. Whether forming an impact investing fund or a traditional fund, it is critical to choose the correct legal structure, accurately assess the landscape of potential investors, and target the best candidates to manage the fund. This section provides some basic background on the structure of funds. We provide insights on the most commonly used financial and management standards and best practices to apply when deciding on the above factors. We will also discuss common fund terminology, required reporting practices, and asset class categories applicable to a fund focused on biodiversity conservation. This overview is not meant to be exhaustive; rather, it is to provide a brief background of fund structure and management to facilitate an assessment of the cost and benefits of establishing a stand-alone biodiversity conservation venture fund (BCVF). Further, the review is intended for those lacking a financial background.

Important questions remain outstanding:

- If a stand-alone fund is the most strategic approach, what will be the legal structure? A limited partnership is a likely candidate.
- Who will run the BCVF (i.e., General Partner) and who will make-up the Investment Committee and Advisory Boards?
- What are the terms and characteristics of the BCVF as outlined in the Investment Policy Statement (e.g., asset class, fund life, investment targets)?

2. FUND STRATEGY

A fund strategy defines how the investment portfolio will realize the financial profit and social and environmental impact it seeks. This strategy should be summarized in an Investment Policy Statement, which should state the fund's objectives and target size. Having a clearly defined investment policy streamlines the implementation of the strategy, as it sets basic parameters for the evaluation of investments and allocation of capital pools. Defining a target fund size also streamlines fundraising. Investor selection is different when raising a \$10 million fund compared to a \$100 million fund.

Determining a fund's primary priority is critical. Whether a fund is impact first, financial return first, or triple bottom line will define important aspects such as risk management. For example, if the strategy involves specialization rather than diversification (e.g., combining asset classes and having a well balanced portfolio of non-correlated assets), the strategy should include additional risk management strategies to mitigate portfolio risk (see Risk Mitigation Section). If a fund takes on a financial return first approach, the forecasted return, risk, and other capital market assumptions should not be influenced by the forecasted social and environmental impact.

Another key characteristic of the investment policy statement is establishing the benchmarks that will be used to measure financial returns and social and environmental impacts. The first steps an investor takes when evaluating an investment is applying benchmarks to its historical

performance. For private equity funds, the most common method of doing this is through vintage year comparison: comparing the performance of the fund to other similar funds started the same year (DePonte 2010). Returns for private equity funds are commonly measured through an Internal Rate of Return, and then applied against risk-adjusted benchmarks such as hurdle rates and inflation rates.

Important considerations of a Fund strategy:

- Fund life (e.g., time it takes for projects to realize positive cash flow)
- Investment targets by sector and geography
- Fund-raising and investment periods
- Target asset mix to meet investor risk-return criteria

3. FUND STRUCTURES

A BCVF could be formed under a variety of structures. Different legal structures have varying levels of operational requirements, liability, and taxation. The investment fund structure should minimize the liability of fund principles, as well as investors. Potential fund structures for a BCVF include a Limited Partnership, Limited Liability Company, and Corporation. Each has its own characteristics (Table 1). Here, we focus on a Limited Partnership.

Table 1. Some basic characteristics and differences between a Limited Partnership, Limited Liability Company, and a Corporation.

Ownership Structure	ship Structure Limited Partnership		Corporation
Formation Difficulty	Low	Medium	High
Liability	At least one general partner has unlimited liability.	Members are typically not liable for the debts of the LLC.	Officers and shareholders are typically not responsible for the debts of the corporation.
Operational Requirements	Some formal requirements, but less than corporation.	Some formal requirements, but less than corporation.	Board of Directors, annual meetings, and annual reporting required.
Management	Limited partners are excluded from management, unless they serve on the Board of Directors.	Members have operating agreement that outlines management.	Managed by the Directors, whom are elected by the shareholders.
Files as a separate entity; must meet certain criteria to avoid being taxed as a corporation.		Depending on the structure, there is no tax at the entity level. Income-loss is passed through to its members.	Taxed at the entity level. If dividends are distributed, they are also taxed at the individual level.
State Taxation & Liability	Individual states have specific tax and liability laws.		
State Registration	Individual states have specific business registration requirements.		

4. LIMITED PARTNERSHIP

A Limited Partnership (or a Limited Liability Partnership) could be created for a BCVF that seeks to invest in small businesses, ventures, and projects. A Limited Partnership consists of a general partner (GP) who manages the fund and limited partners (LPs) who participate in profits and losses. Limited partners share in the profits of the business, but their losses are limited to the extent of their investment. There are specific agreements between the GP and LPs, which determine fees, commitment size, fund duration, and other relevant terms. Part of the appeal of the Limited Partnership structure is its ease of formation and tax efficiency. The fund acts as a pass-through entity for the investor where profits (and losses) are not taxed at the fund level; rather, they go

directly to the investor via capital distributions. The distributions received by the LPs are taxed at capital gains tax rates, which are usually lower than income tax rates.

4.1. The General Partner & Support

Since many fund interactions are based on trust, a vital consideration of any fund is its management. The GP should have a solid reputation in the field of investment, be well-versed in the financial details of the portfolio investments, be familiar with all of the different asset classes that fit the fund criteria, and be able to properly convey the benefits she brings to investors. Many of the fund managers we interviewed stressed the importance of communications with financial investors and project managers. With a BCVF, this requires the GP to have a broad skillset, spanning science, finance, and project management. Managing a fund is a time and labor intensive task, and cannot be a part-time commitment. Each potential project must be properly vetted, which usually requires a team to scope and vet potential investments, along with conducting due-diligence. While a larger team might be able to review more projects, the fund managers we interviewed ran a small, streamlined operation that kept management fees low and facilitated quick decision-making.

Two profiles of General Managers of environmentally focused funds.

Carl Palmer, Beartooth Capital Partners <u>Education</u>: BA in Architectural Sciences, BA in Environmental Studies, MBA.

<u>Prior Experience</u>: President & CEO of Greenbridges, a real estate firm focused on agricultural investment; Executive Director of a Utah land trust.

Matt Rodosky, Booth School Conservation Fund Education: BS in Biochemistry, BS in Molecular Biology, MBA.

<u>Prior Experience</u>: Institutional Fixed Income Sales and Trading at Barrington Trading Co.; CFO and Technology Director of the Teton County School District.

The GP typically has a committee to assist in investment decisions. Investment committee members should have intimate knowledge of the fund's target market and have strong connections that would aid in project/venture sourcing and evaluation for investment. The investment committee aids in ensuring the LPs that their money is being invested wisely. GPs are typically given much leeway in selecting investment opportunities; however, they have a clear legal or fiduciary duty to invest the LP's funds as specified in the Investment Policy Statement (Levin 2001).

A fund typically also has an advisory board, which consists of individuals and LPs who can provide investment advice and act as a referral for new investments. Typical duties of the board include assisting the GP in vetting projects (particularly where conflicts of interest exist), selecting auditors, and ensuring the GP is adhering to his responsibilities of compliance, reporting, and fiduciary duty requirements.

While impact investment fund managers endure the high fixed cost of investment relative to their deal sizes, reported management fees are only slightly higher than those charged by traditional investment fund mangers (1-2%, with some as high as 5%, O'Donohoe et al. 2010). Similarly, carry fees¹ fall within the range of traditional funds (e.g., 20%). The low fees compared to higher costs may be a result of impact investment funds receiving grant support that allow fund managers to charge market rate fees to investors (see Marketplace Assessment). Maintaining market level fees can help overcome potential barriers in attracting more investment capital; however, impact

¹ Carry, or carried interest, is a share of the profits of an investment or investment fund that is paid to the fund manager in excess of the amount that the manager contributes to the partnership.

investment fund managers may be able to justify higher fees do to the value-add they provide in additional services, such as impact measurement.

The Roles of an Investment Committee and Advisory Board

Verde Ventures utilizes a Conservation Committee (three Conservation International employees) to assess the environmental impact of proposed projects. If a project meets environmental impact requirements, the Verde Ventures staff produces an investment memo to present to the Investment Committee (seven members of varying background) for approval to the next phase. The due diligence process spans 1-3 months, and the Investment Committee decision takes place in one day during a review meeting.

