Report

Trade with Developing Countries and Development Assistance

Case Studies on the Link Between Canadian ODA and Bilateral Trade Potential

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Executive Summary

This report explores linkages between Canada's investment in official development assistance (ODA) and Canadian trade with partner developing countries.

Our findings span three case studies of Canadian-led development projects which demonstrate linkages between Canadian ODA and trade interests. The report highlights 'win-win' outcomes for development impact, Canada's international priorities, and future trade and investment diversification:

- 1. Development spending can leverage Canadian expertise in international trade-related best practices, trade regulations, and infrastructure to expand Canada's trade relationships with developing countries.
- 2. Development projects can contribute to market creation, expansion, and economic sustainability through procurement, relationship building, knowledge transfer and exchange, and exposure to new technologies.
- 3. Activities supported by Canadian ODA can provide invaluable knowledge of the local business environment, practices, and partnerships, which benefit Canadian businesses seeking to operate in developing countries. As such, ODA can complement existing Canadian foreign direct investment (FDI) and promote new private investment.
- 4. Strategic linkages between Canadian ODA and Canadian trade are possible and potentially plentiful, but, "win-win" benefits have thus far been more coincidental than purposeful.

Introduction

What are the key linkages between Canada's investment in development (primarily via concessional ODA) and trade opportunities for the Canadian private sector in partner developing countries by way of involvement in or exposure to new sectors, markets, geographies, and business lines?

This report builds on a previous quantitative study conducted by CIDP-the first of its kind in the Canadian context-on the relationship between Canadian ODA and Canada's trade with developing countries. The results point to a positive and statistically significant association between Canada's long-term development investment (1989-2015) and to the competitiveness of Canadian exports to ODA recipient countries. While this association does not suggest causality, it provides the motivation for further exploration through a qualitative case study approach.¹

The following three case studies unpack concrete successes and opportunities for Canadian development investment to promote sustainable growth in developing countries. Our analysis focuses on ways in which Canadian ODA can serve as a 'win-win' for development impact, Canada's international priorities, and future trade and investment diversification. These findings are based on structured interviews conducted by CIDP researchers with Canadian development experts directly involved in the projects covered in the case studies. They provide insights on: trade-related technical assistance and capacity building in Costa Rica (Case 1), renewable energy development for rural electrification in Burkina Faso (Case 2), and residential solar energy usage in Jordan (Case 3).

Case 1: Trade Related Technical Assistance on Food Safety/Animal Health Measures in Costa Rica

This case study focuses on a \$2.2 million² traderelated technical assistance and capacity building (TRTA/CB) project called, "SPS in the Americas," implemented in Costa Rica.³

International sanitary and phytosanitary (SPS) standards can create significant trade barriers for developing countries that lack the technical and regulatory capacity necessary for compliance. From 2006 to 2010, Canadian experts supported Costa Rican officials with adopting regulations and practices that meet international SPS standards for beef and cattle.⁴ This compliance enabled Costa Rica's beef producers to gain greater access to the European market. Canadian ODA– in this case, in the form of agricultural sector TRTA/CB–also indirectly supported Costa Rica's decision to lift the ban on Canadian beef exports by strengthening familiarity and confidence among the two countries.

Country Context: In 2006, Costa Rica had an "undetermined risk status" for bovine spongiform encephalopathy (BSE), as determined by The World Organization for Animal Health (OIE).⁵ In order for Costa Rica's beef exports to enter the European market. Costa Rica needed to show that it satisfied OIE standards for a "controlled BSE risk" or "negligible BSE risk" country.⁶ Focusing on this priority, Canada delivered TRTA/CB activities aimed at improving Costa Rica's access to European markets and improving compliance with international SPS standards.⁷ Costa Rican authorities applied Canadian best practices to demonstrate that its beef products posed a negligible risk of transmitting BSE. In 2011, the OIE recategorized Costa Rica as a "BSE negligible risk" country, which increased the attractiveness of beef exports to EU trading partners.

Canadian Offering: TRTA/CB in Food Safety and Animal Health Regulations

Canadian expertise was well-positioned to offer high quality training to Costa Rica's regulatory authorities. The Canadian red meat and livestock industry boasts of 'world class' standards, testing, and laboratories in the application of food safety and animal health regulations. This technical knowhow, combined with Canada's strong compliance record with trade regulations, made Canada a reliable source of guidance for improving international market access.

Linkages Between Development Investment and Trade

In 2003, Canadian beef exports suffered globally due to the discovery of BSE. Canadian beef exports did not begin to recover until the OIE changed Canada's status to "controlled BSE risk" in 2005, prompting the United States to re-open its border to Canadian beef.⁸ Increased Canadian beef exports to Costa Rica were not a direct expected result of the "SPS in the Americas" project. However, Costa Rica re-opened its market to Canadian beef in 2011 for the first time in eight years. Through study tours of Canadian facilities and working with Canadian experts on BSE safeguards, Costa Rican authorities developed familiarity, trust, and confidence in Canadian standards. Further, Costa Rican officials learned that Canadian beef was not a threat to their domestic beef industry because imported beef products targeted higher-quality segments of the consumer market.⁹

Other concurrent Canadian initiatives also contributed to Costa Rica's increased openness to Canadian beef. For example, Canada and Costa Rica began modernizing their bilateral free trade agreement in 2010.10 As part of this effort, then-Canadian Minister of International Trade, Peter Van Loan, visited Costa Rica to highlight the importance of trading relationships and raise the issue of lifting the ban on Canadian beef stemming from concerns about BSE.¹¹ Mr. Steve Tierney, then-Assistant Deputy Minister at Agriculture and Agri-Food Canada, credited the "SPS in the Americas" project with reinforcing the credibility of Canada's claims during this period about its superior animal health and food safety standards and practices.

