



Beneficial Returns

Loans for Social Enterprises in Emerging Markets

CREDIT MEMO:

**Buen Manejo del Campo S.A. de C.V.
Dba Sistema Bio**

Date: March 27, 2018
From: Ted Levinson
Re: \$100,000 Working Capital Loan

Borrower:	Buen Manejo del Campo S.A. de C.V., a Mexican company
Total BR Commitment Limit:	\$100,000
Structure & Tenor:	TBD
Interest Rate:	10.00% p.a.
Fees:	Origination: 1% of \$100,000 (\$1,000)
Repayment Source:	Primary – Cash from Operations Secondary – Liquidation of Collateral

Summary of Request:

Sistema Bio is seeking a working capital loan to manage the timing gap between when it buys materials and when it is paid for delivered, installed biodigesters.

Company History and Background

Sistema Bio was started in Mexico in 2010 to commercialize a patented, modular, biodigester designed for small dairy farms. From 2010 until 2015 the company sold exclusively to farmers in Mexico. In 2016 the company opened an office in Nicaragua and initiated international distribution (100% prepaid by distributors) to India and West Africa. In 2017 the company opened wholly-owned subsidiaries in Kenya and Colombia and initiated sales in India.

Anaerobic digestion is a biological process in which naturally occurring microorganisms break down organic waste (manure and/or food waste) in an oxygen-free environment. The process generates biogas (primarily methane) and digestate.

With simple processing the methane can be used as a cooking fuel, to generate electricity and heat or to power engines. Digestate is a wet mixture that is usually separated into a solid and a liquid. Digestate is rich in nutrients and can be used as fertilizer for crops. Digestate can be directly land applied and incorporated into soils to improve soil health and promote plant growth. Digestate reduces soil erosion and nutrient runoff, alleviates soil compaction and increases soil's water retention abilities.

Additionally, treating farm waste with biodigesters reduces methane emissions from manure lagoons, preserves the health of waterways, and minimizes pathogens which, in turn, leads to better human health.