Terra Capital, one of the first biodiversity funds focusing on entrepreneurial businesses, utilized a Biodiversity Advisory Board and Investment Committee in tandem when assessing investments. The Board reviewed reports prepared by third-party consultants outlining the potential environmental impacts of an investment. At the same time, the Investment Committee reviewed proposals and assessments prepared by an in-house business team. Both entities shared power: the Advisory Board had veto power and the Investment Committee had approval power.

4.2. Governance & Legal Services

The Limited Partnership structure requires multiple rules to be followed and terms to be defined in order to comply with accepted standards and legal requirements. These rules and terms govern the amount a fund is able to invest in certain projects, how much compensation the GP will receive, and the number of investors the fund could have (Table 2).

Legal services are required throughout the life of a fund, and intensively at the initial stage. A lawyer should provide inputs on opportunities and restrictions on a fund's domicile and steps to create the fund. After the fund structure is decided, a lawyer is needed to draw up essential documents for the fund, including

- Partnership Agreement, the governing document for the partnership;
- Private Placement Memoranda, which provides details on the fund to potential LPs; and
- Subscription Agreements, which include applications for new LPs to join the fund, along with details on membership and investment amounts.

Periodic legal consultations are necessary to verify adherence to all domestic (and foreign) laws and reporting requirements. A lawyer could also assist in selecting an auditor to monitor the GP, and report to the LPs and the advisory board. Pro-bono legal assistance is a potential option; Verde Ventures has received pro-bono legal assistance from a suite of legal firms, including Sidley Austin Brown & Wood LLP; White & Case LLP; Morgan, Lewis & Bockius; Reed Smith; and RGR Abagados. Other legal firms that were identified and recommended during our primary research included Resources Law Group LLP, McGuiereWoods LLP, and James Olmsted Attorney-at-Law.

5. REPORTING REQUIREMENTS

In addition to the legal requirements of forming a fund, entities must meet reporting standards set by domestic and international accounting organizations. In the United States, financial statements must meet criteria outlined by U.S. Generally Accepted Accounting Principles established by the Financial Accounting Standards Board. In Europe and internationally, statements must meet criteria outlined by International Financial Reporting Standards established by the International Accounting Standards Board.

Table 2. Some financial and structure terms related to a fund being structured as a Limited Partnership.

Term	Description
Fund Size	Prior to establishing a fund, it is vital to understand the monetary needs of the projects and ventures the fund will invest in. The target project size(s) will determine the size of the fund.
Investment Amounts	After a target fund size is set, the GP must find LPs willing to supply the fund with the necessary capital. While there are funds that have started investments before reaching their capital goal from LPs, such a scenario can make it difficult to raise capital for future funds. It is more common for the fund to start investing in projects once the fund size target is reached. The LPs are required to make their full contribution to the fund available for investment, but the GP does not use the full available amount unless there are investment options available. Typically, the GP is also required to invest an amount of her own money into the fund, often ~1% of the total fund size. GPs are usually not allowed to invest in individual projects, but must invest as part of the pooled investment with the LPs.
Capital Calls	A GP collects funds from LPs by issuing capital calls. A capital call is an installment of an LPs committed capital paid to the GP, also known as a drawdown or capital contributions. The partnership agreement provides specifics on how and when capital contributions are to be made, but in general payments should be made within 10-20 days after the receipt of the notice. A capital distribution is a return of capital to LPs by the GP from the result of a sale of an asset.
Management Fees, Bonuses, and Carried Interest	GPs usually receive a percentage of the invested funds as a fee to carry out daily operations, as well as a percentage of the total gains (carry) and a periodic bonus based on fund performance. Common terms are a 2% of invested funds annual management fee, with a 20% carry. The structure that is best at aligning GP and LP interests is a reasonable management fee that covers daily expenses, employee salaries, travel, and research costs, along with a carry that is received after LPs receive their initial contribution and a specified return on investment. Setting management fees too high might misalign the GPs interests, making the GP focus on investing a large percentage of the fund instead of seeking a return and impact.
Concentration Limits	A concentration limit is the maximum percentage of a fund (usually based on committed capital) that can be invested in a single company or project. The purpose of a concentration limit is to incentivize diversification for the fund to reduce risk. Having a limit in a single investment reduces risk as it avoids the concentration of time and resources into a single investment. A GP might be incentivized to take high risk investments, such as investing in only one company, to offset an investment with negative returns in the portfolio. In addition, a concentration limit prevents high risk behavior from the GP when markets are down.

Limited Partnerships have less reporting requirements than publicly traded entities and corporations. Nevertheless, a Limited Partnership is expected to file quarterly and annual financial statements based on the standards set by the governing bodies. Based on these standards and the best practices suggested by leading industry groups, we have compiled a list of statements that are typically included (Table 3).

5.1. Impact Fund Specific Issues

Managing an impact investment fund requires a specific set of considerations not present in traditional funds. The GP's incentive is to maximize returns for a fund, as they only get returns if the LPs get their investment back. Traditional funds tie GP compensation to profit maximization, but impact funds need to consider the environmental and social performance in addition to the financial returns (i.e., blended return). In this developing sector and asset class, different incentive-based structure's are needed for GP compensation that address the challenges of financial performance

and impact, while maintaining accountability and transparency (Global Impact Investing Network 2011).

Table 3. Some common reporting standards for fund management. In addition, a BCVF would require additional documentation that would document environmental impacts.

Item	Description
Quarterly Reporting Package	The QPR should enable LPs to interpret transactions within the portfolio clearly and accurately. Deciding on and using a standardized package improves the speed of communication from the GP to LPs by lowering statement processing times and reducing auditing costs. Maintaining standardized reporting allows the GP to more easily comply with legal terms set in fund documentation. The package is divided into three sections: Summary Management Discussion and Analysis Letter, Financial Package Statements, and Supplemental Management Reports.
Summary Management Discussion & Analysis Letter	The reporting package should include a letter updating LPs on the portfolio. The letter should include major cash flows occurring throughout the quarter, including an explanation of extraordinary movements. Extraordinary movements can include project defaults and abandonments impacting the GP. Lastly, the letter should discuss risk factors at the fund level.
Financial Package Statements	Statements should be prepared quarterly and audited annually. The package provides information on the balances and transactions occurring on a consolidated fund level and for individual LP accounts. Statements should adhere to all relevant accounting standards.
Supplemental Management Reports	Statements should be prepared quarterly and provide supporting information to financial statements. These statements are not subject to accounting standards and are not audited.

Providing incentives such as financial bonuses based solely on financial performance introduces a risk that could potential distract from the social and environmental impact goals (Bugg-Levine & Emerson 2013). This risk would increase with the expected return of the fund at the time of liquidation. If expected returns at the time of liquidation are high, incentives tied to the carry of the fund create a stronger financial incentive for the GP. Designing specific performance targets for bonuses and carries that integrate social and environmental returns would help align fund goals to those of the GP. The targets could both reward the GP for successful goal achievement by adding percentage bonuses on top of the carry or penalize the GP (e.g., lower the carry) for not achieving the environmental and social goals, along with the financial requirements. Methodologies to measure impact would be critical, along with third-party verification (Global Impact Investing Network 2011). If goals are not met, it is also essential to have rules on what will be done with excess funds. Options include returning the money to the LPs or donating the funds to a predetermined non-profit with an overlapping mission.

5.2. Impact Fund Investors

Potential investors vary depending on their appetite for risk, financial return, and impact. For example, the F.B. Heron Foundation has "carve-outs" within its investment portfolio dedicated to market rate investments, below market-rate investments, and grant making. Although the overall portfolio seeks a market rate return, portions are set aside for higher risk or non-financial return (i.e., impact) investments (Trillium Asset Management 2007). We briefly categorize potential investors into broad types.