Summary

In the case study of TRTA/CB in Costa Rica, we found that Canadian development assistance fostered mutual understanding and trust between regulators and regulatory systems in the two countries. This exchange of knowledge and expertise enabled the "SPS in the Americas" project to assist Costa Rican beef and cattle producers with exporting their products to the EU, one of the project's primary objectives.

Canadian ODA in Costa Rica also unintentionally improved the trade competitiveness of Canadian beef and cattle products. In future relations with Costa Rican food/animal health and safety officials, Canadian exporters will be able to utilize these favourable networks to enhance export competitiveness. Canadian beef and cattle exporters will particularly benefit from the mutual trust and familiarity established through TRTA/CB projects in Costa Rica given Costa Rica's growing demand for higher-quality imported meat products.

Case 2: Renewable Energy and Rural Electrification in the Boucle du Mouhoun Region, Burkina Faso

This case study focuses on an ongoing renewable energy project to connect rural areas of the Boucle du Mouhoun region of Burkina Faso to a solarpowered electrical grid.¹²

CowaterSogema, a Canada-based international development consulting firm, is implementing a four-year project (2017-2021) to connect fourteen rural localities (18,000 people) to the national grid and equip thirty off-grid rural health clinics (accessed by 250,000 people) with solar panel systems.¹³ This \$18 million project is the first initiative of its kind in Burkina Faso. The energy for the project will be mainly generated by a solar farm currently under construction by Windiga Energy, a Canadian independent power producer. This solar farm, when connected to the national grid, will contribute to the national energy pool. The project's funding partners include Global Affairs Canada (GAC) and Fonds de développement de l'électrification (FDE).¹⁴

The project also intends to assist local social enterprises in distributing and selling solar lamps/kits to over 3,000 off-grid houses in rural communities, as well as provide TRTA/CB to entrepreneurs and women's groups in using renewable energy.

Country Context: Most Canadian trade and investment linkages with Burkina Faso are in the mining and industrial sectors. Although the renewable energy sector potential is significant and a relevant area of interest both to Burkina Faso and the Canadian private sector, there is often limited funding, expertise, and resources to set up nationwide renewable energy projects in these contexts.

Canadian Offering: Canadian FDI and Private Sector Involvement

The partnership between two Canadian companies, Windiga Energy and CowaterSogema, demonstrates Canadian comparative advantage in the provision of cleantech and renewable energy project management in a low-income country (LIC) context. CowaterSogema's long-term presence in Burkina Faso prior to this project allows it to leverage local knowledge of government policies and practices, local businesses, and other incountry development actors to enhance confidence in the project's feasibility and reliability.

Linkages Between Development Investment and Trade

CowaterSogema developed the project (via an unsolicited proposal to GAC) at the request of Windiga Energy. This partnership with Windiga Energy positively contributed to GAC's decision to fund the project as it first and foremost furthers Canada's socioeconomic development priorities vis-à-vis Burkina Faso and secondarily also furthers Canadian commercial ties with the country. In this case, a commercial investment in renewable energy by a Canadian firm (Windiga Energy) was complemented by ODA to facilitate the extension of coverage to underserved rural areas. The presence of Canadian ODA investment is expected to yield further positive externalities. For instance, in the form of future partnerships, FDI and through the procurement route.

Future 'Win-Win-Win' Opportunities

Market Creation: There is potential to transition Burkina Faso's energy sector away from donor assistance and subsidized climate financing to unsubsidized forms of capital. This market creation has the potential to benefit Canadian exports in the solar industry and increase Canadian FDI in the renewable energy sector. This project is an example of how ODA can build bilateral relationships and trust in commercial activities with a development impact.

Procurement: CowaterSogema will procure a substantial amount of materials and services over the duration of the project. As a Canadian firm is delivering and executing the project, the project has direct and indirect ties to other Canadian businesses. Canadian businesses that work with CowaterSogema will be exposed to new contracting and bidding opportunities. These kinds of connections indirectly increase Canada's bilateral trade with Burkina Faso, in a manner that is in keeping with the principles of "untied aid".¹⁵

Project Management: CowaterSogema maintains a strong working relationship with the Ministere de l'Energie du Gouvernement du Burkina Faso, established during previous projects in the country. Canadian project implementation expertise is extremely well regarded. This relationship will confer a reputational advantage to Canadian companies looking to work in the Burkina Faso energy sector when bidding for commercial contracts outside of ODA projects because Canadian management is already seen as reliable and beneficial.