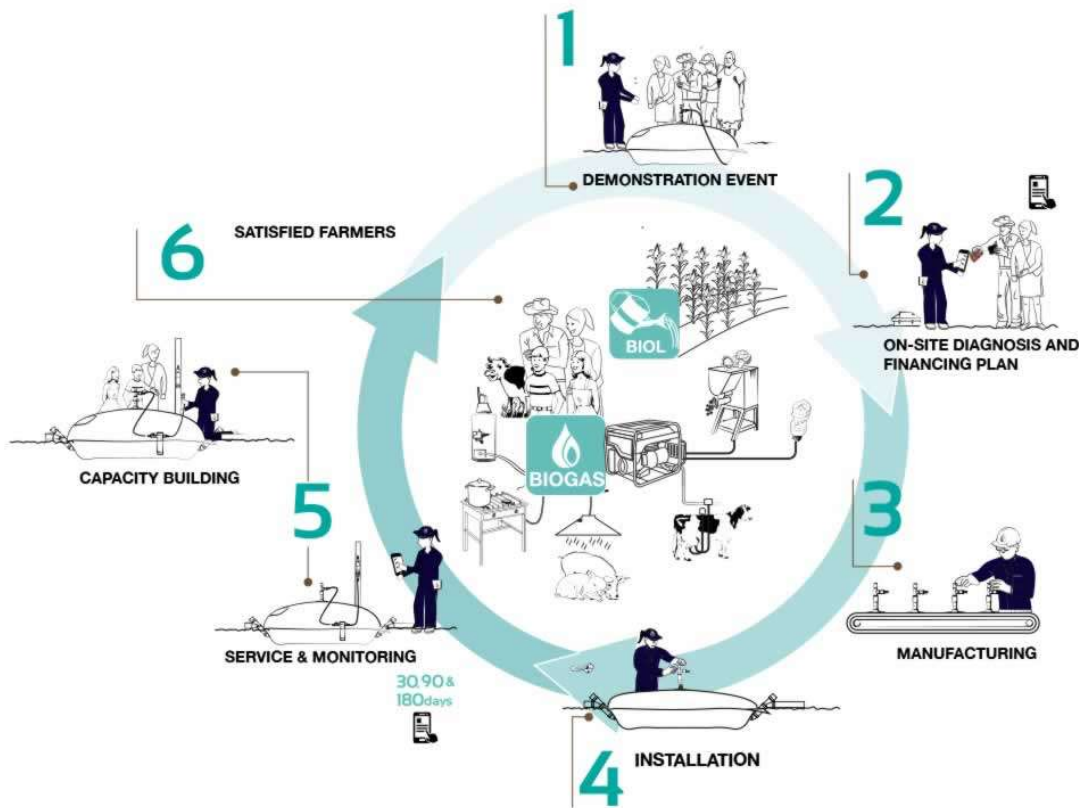
Business Description

Sistema Bio combines a high-quality biodigester with installation, training, maintenance and financing to meet the needs and preferences of its poor customers. Sistema Bio sells models designed for farms with five cows or twenty pigs (generally two hectares or smaller and \$2,500 of annual revenue in Mexico) up to 200 cows. Smaller systems sell for \$600 - \$2,000 while larger systems cost up to \$20,000. Most farmers see an ROI of under 20 months. The farmers spend less on cooking gas, less on fertilizer, and no longer need to harvest wood for fuel.

All systems are built in Toluca, Mexico, 40 miles from Mexico City at the Ecoplating factory. Ecoplating is a Mexican metal finishing company and partial owner of Sistema Bio. In addition to its headquarters in Mexico City, Sistema maintains three field offices in Mexico (Jalisco, Puebla and Yucatan) as well as offices in Nicaragua, Colombia and Kenya. The Company has independent contractors in India who may become permanent employees at a later date; they work from home.

The biodigesters are made out of geomembrane purchased from Solmax, a Quebec private company. Sistema purchases in \$50,000 USD orders and pays 50% upon order and the balance

before shipment. For 2018 Sistema expects to spend \$800,000 - \$900,000 with Solmax. Solmax does not offer volume discounts.



Sistema Bio sells through its own agents as well as independent representatives who earn a commission for each unit sold. In most cases, Sistema will identify an influential and well-respected farmer within a community and offer him incentives to become a Sistema Bio client. Then, Sistema hosts demonstration events for local farmers where they can observe a biodigester at work. In certain areas biodigesters are subsidized by the government or by philanthropy.

Nearly all customers finance their purchase with a loan arranged by Sistema and funded by Kiva. In Kenya Sistema takes deposits from customers equal to 10% of the purchase prices, collects an additional 10% at installation, then is paid by Kiva thirty days after installation.

Despite the healthy gross margins (60%), Sistema has a \$70 cash flow shortage for 5-6 months for every one of its most basic biodigesters sold in Kenya. The table below summarizes the cash flows for a \$600 unit sold in Kenya.

	JAN	FEB	MARCH	APRIL	MAY	JUNE	JULY	AUGUST	TOTAL
Activity	<i>collect deposit & pay Solmax</i>	<i>receive membrane</i>	<i>manufacture</i>	<i>ship</i>	<i>ship</i>	<i>ship</i>	<i>install</i>	<i>get paid by Kiva</i>	
Cash In		\$60					\$60	\$480	\$600
Cash Out		(\$120)		(\$40)	(\$30)		(\$39)		(\$229)

A \$100,000 working capital loan would be sufficient to finance working capital needs for more than 1,000 units and the interest cost could comfortably be absorbed by the company.

Sistema's active shareholders are CEO Alex Eaton and COO Camilo Pages. Lennart Grebelius is a Swedish textile and real estate entrepreneur who has been an active impact investor and supporter of Ashoka. Factor e is a seed-stage investor in energy companies in the developing world. In addition to being an investor, Ecoplating is a vendor for Sistema Bio, handling the manufacturing of all biodigesters.

CAPITALIZATION TABLE	
Alex Eaton	24.8%
Camilo Pages de Rosenzweig	24.8%
Lennart Grebelius	23.6%
Factor - e Ventures	10.1%
Ecoplating	8.0%
Ilan Dvek	2.4%
Employee Option Pool	6.3%

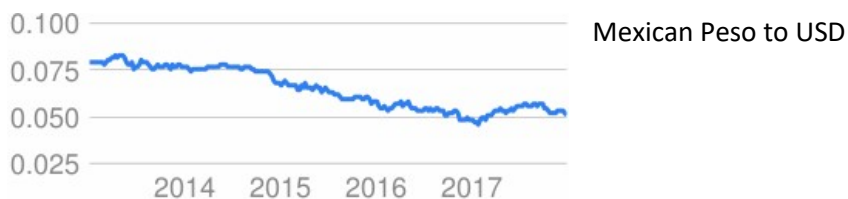
Conflict of Interest

None. The credit is being considered on its own merits.