Philanthropic Foundations offer direct funding to organizations or ventures exclusive of any profit or direct benefits needed in return. Donors can come in variety of forms, with the most relevant being grants and program-related investments. In the biodiversity conservation sector, U.S.-based foundations play a dominant role as investors of funds, and are the most likely candidate for a VCBF (see Marketplace Assessment Section).

High-net-worth individuals are typically defined as having investable finance (i.e., financial assets) in excess of US\$1 million. These individuals can have greater flexibility in their investment mandates, enabling them to invest across different asset classes. Usually, their personal preferences determine

the sectors they chose to invest. In contrast to institutional investors, high-net-worth individuals can more easily accept lower financial returns.

Institutional Investors are bound by fiduciary duties, and thus are commonly limited in their ability to invest in high risk, impact-first projects or ventures. Institutional Investors typically do not invest in first-time funds, as their policies call for investments into funds with proven track records and asset classes with established benchmarks. As impact investing has grown over the past decade, however, emerging fund managers have began to establish themselves and their investment strategies (O'Donohoe et al. 2010). In response, more institutions have created mission-related investments carve outs within their investment portfolios specifically dedicated to impact investments.

Corporate Socially-Responsible Investing involves funding allocations set aside by corporate entities for investment into internal and external opportunities that create triple-bottom line returns. Corporate Socially-Responsible Investing offer corporations opportunities for tax incentives and in many cases serves as a tool to demonstrate some level of sustainability to their shareholders and customers (Sarre et al. 2001).

Venture Capitalists can include high-net-worth individuals, institutions, or private banks seeking high growth, high financial return investments. Capital is allocated to higher risk investments, such as startups or small businesses, offering above-market return potential. In return for their investment, most investors receive equity stakes in the company and influence over company decisions.

5.3. Asset Class Categories

Asset classes describe securities that exhibit similar characteristics and trends over time. Indexes track the volatility and rate of returns for various asset classes to serve as benchmarks to compare against individual securities within the same asset class. The major asset classes used in portfolio management are equities (e.g., hedge funds, private equity funds, and venture capital funds), real assets (e.g., commodities and real estate), fixed income (e.g., bonds), and cash. Multiple categories exist within each asset class, as securities are broken down further by a variety of characteristics (e.g., growth rates, size, risk). Below are brief descriptions of categories of asset classes that could be relevant to serving a BCVF.

Many investment vehicles can be used when purchasing equity shares. The most common form of purchasing equity shares is through publically traded stocks; however, investors can buy equity shares in hedge funds, private equity funds, venture capital funds, and real estate investment trusts. Private equity funds consist of investments directly into private companies or buyouts of public companies. Capital is illiquid as it is tied to investments with a time horizon (3-5 or more years). Profit is realized when the investment held by the fund is sold or, in the case of a private company, is re-listed on the stock exchange through an Initial Public Offering. Institutional and accredited investors are most involved in private equity. As of September 2012, the Private Equity asset class has returned 13.7% and 13.6% over the annualized trailing 10 and 20 years, as measured by the Cambridge Associates U.S. Private Equity Index.

Venture Capital funds invest in early stage and start-up companies that have the potential for exponential growth. Investments are also illiquid. Venture capital can be critical for start-up companies because most capital markets (i.e., debt and equity) deny entry to higher risk ventures. As of September 2012, the Venture Capital asset class has returned 6.0% and 28.7% over the annualized trailing 10 and 20 years, as measured by the Cambridge Associates U.S. Venture Capital Index.

Fixed income is typically debt instruments that involve borrowing funds and having a set repayment amount and schedule. It is customary to have at least one rating agency provide an assessment of the instrument's risk. Many of the fixed income investment vehicles deal with corporations or governments raising money to fund projects, but there are several relevant new fixed income instruments developed to target environmental conservation. A number of groups, including World Wildlife Fund for Nature and Enviromarket Ltd., have been working on forest bonds as a financing mechanism for REDD+ projects and other sustainable forest activities (Petley et al. 2007; Cranford et al. 2011). Green bonds were created by the World Bank, and used to support their efforts to finance projects focused on climate change mitigation and adaptation, including projects that reduce carbon through reforestation and avoided deforestation. The repayment of these triple-A rated bonds are not linked to the performance of the projects themselves, thus investors do not assume specific project risks. Since 2008, the World Bank has issued over \$3.5 billion in Green Bonds, with coupon rates ranging from <1-9% (World Bank 2013). More recently, the Nature Conservancy has developed Conservation Notes, which are also rated (Moody's Aa2) and consist of a minimum of \$25,000 investment over 1, 3, or 5 year terms. This investment sold out in 2012, and a new offering is scheduled in 2013 (The Nature Conservancy 2013a).

6. RECOMMENDATIONS

CREATE A DRAFT INVESTMENT POLICY STATEMENT & IMPACT PLAN

An investment policy statement is a critical first step in clarifying fund goals and inform if, indeed, a stand-along fund is the most strategic instrument for those goals. It will also help identify potential risks to ensure financial and impact objectives are feasible. An investment policy statement should outline the main purpose and overall goals of the VCBF and verify it is aligned with the organization's mission who will be responsible for the fund. It should also identify an appropriate investment structure and scope potential GPs and LPs, along with an appropriate target asset allocation strategy and time horizon that will benefit both the investors and investments in producing the desired social and environmental impacts. An investment policy statement serves as a roadmap for a roadmap (Krinksy & Hall 2012).

A BCVF should have an impact plan that it available to potential investors. The impact plan should detail what impacts the fund will be making and how it will create and document them. The plan could also be used to showcase current success for future fundraising, as well as informing current investors of the impact the fund is making. Assuming the BCVF is environmental impact-first fund, the plan should also describe additional social co-benefits it plans to create.

MARKETPLACE ASSESSMENT

7. PURPOSE

We conducted a marketplace assessment of the impact investing space to assess three main investing groups: 1) funds, which are the suppliers of the investments, 2) investors, who provide capital for the funds, 3) and platforms or markets that bring the supply and the demand together. First, we conducted a broad overview and analysis of 23 investment funds. Our analysis is not exhaustive; rather, the purpose here is to provide a snapshot of funds with investments that have potential environmental benefits. Funds were selected based primarily on whether one of their stated foci includes the environment. We relied on Impact Assets to identify and screen funds (see Methods). Impact Assets is non-profit financial services company focused on impact investing. It manages over \$100 million in assets, and manages a public database of experienced private debt and equity impact investment funds (Impact Assets 2013). We screened funds based on the following criteria:

- The fund asset class included private debt or private equity,
- The fund's assets was at least \$US2 million,
- The fund was designed so that the assets were recoverable (i.e., for-profit),
- The fund expressed an explicit commitment to an environmental impact.

Second, we conducted an in-depth analysis of three environmentally focused funds: California Fisheries Fund, Conservation International's Verde Ventures Fund and Beartooth Capital. We chose these funds in particular because they operate in different sectors (fisheries, agriculture, and land conservation); they operate both domestically and internationally, and range in size of capital from \$2 million to more than \$70 million. The goal here is to provide additional insights and details into funds that are explicitly focused on biodiversity conservation. Lastly, we analyzed the investors that were most common in the 24 funds assessed, and assessed platforms that BCVF could leverage to form potential partnerships.

8. FUNDS & INVESTORS

Fund size ranged from \$2 to over \$100 million (Table 4). Environmental funds receive funding from a diversity of sources and sectors, including endowments, grants, corporate social responsibility, government, and private sector firms, and private individuals. Philanthropic foundations play a dominant role as investors in the environmental funds assessed. For example, the David & Lucile Packard Foundation is investing in 5 of the 23 funds assessed. Primary interviews confirmed this: foundations such as David and Lucile Packard Foundation and the Gordon and Betty Moore Foundation are viewed as the most active investors in environmentally focused funds. Levels of investment by individual, institution, or sector were generally unavailable. Most funds do not disclose details on investors. Of the funds interviewed, the International Finance Corporation provided \$1,000,000 in loans to the Verde Ventures Fund in its initial start-up phase (Verde Ventures 2013).

Table 4. Investment funds assessed, their focus, fund size, and examples of investors. Focus: CD: Affordable Housing and Community Development, CT: Clean Technology, ED: Education and Charter Schools, FT: Fair Trade, HW: Health & Wellness, MF: Microfinance, Low-income Financial Services, and Micro-insurance, NRC: Natural Resources and Conservation, SA: Sustainable Agriculture, SF: Sustainable Fisheries, SMBD: Small & Medium Business Development, WS: Water & Sanitation. Focus categories are adopted from Impact Assets.

Fund	Focus	Fund Size (US\$)	Investors and Donors
Alterfin CVBA	FT, SA, MF	51-100 mm	French SIDI, 11.11.11, Oxfam Solidarity, Peace Islands, Triodos Bank, SOS Faim, Netwrok Vlaanderen, Reseau Financement Alternatif, Oxfam World Shops, BNP Paribas Fortis, Belgian Investment Company, BRS, Damiaan Foundation, Protos
Bamboo Finance	CT, HW, CD, ED, NRC, MTM, MF	>100 mm	Foundation Marie et Alain Philippson
Beartooth Capital	NRC, SA	80 mm	Not Availible
California Fisheries Fund	SF, NRC	2 mm	California Ocean Protection Council, Private family foundations
Calvert Foundation	CT, HW, CD, FT, ED, WS, MTM, SA, SMBD, MF	>100 mm	Independent investors
City Light Capital	CT, ED, NRC, WS	26-50 mm	Not Availible
Craft 3	CT, HW, CD, ED, NRC, WS, SA, SMBD, MF	>100 mm	Foundations, Various levels of governemnt (federal, state, local, and tribal)
EcoEnterprise Fund	FT, NRC, SA, SMBD	20 mm	The Nature Conservancy, Multilateral investment Fund of the Inter-American Development Bank, European Investment Bank, Netherlands Development Finance Company, Hivos-Triodos Fonds, Oikocredit, Calvert Foundation, Blue Moon Fund, EcoEnterprises Capital Management, LLC, private accredited investors
Ecotrust Forest Management	NRC, WS, SMBD	not availible	David and Lucile Packard Foundation
EKO Asset Management Partners, LLC	NRC	<10 mm	Piedmont Community Bank Holdings, Christensen Global Strategies, McKinsey & Co., NEA, Cherokee Partners, Richmond Management Company, Spring Ventures, Wolfensohn & Co.; Private Investors
Iroquious Valley Farms	HW, MRC, SA	<10 mm	Individual accredited investors
Living Cities	CT, HW, CD, ED, NRC, SMBD	26-50 mm	AARP Foundation, The Annie E. Casey Foundation, AXA Equitable, Bank of America, Bill and Melinda Gate Foundation, Citi Foundation, Deutshe Bank, Ford Foundation, The John, D, and Catherine T. MacArthur Foundation, John S. and James L. Knight Foundation, JP Morgan Chase Company, The Kresge Foundation, The McKnight Foundation, Metlife Inc, Morgan Stanley, Prudential Financial, Robert Wood Johnson Foundation, Rockefeller Foundation, Surdna Foundation, W.K. Kellogg Foundation
Natural Capital Investment Fund (Conservation Fund)	SA, CT, NRC, SMBD	not availible	Appalachian Regional Commission, Branch Banking and Trust, Calvert Foundation, Citi Communities at Work Fund, Claude Worthington Benedum Foundation, Ford Foundation, Golden LEAF Foundation, Goldman Sachs 10,000 Small Businesses, JP Morgan Chase, Mary Reynolds Babcock Foundation, Darrin & Shaula Massena Family Fund, NC Agricultural Development and Farmland, Preservation Trust Fund, NC Rural Economic Development Center, NC Tobacco Trust Fund Commission, One Foundation, SunTrust Bank, TD Bank, U.S. Department of Agriculture, U.S. Department of Treasury, CDFI, U.S. Endowment for Forestry and Communities, Wells Fargo
New Ventures	NRC, CT, WS	>100 mm	Alcoa Foundation, ANDE, Citi Foundation, Morgan Stanley, Winrock International, Zennstrom Philanthropies, David and Lucile Packard Foundation
Northern Rockies Loan Fund	NRC	14 mm	David and Lucile Packard Foundation, Gordon and Betty Moore Foundation
Oikocredit USA	CD, FT, ED, NRC, SA, SMBD, MF	26-50 mm	small private investors, Grameen Foundation
Renewal Funds	FT, SA, CT, MTM	35 mm	Has a trust established with 16 investors
Root Capital	CT, FT, NRC, SA, SMBD	51-100 mm	General Mills, Green Mountain Coffee, Starbucks, Pier1 Imports, and Whole Foods Market
RSF Social Finance	HW, FT, ED, NRC, SA	>100 mm	Not indicated
Sea Change Management, LLC	SF, NRC	unknown	David and Lucile Packard Foundation
Small Enterprise Assistance Funds	CT, HW, NRC, MTM, SA, SMBD	>100 mm	Baltic American Enterprise Fund, BIO, Black sea trade and development bank, calvert, cofide, DEG, european bank, EKD, FMO, FinnFund, Ford Foundation, AFP Gorizonte, AFT Integra, Internation Finance Corporation, Kazak National Innovation Fund, kotak, LIC, Merifin Capital, Millenium Challenge Corporation, New York Life, Norfund, Omidyar Network, OPIC, Porvenir, PoundCapital, Prima AFP, Sarona, Sidbi, Swedfund, Swiss investment fund for eerging markets, Syndicate Bank, Rockefeller Foundation, USAID, Union Bank
The Lyme Timber Company	NRC	>100 mm	RSF Social Finance (each fund has over 170 LP's)
Verde Ventures	SA, FT, NRC, SMBD	23 mm	Gordon and Betty Moore Foundation, L'Agence Française de Développement (AFD), Fonds Français pour l'Environnement Mondial (FFEM) (works with AFD), Global Environment Facility (GEF) (part of IFC), International Finance Corporation's Environmental Business Finance Program (EBFP), Overseas Private Investment Corporation (OPIC), Starbucks Coffee Company

The investment focus of the funds was diverse, and many funds had multiple foci. Natural resources and conservation, sustainable agriculture (e.g., coffee, cocoa, organic products), clean technology, and small and medium business development were the most common (Fig. 1). Sustainable fisheries were, perhaps surprisingly, not well represented. The main exception is the California Fisheries Fund. Many of our primary interviews identified fisheries as an opportunity for investment, but also highlighted challenges with measuring environmental impact within the sector.

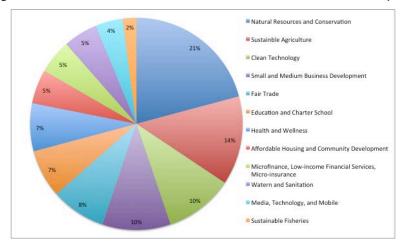


Figure 1. Investment focus of the investment funds assessed in this report.

Many of the funds invested across multiple sectors, including the health and education sectors. Of funds that focused exclusively on the environment, however, many invested in a single sector: agriculture, forestry, ecotourism, land protection, or fisheries.

9. ASSET CLASSES

The environmental funds surveyed used a variety of asset classes, with the most common being debt, absolute return notes, and equity (Fig. 2). Funds commonly used more than one asset class.

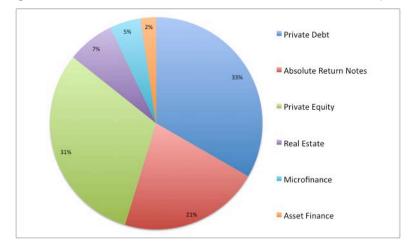


Figure 2. Asset classes of the investment funds assessed in this report.

10. CALIFORNIA FISHERIES FUND

The California Fisheries Fund (CFF) is a project of Environmental Defense Fund. The CFF is a nonprofit revolving loan fund that invests in the fishing industry on the West Coast of the United States. Its mission is to help fishermen, fishing businesses, ports, fishing communities, and nonprofit organizations succeed in fisheries that are focused on environmental conservation, improved profitability for the industry, and stability for port communities. The CFF was launched with \$2 million grant from the California Ocean Protection Council, and has also received matching private funds.