Country Analysis

Mexico ranked #49th (out of 190 countries) for ease of doing business and 41st for enforcement of contracts. The Political Risks Services Group rated Mexico slightly above the global average in its Political Risk Index, on par with Portugal and Kuwait.

In the past five years the Mexican peso has ranged in value from 12.7 to the US dollar (5 years ago) to 22 to the dollar (December, 2017.) It currently trades at 18.8 to the dollar. The trend for the past 5+ years has been a steady erosion in the value of the peso vs. the US Dollar. A strengthening dollar makes the raw material for the biodigesters more expensive and raises Sistema's effective borrowing costs for this loan. The margins on the biodigesters are high enough to absorb substantial peso devaluation. A 20% reduction in the value of the peso would be equivalent to increasing the monthly Beneficial Returns loan payment by \$170 – a modest amount for Sistema to absorb.

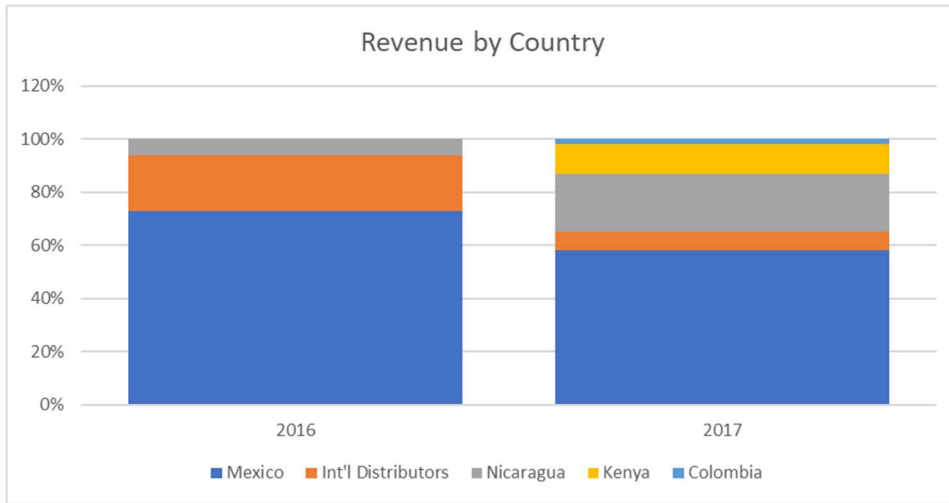


Financial Analysis

Income Statement & Analysis

<i>in \$'000s USD</i>	2017		2016		2015		2014	
	<i>Internal</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	
Sales	\$ 1,301	\$ 1,250	\$ 933	\$ 1,018				
Grant Income	\$ 1,123	\$ 5	\$ 138	\$ 52				
TOTAL REVENUE	\$ 2,424	\$ 1,255	\$ 1,071	\$ 1,071				
COGS	\$ 498	\$ 372	\$ 287	\$ 422				
Gross Profit	\$ 1,926	\$ 883	\$ 785	\$ 648				
G&A	\$ 1,437	\$ 867	\$ 567	\$ 463				
FX (gain) loss	\$ (9)	\$ (19)	\$ 15	\$ 10				
Depreciation	\$ 77	\$ 29	\$ 27	\$ 14				
Interest Expense	\$ 27	\$ 5	\$ 6	\$ -				
Income Tax	\$ 63	\$ 6	\$ -	\$ -				
Other Expense	\$ 449	\$ -	\$ 2	\$ 4				
Net Income (Loss)	\$ (55)	\$ (5)	\$ 168	\$ 157				
EBITDA	\$ 112	\$ 29	\$ 201	\$ 171				

- Sales are growing and gross margins are at 60%+
- Expansion to Kenya in 2017 was supported by a major grant from Shell Foundation
- Expansion to India was supported by a 60 biodigester purchase in 2016 from Tata Trusts for heavily subsidized installations (considered distributor purchase in the graph below)
- Company has shown positive EBITDA since 2014