The CFF made their first loan in 2009. Loans range from \$50,000-350,000 on 1-10 year terms. Interest rates vary from 4-8%. Loans are available for,

- Gear purchase or modification,
- Vessel purchases or improvements,
- Fishing permit or quota purchase, and
- Capital equipment upgrades for dockside infrastructure, processing capacity, and transportation.

The CFF has loan eligibly requirements, including alignment with its core values. If eligibility requirements are met, then there is a process that includes as pre-application and application process. It does not provide financing for fisheries certifications. The CFF uses credit history to evaluate financial risk; however, their standards are more lenient than traditional lenders. Risk is also measured qualitatively via interviews and references.

The CFF has focused on groundfish fisheries, which they view as a high impact area. Their current portfolio includes individual commercial fishermen, local seafood markets, and seafood distributors. The CFF views seafood traceability to be a critical area for potential impact.

The California Fisheries Fund Core Values

Healthy Environment: "CFF supports projects that enable the health of the marine environment to be maintained or improved. Fishing related project must operate within fisheries that are managed in a manner that aligns interests of fishing businesses with ocean stewardship."

Examples include activities to reduce bycatch, increase fuel efficiency, investment in fishing gear that reduce habitat impacts, participation in ecosystem monitoring, and business development for sustainable fisheries.

Healthy Local Communities: "CFF supports projects that enable improved profitability of your local and sustainable fishing industry."

Examples include marketing to publicize the economic, social, and conservation benefits of sustainable fisheries, and businesses that provide the traceability and distribution of sustainable seafood.

Source: http://www.californiafisheriesfund.org

The CFF is less concerned about social risk (i.e., lack of social impact) because they explicitly support small-scale fisheries. Environmental risk, however, is present. Documenting environmental impact has been challenging, particularly with small-scale fisheries since less information is often available compared to larger fisheries. Tracking environmental metrics is expensive, difficult, and time consuming. The CFF is investigating potential technology solutions that could aid in environmental impact documentation.

11. BEARTOOTH CAPITAL

Founded in 2005, Beartooth Capital (BC) focuses on land protection and habitat improvement on ranch land in the western United Sates. In particular, they focus on restoring streams and improving agricultural practices. They make a profit through the reselling of the land and conservation easements.

Investors are almost entirely high-net-worth individuals, along with some foundations. BC has over \$70 million under management in two funds, with a current portfolio of 11 properties. Some

ranches have been sold, but BC currently retains 70% of the acres acquired by their original 2006 fund. Investment hold periods vary widely depending on the level of restoration required and the market, but 3-9 years is expected. The financial crisis – the downturn in the real estate market in particular – has impacted BC's operations, forcing them into longer investment periods. Their first fund's interim performance ranks them near the top quartile of 2006 real estate investment funds, and is on track for positive returns in a market that is generally thought to have declined 30-35%.

Beartooth Capital seeks investments that generate a mid-peak return with a low level of risk and a high level of impact. Opportunities are identified in a variety of ways, including relationships with nonprofit organizations (e.g., The Nature Conservancy and Trout Unlimited), appraisers, real estate brokers, accountants, and bankers. Due diligence is conducted on a small percentage (5-10%) of potential investments, and less than 1% become actual investments.

Beartooth Capital works extensively with partners to establish environmental baselines, draf of conservation easements, and conduct restoration work. In some cases, they have been able to secure philanthropic and agency funding in collaboration with partners to conduct restoration activities. All properties are under environmental management plans. Annual monitoring is conducted on properties under conservation easement as well as on specific restoration projects. None of the conservation partners are investors. Beartooth Capital uses a number of certifications, ratings, and standards (see Standards Section).

Interview excerpt with Beartooth Capital's General Partner Carl Palmer (CP) by the Global Impact Investing Network (GIIN).

GIIN: How do you find the properties that you purchase?

CP: When we started doing this work, we thought conservation organizations would bring us great land opportunities. That didn't happen right away. We had to demonstrate our commitment to conservation. Now that we've been doing this for seven years, and we have protected every acre of our properties that a conservation partner has deemed a top priority, we see a tremendous amount of deal flow from conservation organizations because we've demonstrated our commitment to protecting these important places. We're seeing more opportunities from our conservation partners and higher priority properties all the time. That is really gratifying because it is emblematic of both the relationships we've been fortunate to build with our conservation partners and the important role we can play for them.

GIIN: What is your process for evaluating and preserving the environmental value of a property?

CP: When we think a property might be an interesting prospect for us, we sit down with our local conservation partners to determine whether the property is a high conservation priority, to assess the opportunities for restoration, and to define our goals in terms of what needs to be restored and protected. Not every acre of every property needs to be managed or preserved by a conservation organization or a government agency. When there is a high-priority portion of a property that would be at risk if we sold it without protections, we work with our partners to craft a conservation easement that will permanently protect it, or to negotiate the sale of this important property to a conservation group or agency.

Source: http://www.thegiin.org/cgi-bin/iowa/resources/spotlight/79.html

12. VERDE VENTURES

Verde Ventures is an investment fund that is part of Conservation International. They specialize in debt financing of projects promoting biodiversity conservation and local employment. The fund was started with a \$1 million investment from the International Finance Corporation (Ana Lopez, personal communication). As of December 2013, Verde Ventures had invested over \$23 million in 51 companies in 14 countries. Eighty percent of their investments are in coffee operations.

Verde Ventures uses a three-tier system to screen and monitor projects. The initial tier is part of the screening process, where 40-50 general indicators are applied to all potential projects. The fund focuses on areas of high biodiversity interest where they can deploy debt into small and medium sized businesses. Verde Ventures source potential investments from internal research and recommendations from their network. Many investments come from client referrals and follow-up projects with existing clients. The second tier is based on IRIS metrics, which are applied to screened projects. The third tier consists of customized metrics, which is the most resource intensive. Customized metrics include spatial mapping of project locations and biological and ecosystem assessments. Verde Ventures realized heavily on IBAT (Integrated Tool for Biodiversity Assessment) to help support decision-making (IBAT for Business 2013). Local third-party partners also assist in onsite project assessments.

Social and environmental risk is assessed qualitatively; most of the process is based on informed judgment calls and the client's past performance. Verde Ventures does not use benchmarks or hurdle rates² when initially assessing investments. Financial returns vary by project. Verde Ventures has exceeded its five-year financial target.

Projects are monitored over the life of the investment. Much of the impact reporting relies on annual self-reporting by the clients. Impact evaluation is project-dependent. When funding is available, detailed impact assessments are conducted, that include household surveys and environmental monitoring. For investments under five years, environmental impacts have been challenging to assess. In response, Verde Ventures attempts to return to project sites after 10 years to assess impact, if baseline data is available. Social returns have been easier to assess.

Verde Ventures is currently working KfW and Starbucks to establish a second fund (Verde Ventures 2) with a capitalization goal of \$100 million. The fund will invest in small- and medium-sized enterprises and producer groups in Latin American and Africa. The fund will be GIIRS rated.

13. PLATFORMS

Online platforms are a desirable place for many accredited investors to find impact investment opportunities. For example, Mission Markets has 370 accredited investors, 75 percent of which are endowments and 25 percent are private investors (M. VanPatten, personal communication). Mission Markets uses the Global Impact Investing Ratting System (GIIRS) to help rate its potential investments, and relies largely on third-party metrics to assess the environmental and social impact of the investments listed on their exchange. Investments must have a rating by a recognized third party sustainability metric in order to register on the Mission Markets exchange. Metrics are chosen based on the sector that the company is operating. For example, a microfinance company could use Micro Credit Rating International, Ltd. or Planet Rating, while a renewable energy project could use Green E. Notably, Mission Markets has had two biodiversity-focused investments on its platform:

² A hurdle rate, or minimum acceptable rate of return, is the minimum rate of return on a project a company (or investor) is willing to accept before starting a project, given its risk and the opportunity cost of forgoing other projects.

one on wetland mitigation and another focused on conservation banks. Both have had trouble attracting investor interest.

14. RECOMMENDATIONS

FOCUS ON ONE SECTOR, AT LEAST FOR THE FIRST FUND

In our primary research, both the California Fisheries Fund and Beartooth Capital emphasized how they are still figuring out how to operate effectively within a single sector and that it would be impossible for them to be successful if they were investing in different sectors because of the vast differences in knowledge that is needed. It may be most strategic to select an area of impact that is a core competency and focus on creating social or environmental impact within that sector. Operating in multiple sectors would require additional staff with experts for each sector, which would increase costs and does not take advantage of economies of scale.

ASSESS THE MARKET

Prior to entering any sector, a complete market assessment is critical. This includes doing a complete assessment of the political, social, financial, and environmental conditions in the chosen sector and basing entry decisions on the results.

PATIENCE AND MARKET TIMING IS IMPORTANT

Market timing can heavily influence a fund's performance, and can demand patience from fund managers. For example, Beartooth Capital has not sold 70% of its land purchases where restoration activities have been completed (C. Palmer, personal communication). Patience is applicable across the impact investing sector, which has been often referred to as "slow money." Social or environmental entrepreneurs may not always grow more slowly, but the combination of new business styles and an underdeveloped demand means that an investor exit horizon may extend from 3-5 to 7-10 years (Kennedy 2013). This longer horizon, especially with respect to social and environmental returns, requires explicit timelines built into action plans and solid working relationships with investments.

SEEK PRELIMINARY FUNDING THROUGH GRANTS

Starting and running a fund requires a large capital commitment; philanthropic grant money can reduce this burden. Unlike investments from LPs that require a potential return, grants could be used to conduct due diligence, establish environmental baselines, and document impacts without raising fund costs. If structured properly, they could also be used to fund projects. An important consideration for investors is that fund returns are not coming from future investors, so when using grants the fund needs to guarantee that returns come from project revenues and not grant funds.

STANDARDS & RATINGS

15. PURPOSE

We conducted a review of standards and ratings in the impact investment sector. In particular, we focused on standards and ratings related to environmental impacts. Standards are used to evaluate impact internally and convey social and environmental returns to investors. Benefits of adopting standards include (1) increased accountability and focus in meeting impact objectives set by a portfolio, which can then be communicated to investors, (2) ability to report on impacts to prospective investors, and (3) enable investors to compare the actual impact of funds. We assess the standards and ratings used by the 23 funds assessed in this report, along with analyzing how the three focus funds (Beartooth Capital, California Fisheries Fund, and Verde Ventures) integrate standards, ratings, and certifications into their operations.

16. COMMON STANDARDS & RATINGS

While less than decade old, impact measurement is one of the most active areas in impact investing (Emerson 2012; Jackson & Harji 2012). A number of initiatives have accelerated in recent years with the goal of providing common tools to measure impact. The emerging standards and ratings are IRIS (Impact Reporting and Investment Standards) and GIIRS (Global Impact Investing Rating System).

IRIS has broad applicability for investors, enterprises, and intermediaries. Founded in 2008, IRIS provides a standardized taxonomy and metrics for social, environmental and financial performance. The IRIS initiative continues to refine its standards, along with promoting the adoption and building a database on performance data. IRIS co-exists with other measurement initiatives in order to provide industry stakeholders with a common language for output indicators. Initial standards were launched in 2009, with a revised version released in 2010. The IRIS data repository facilitates integration of data from funds and industry networks, which allows for sector-specific trend analyses (GIIN & IRIS 2011). IRIS was developed by the Rockefeller Foundation, the Acumen Fund and B Lab, with support from Hitachi, Deloitte, PricewaterhouseCoopers and USAID. The Global Impact Investing Network (GIIN) became the institutional home for IRIS in late 2009.

GIIRS is an investor-focused tool. Developed 2010 and launched in 2011, GIIRS conducts third-party assessments of the social and environmental impact of both companies and funds. Using indicators guided by IRIS standards, the GIIRS assesses companies and funds on four performance areas: governance, workers, community, and environment. The assessments and ratings are intended to be comprehensive, comparable, and complementary across sectors, regions and organizational sizes. Currently, there is over \$2 billion in capital participating in the GIIRS in over 30 countries (Jackson & Harji 2012).

In addition to standards and ratings, B corporation (B Corp) certification is becoming increasingly common in the private sector (B Corporation 2013). B Corp broadens performance measurement beyond the investor and focuses on business-side efforts. Certified by the nonprofit B Lab, B Corp certification for businesses is akin to organic certification for food products. To become certified, businesses must complete an initial assessment and meet performance requirements, meet certain

legal requirements, sign the B Corp Declaration of Interdependence, and pay a certification fee. Currently, there are over 600 certified B Corps in 15 countries and 60 industries. B Corp certification is respected in the private sector and appeals to impact investors (M. VanPatten, personal communication). Other certifications are common in the environmental sector (e.g., Marine Stewardship Council, Forest Stewardship Council, Rainforest Alliance). Certifications are not covered in this report. Evidence that certification leads to environmental or social benefits, however, is currently limited (Blackman & Rivera 2011).

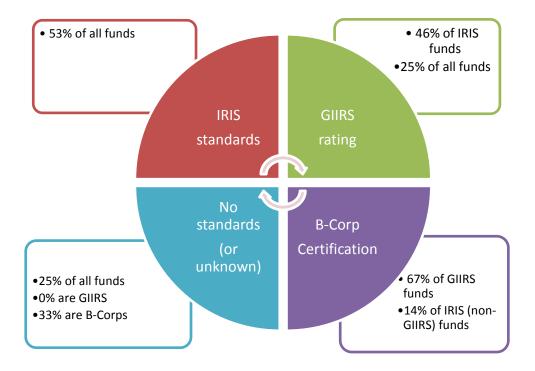
IRIS is the dominant standard in the impact investing sector, and the only one that includes some environmental metrics (Table 5). The Aspen Network has developed standard that also includes environmental metrics, but it is largely based on IRIS standards. IRIS facilitates side-by-side comparisons of ventures or funds; however, only if organizations chose to adopt the same metrics. The IRIS provides a suite of metrics that a venture or fund can choose to adopt. This includes cross-sector and sector-specific metrics.

Table 5. Characteristics of dominate impact standards and ratings. Standards and ratings that are exclusively social are included for comparison.

	IRIS (Impact Reporting and Investment Standards)	ANDE (Aspen Network of Development Entrepreneurs)	GIIRS (Global Impact Investing Ratings System)	ILO (International Labor Organization)	M-CRIL (Micro Credit Rating International Ltd.)
Туре	Environmental and Social Standard	Environmental and Social Standard	Environmental and Social Rating	Social Standard	Social Rating
Organization	Non-profit that provides a set of standardized metrics that can be used to describe an organization's social, environmental, and financial performance.	Entrepreneurs can communicate impacts to investors through standards; encourages knowledge-sharing with other investors. Focus is on emerging economies.	Non-profit, third-party rating organization, uses IRIS standards and definitions.	UN agency that sets international labor standards.	Company that provides social and financial ratings for microfinance organizations.
Sector(s)	Developed and emerging market companies; small to medium sized funds	Emerging markets in developing countries; includes social and environmental companies	Developed and emerging market companies; small to medium sized funds	Labor standards for workplace settings	Microfinance sector
Qualitative- Quantitative Impact	Both	Quantitative	Both	Both	Both
Users	Investors in funds, direct investors, companies, and member organizations	Members of the Aspen network	46 Funds, 350 Companies	Governments that have ratified an ILO Convention	Over 1,200 entities, including World Bank, Asian Development Bank, and FAO
Risk Measurement	Minimal, partially accounted for in financial metrics	No	No	N/A	Measures financial risk, does not measure social risk.
Background Metrics	Varies (and selected) by project or venture	Five core metrics (including greenhouse gas emissions), 3 impact metrics (social), and sector specific indicators	IRIS	Varies by project or venture	Social rating (uses MDG goals to assess processes and outputs); financial rating (standard credit rating)
Pre-assessment	Not applicable	N/A	Self-reported data is reviewed by a third-party to produce rating.	Assists in creating plan to implement labor standards.	Pre-assessment with recommendations
Post-assessment	Not applicable	Publishes annual impact report.	10% of companies are audited annually.	Requires governments that have ratified a ILO convention to submit biannual reports.	Yes
Reporting Framework	Organization description; product description; financial performance; operational impact; product impact; glossary	N/A	Simple rating; detailed rating; key performance indicators; intra-sector fund/company comparison	Not applicable	Rating score; rating breakdown; synopsis and summary; strengths and weaknesses; results and outputs