Balance Sheet & Analysis

<i>in 000's USD</i>	2017		2016		2015		2014	
	<i>Internal</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	<i>Audited</i>	
Cash	\$ 271	\$ 351	\$ 402	\$ 308				
Accounts Receivable	\$ 877	\$ 1,207	\$ 711	\$ 416				
Other Current Assets	\$ 827	\$ 137	\$ 20	\$ 18				
Total Current Assets	\$ 1,975	\$ 1,695	\$ 1,133	\$ 742				
PP&E	\$ 328	\$ 101	\$ 47	\$ 58				
Other LT Assets	\$ -	\$ 35	\$ 38	\$ 38				
Total LT Assets	\$ 328	\$ 136	\$ 85	\$ 96				
TOTAL ASSETS	\$ 2,303	\$ 1,831	\$ 1,218	\$ 838				
	\$ -	\$ -	\$ -	\$ -				
Accounts Payable	\$ 250	\$ 273	\$ 274	\$ 415				
CPLTD	\$ 250	\$ -	\$ -	\$ -				
Other Current Liab	\$ -	\$ -	\$ -	\$ -				
Total Current Liab	\$ 500	\$ 301	\$ 320	\$ 454				
Loans	\$ 624	\$ 605	\$ 346	\$ -				
Total LT Liabilities	\$ 624	\$ 605	\$ 346	\$ -				
TOTAL LIABILITIES	\$ 1,124	\$ 906	\$ 666	\$ 454				
EQUITY	\$ 1,179	\$ 925	\$ 552	\$ 384				

- Company has invested heavily in inventory (listed as other current assets) because sales (especially out of Mexico) require a long time to convert to cash
- CPLTD is all owed to Kiva (0% interest and no recourse) and will likely be renewed and possibly increased.
- Strong positive working capital

- Long term liabilities are primarily composed of a Shell Foundation note that will not require any repayment until company achieves \$7.5M in sales or raises \$15M in equity.
- Engie (formerly GDF Suez – a French multinational gas company) investment of approximately \$350,000 is convertible debt and is treated above as equity as conversion is highly likely.

Debt Service Capacity:

	2019	2018	2017	2016
Net Income	1422	-226	-55	-5
+Depreciation	117	88	77	29
+ Interest Exp	271	44	27	5
+Tax	209	28	63	6
EBITDA	2019	-66	112	35
Debt Service				
BR Debt	29	29	29	0
Other CPLTD	0	0	0	0
Total Debt Service	29	29	29	0
Net Cash Flow	1990	-95	83	35
Debt Service Coverage	68.62	-3.28	2.86	n/a

Collateral

The loan would likely be unsecured. We can also explore a structure whereby Beneficial Returns buys the geomembrane from Solmax and sells it Sistema Bio at a 10% markup and with 12 month payment terms. Tax implications will need to be investigated, but this arrangement could avoid withholding taxes in Mexico and legal documentation costs.

Key Risks & Mitigating Factors:

Sistema relies on grant funding to have positive EBITDA

- The Company will receive a final, \$300,000 grant payment in 2018 from Shell. They are a candidate for other grants including a \$1.3M opportunity with Mastercard Foundation and ongoing support from Greater Impact Foundation.
- The Company can have positive EBITDA in 2018 if it secures additional grants of \$70k or more.
- The Company can reduce expenses (especially planned expenses in India) if additional grants do not materialize
- The Company continues to work with Spring Impact (formerly International Centre for Social Franchising) which is assisting with expansion efforts including grant raising.

Sistema has expanded aggressively in 2017 and sales in new regions are still low

- Kenya sales are very strong and are expected to represent the biggest market for Sistema in 2018.

In the event of a default Beneficial Returns would be treated as an unsecured creditor, behind employees and secured creditors for repayment.

- We may be able to negotiate with Solmax to return any materials at a discount, reducing our exposure.

Recommendation based on:

- Seven year business with four year positive EBITDA track record
- Positive financial trends and capable management
- Strong mission fit

Documentation

- TBD

Recommendation

Approval of a \$100,000 working capital term loan to Buen Manejo del Campo SA de CV. by Beneficial Returns, LLC on terms and conditions substantially as presented herein and outlined in the Term Sheet attached.

Recommended By:

Ted Levinson

Founder/CEO

Date