While the funds we assessed used a mix of standards and ratings, there were some commonalities. IRIS was the most common standard used: over 50 percent of the funds used IRIS, and many used IRIS in combination with other metrics, such as those developed by the Aspen Network of Development Entrepreneurs (ANDE) or custom metrics (Fig. 5). Of the funds that use IRIS standards, 46 % were GIIRS-rated. Of the funds that were not GIIRS-rated but use IRIS, 14% were certified B Corporations.

Figure 5. Percentage of funds used that use IRIS standards, were GIIRS rated, and B Corps certified.



While, IRIS and GIIRS have emerged as the leading models to inform impact, there is still a lack of consensus on approaches and standards of measuring outputs and outcomes (Jackson & Harji 2012; Bugg-Levine & Emerson 2013). New tools are becoming available, including software such as Pulse and SROI (Social Return on Investment). Developed by the Acumen Fund, Pulse is a software platform that tracks financial, operational, social and environmental metrics to estimate impact (Pulse 2013). It adheres to IRIS and GIIRS standards, and features a range of qualitative reporting to complement quantitative performance management data. SROI, run by the SROI network, also provides a tool to measure social impact (SRIO Network 2013).

17. FOCUS FUNDS

Beartooth Capital and Verde Ventures use IRIS standards combined with custom-developed metrics (Table 6). Custom standards were developed with partners, and used for internal purposes. The California Fisheries Fund does not use any third-party standards. With a small staff, the Fund does not have the current capacity to adopt standards (P. Higgins, personal communication). Further, IRIS currently does not have any metrics focused on sustainable fisheries. Verde Ventures is GIIRS rated, while Beartooth Capital is B Corp certified. Many of Verde Ventures investments are certified (e.g., Organic, Rainforest Alliance, Fair Trade), but it is not an investment requirement (N. Inamdar, personal communication). Verde Ventures prioritizes projects that overlap geographically with species listed under International Union for Conservation of Nature (IUCN) criteria, but the potential environmental benefits are not tracked or documented. Figure 6 provides the IRIS metrics that Beartooth Capital has adopted, which is made publically available by IRIS.

Table 6. Standards, ratings, and certifications used by three investment funds focused on the environment.

Fund	Beartooth Capital	California Fisheries Fund	Verde Ventures
Primary Focus	Land Conservation	Sustainable Fisheries	Sustainable Agriculture
Environmental Standards	IRIS + custom metrics	Custom metrics	IRIS + custom metrics
Social Standards	IRIS	Custom metrics	IRIS
Ratings	None	None	GIIRS
Certifications	B Corp	None	
Environmental Monitoring	Easements: annual Restoration: variable	Leverages required observer programs	Relies heavily on screening, some monitoring
Additional Priorities	At-risk species habitat	Certain fisheries (e.g., groundfish)	IUCN-listed species

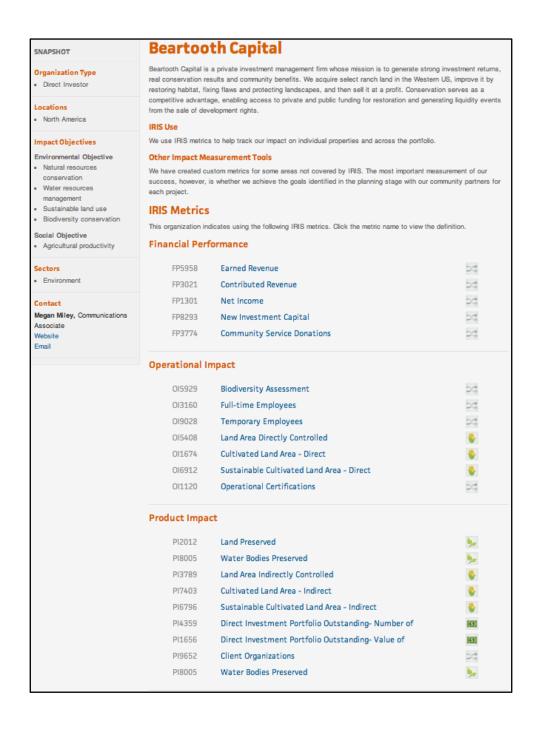
18. STANDARD & RATING LIMITATIONS FOR THE ENVIRONMENT

Current environmental metrics and standards are limiting. While IRIS is undertaking a process to revise and improve its environmental metrics, custom-based metrics are likely essential for a BCVF that is explicitly focused on an environmental impact-first fund. IRIS's current environmental metrics lack the precision and detail to be used alone to confidently document environmental impact of a BCVF (Table 7).

Table 7. IRIS's environmental quality & performance metrics for organizations in the environment, energy, and waste sectors (version 2.2).

Metric	Definition	Reporting Format
Lifetime Greenhouse Gas Emissions of Product	Greenhouse gas emissions of the product during the product lifetime.	Number of metric tonnes of CO2 equivalent
Greenhouse Gas Emissions for Product Replaced	Greenhouse gas emissions that would have been produced by the product replaced during the lifetime of the organizations product.	Number of metric tonnes of CO2 equivalent
Greenhouse Gas Offset/Mitigated	Greenhouse gas offset/mitigated during the reporting period by replacing traditional generation with renewable, modern, or more efficient power generation/use measured in metric tonnes of CO2 equivalents. Calculations should be made leveraging Clean Development Mechanism (CDM) guidelines/methodologies to the extent possible.	Number of metric tonnes of CO2 equivalent
Hazardous Waste Avoided	Hazardous waste avoided based on refurbishing/reusing/recycling, during the reporting period.	Number of kilograms
Non-hazardous Waste Avoided	Solid waste disposal avoided based on refurbishing/reusing/recycling, during the reporting period.	Number of kilograms
Trees Planted	Hectares of trees planted during the reporting period.	Number of hectares
Trees Planted: Native Species	Hectares of native species planted during the reporting period.	Number of hectares
Land Reforested	Hectares of land that have been reforested during the reporting period.	Number of hectares
Land Preserved	Hectares of land designated as a strict nature reserve.	Number of hectares
High Conservation Value Forests Preserved	Hectares of High Conservation Value Forests protected.	Number of hectares
Water Bodies Preserved	Length of streams and water bodies protected.	Number of kilometers
Coastlines Preserved	Length of coastlines protected through the establishment of conservation areas. Such coastlines include stream or river banks and coastlines along water bodies.	Number of kilometers

Figure 6. Snapshot from the IRIS Registry showing the IRIS metrics used by Beartooth Capital. The Fund also uses custom metrics not covered by IRIS.



19. RECOMMENDATIONS

USE IRIS METRICS IN COMBINATION WITH CUSTOM-DESIGNED BIODIVERSITY METRICS

Environmental standards for impact investments are still underdeveloped compared to social standards. Nonetheless, IRIS has become the standard in the impact-investing sector, and thus it should be adopted in order to attract investment. However, more precise and accurate metrics are necessary to measure and document environmental impacts, particular for a fund whose priority is high-impact biodiversity conservation ventures.

BASELINE ESTABLISHMENT AND MONITORING IS ESSENTIAL

While often difficult, establishing environmental baselines is critical for measuring impact. Methodologies for baselines and monitoring will depend on the local conditions of the project or venture, along with the specific environmental goals of the BCVF. Since environmental monitoring is often expensive and requires specific expertise, partnerships are likely to be important. Partnerships also provide the opportunity for cost sharing, co-financing, and third party verification or assessment.

20. PURPOSE

Investors are typically concerned with the tradeoff between risk and return in their investments. Integrating social and environmental returns into an investment creates additional risk such as the risk, which can discourage investors. While no standard assessment for impact investing risk exists, we review the common types of risk that should be reduced. This review is not inclusive; rather, it highlights some common risks in impact investments. The review is intended for those lacking a financial background. Risk assessment will be a critical component of any BCVF.

21. TYPES OF RISK

LIQUIDITY RISK

Liquidity risk can broken down into market liquidity and funding liquidity. Market liquidity is the ability to sell a product on the market at a price that meets or exceeds the cost. Funding liquidity is the ability to pay for the costs of running a project or fund, including any contingency costs (Emerson 2012; Bugg-Levine & Emerson 2013). The infancy of the impact investing market, environmental investments in particular, make it especially vulnerable to illiquidity since demand is generally low for these investments (O'Donohoe et al. 2010). This is likely one of the reasons commodities such as cocoa and coffee are common as environmental investments: demand for these products is high and stable (Lewin et al. 2004; Geyman & Sarfo 2012).

Liquidity Risk commonly arises from failure to consider funding for a) contingency plans for emergency or unexpected situations, b) ongoing liquidity (e.g., how much of the portfolio is tied up in projects), and c) necessary components for project implementation and maintenance, such as monitoring, legal services, and documentation (G. Thoumi, personal communication).

IMPACT RISK

Impact risk refers to the probability an investment will not achieve the desired social and environmental outcomes (Global Impact Investing Network 2011; Bugg-Levine & Emerson 2013). This also includes the probability of an investment resulting in unexpected or undesirable negative outcomes. For example, it is not uncommon for projects with socio-economic goals to result in environmental degradation or projects with biodiversity conservation goals to result in negative social outcomes (Hicks et al. 2008; Springer 2009). An integrated environmental, social, and governance (ESG) risk assessment provides a framework for assessing impact risk. Within traditional sectors, investors are increasingly focused on and requiring ESG screenings. Recent work by World Wildlife Fund for Nature and Environmarket provides an example on providing investor guidance and ESG screenings to support the development of a sustainable palm oil industry (Grayson & Stampe 2012).

MEASUREMENT AND REPORTING RISK

Intimately related to impact risk, is the risk that the monitoring of desired benefits is inadequate or incorrect. Monitoring and reporting costs are generally high, and these costs are often the first to be

cut from a budget, particularly in the environmental sector where outcomes are often not tracked (Ferraro & Pattanayak 2006). Further, capacity and expertise for proper auditing and verification can be scarce. Errors in measurement and reporting can not only influence the social and environmental outcomes, they can also impact financial performance. For example, a sustainable forestry project in South America was relying on one monitoring program to determine the minimum number of trees to remain standing to provide habitat and carbon sequestration. After operating at a loss for several years, program managers reevaluated the monitoring program and determined that the minimum number of trees was overestimated by one-third. The revised program resulted in increased financial returns (G. Thoumi, personal communication).

FUND MANAGER AND MISSION-DRIFT RISK

Fund manager risk is the risk that the fund manager underperforms with respect to the financial, environmental, and social goals of the fund. This type of risk was highlighted as important and underappreciated throughout our primary research, largely due to nascent state impact investing and environmental investments in particular. Impact investing fund mangers do not have long track records, turnover of staff is common, and portfolios have smaller asset bases. All of these factors contribute to investors' risk assessment (Global Impact Investing Network 2011; Emerson 2012). Related is the risk that fund managers invest in projects that are outside the fund's mandate or without the consent of the investors. This often happens because those investments have higher financial, social, or environmental returns than current portfolio projects (Pricewaterhouse Coopers 2008). This type of risk is can be particularly problematic when fund managers attempt to scale up or change their investment strategy to ensure investors receive expected financial returns, while minimizing social and environmental impacts.

SUBORDINATE CAPITAL RISK

Subordinate capital risk can arise when additional funding other than investments is used to fund projects or ventures. This is a complicated issue that could result in either positive or negative outcomes, depending on how the additional funding is structured. Investors could be concerned that investment returns are a result of philanthropic dollars (e.g., grants) as opposed to project performance (O'Donohoe et al. 2010). Creating a framework where additional, non-investment funding for an environmental fund is not viewed as an unsustainable subsidy is an important consideration. This is particularly the case for any environmental funds, since the majority of current support is from foundations (see Marketplace Assessment Section).

LEGAL, REGULATORY, AND POLITICAL RISK

Legal, regulatory, and political risk involve the ability of a project or venture to continue in absence of political, social, or regulatory interference. This is an important consideration for certain types of environmental projects or ventures, particularly in countries or regions where there is a lack of governance, contract law, and regulation (Pricewaterhouse Coopers 2008). This risk can operate at different levels: local, regional, or national.

22. RECOMMENDATIONS

USE COMMON PRACTICES FOUND IN TRADITIONAL INVESTING

Because practices and standards differ between the investment and the environmental sector, managing a fund under investment best practices will help reduce risk and subsequently attract more investment (O'Donohoe et al. 2010). A formal and explicit risk assessment should be at the center of a BCVF (Pricewaterhouse Coopers 2008).

INSURANCE MAY A SIMPLE WAY TO REDUCE RISK

Several types of risk can be reduced through insurance. Insurance instruments can be particular important for funds operating internationally, particularly in scenarios with minimal governance, contract law, and regulatory oversight. Insurance could also act as a potential differentiator for a fund from others available in the market (G. Thoumi, personal communication). Political Risk Insurance is protection against politically motivated violence and foreign government interference with projects and ventures. The Overseas Private Investment Corporation offers insurance for companies investing in international funds and invests in funds working in developing nations (OPIC, 2013). Errors and Omissions insurance (Professional Liability Insurance) protects fund managers from being legal suits in the event that some type of risk is not accounted for in an investment. Many types of custom insurance are now available, and options should be assessed at the appropriate time.

METHODS

SECONDARY RESEARCH

Our methods relied heavily on the peer-reviewed literature, along with the grey literature and Internet resources focused on impact investing. For the marketplace assessment, we relied on Impact Assets and its "top 50" list of impact funds which represent an array of regions, sectors, and asset class types (Impact Assets 2013). We supplemented our screening with additional relative funds identified by contacts and primary research.

We screened these funds based on the following criteria:

- The fund asset class included private debt or private equity,
- The fund's assets was at least \$US2 million,
- The fund was designed so that the assets were recoverable (i.e., for-profit),
- The fund expressed an explicit commitment to an environmental impact.

On investment fund structure, our main sources of information come form the literature, particularly related to impact investing funds using the limited partnership structure. We also relied on interview and financial reporting requirements established by the U.S. GAAP (Generally Accepted Accounting Practices) and IFRS (International Financial Reporting Standards).

PRIMARY RESEARCH

Interviewees were selected to represent different sectors and perspectives that involve impact investing and biodiversity conservation. Interviews were focused on gaining insights into how funds (or ventures) evaluate projects, manage risk, and measure social and environmental impacts. We conducted in-depth interviews with the following people,

- Curan Bonham, Conservation International's Verde Ventures;
- Phoebe Higgins, California Fisheries Fund;
- Neel Inamdar, Conservation International's Verde Ventures;
- Carl Palmer, Beartooth Capital;
- Matt Rodosky, Booth School of Business, University of Chicago;
- Alfredo Sfeir-Camarena, Shell Catch, Inc.;
- Ann Marie Steffa, Fondo Accion;
- Gabriel Thoumi, Investment Management Consultant;
- Drew Tulchin, Social Enterprise Associates;
- Mike Van Patten, Mission Markets, LLC.; and
- Ray Vicurine, Wildlife Conservation Society

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