Summary

This case study demonstrates how partnerships between Canadian firms implementing ODA projects can enhance development impact through local knowledge and networks. Such long-term partnerships can also promote diversification of Canadian trade and investment in strategic 'sunrise' sectors, such as cleantech and renewable energy, in developing countries. In Burkina Faso, existing private Canadian investment by Windiga Energy was complemented by ODA investment in the region to help extend coverage to underserved rural communities, very much in keeping with Canada's international development goals. Windiga Energy's relationship with CowaterSogema brought further investment of Canadian resources and development expertise into the project, and, while at an early stage, is expected to yield benefits in the form of market creation, as well as project management and procurement opportunities.

Case 3: Residential Solar Energy Usage in Ajloun and Deir Alla Regions of Jordan

This case study focuses on an ongoing renewable energy project to drive sustainable economic growth and climate smart development through the uptake of renewable energy and energy efficient technologies in the impoverished Ajloun and Deir Alla regions of Jordan.¹⁶

The four-year \$23 million project funded by the Government of Canada and the Jordan Renewable Energy and Energy Efficiency Fund (JREEF) started in 2016. The project aims to drive sustainable economic growth and climate smart development through the uptake of renewable energy and energy efficient (RE&EE) technologies across Jordan. The project focuses on improving living conditions and livelihoods, introducing RE&EE solutions at the household-level (thereby decreasing the share of household resources devoted to energy), increasing income generation opportunities, skills and employment prospects in the RE&EE sector, and building a stronger enabling environment for robust RE sector growth in Jordan.

This project will directly benefit over 160,000 people of the Jordan Valley and Ajloun region. CowaterSogema, throughout the duration of the project, will provide technical assistance and capacity building, procure and install solar technologies, train local technicians in RE/EE measures, and coordinate regional governments and utilities for the effective regulation of energy projects and programs.

Country Context: Jordan's government has shown a strong commitment and willingness to invest in renewable energy development. For example, Jordan has achieved its goal of 20% renewable energy by 2020 and the solar energy sector has made significant progress in generating benefits for Jordan's environment, energy security and economy. While solar energy only makes up a small share of total energy generation, residential and small-scale commercial use of solar energy has grown significantly. A barrier to making renewable energy more widespread and accessible is that national authorities and private firms either lack awareness of emerging innovations in the field or the means to implement these innovations.

Canadian Offering: Private Sector Expertise

CowaterSogema has maintained a long-term presence in Jordan prior to implementing the solar energy project focused on the Ajloun and Deir Alla regions. This local knowledge of government policies and practices, local business, and other in-country development actors increases the feasibility and reliability of the project. In this case, CowaterSogema has an advantage when compared to other firms globally as it offers familiarity with the region and expertise in the social and political systems within the region.

Future 'Win-Win-Win' Opportunities

Market Development: Utility companies in Jordan are often unaware of sector innovations, such as smart grids and microgrids,¹⁷ or lack sufficient project management capabilities to implement them. Through building relationships with Jordan's energy sector in this project, CowaterSogema connects Canadian expertise to local demand for "smart" renewable energy technologies in Jordan. For instance, Canadian companies possess the knowledge to design and implement the smart grids and microgrids that are a key part of current successful renewable energy projects. Additionally, advances in artificial intelligence can improve energy efficiency by determining when to turn on and off electricity. This type of technology remains, for the most part, underexplored in Jordan. CowaterSogema's project aims to facilitate a market for such "smart" technology in the solar industry.

Market Development and Local Financing: Project partnerships with national banks, energy service providers, and public institutions will promote in-country financing, and the development of policies and regulations better aligned with market development. For example, through tariff reform and permit/license regulations that would help incoming firms, including Canadian companies.

Summary

This Canadian ODA project provides technical assistance and capacity building, solar technologies, training, and best practice regulation for energy projects. As CowaterSogema is a Canadian firm, this development spending facilitates the creation and expansion of networks between Canadian private sector RE firms and Jordan's RE market. As a result, Canadian RE firms have the potential to be exposed to new opportunities to export goods to Jordan or invest in Jordan's RE sector.

Conclusion

The case studies highlighted in this report demonstrate that there are existing linkages between Canadian-led development projects, Canadian ODA and Canadian trade interests. It is in the interest of development impact, Canada's international priorities, and future trade and investment diversification to further invest in these 'win-win' outcomes.

The case study on Canadian investment in TRTA/ CB in Costa Rica shows that development spending can leverage Canadian expertise in international trade-related best practices, trade regulations, and infrastructure to expand Canada's trade relationships with developing countries. Further, CowaterSogema's projects show how development projects can contribute to market creation, expansion, and economic sustainability through procurement, relationship building, knowledge transfer and exchange, and exposure to new technologies.

Ultimately, activities supported by Canadian ODA provide invaluable knowledge of the local business environment, practices, and partnerships, which benefit Canadian businesses seeking opportunities in developing countries, which can be difficult to navigate. The presence of Canadian ODA-funded development projects complements existing Canadian FDI and indirectly promotes new private investment. While strategic linkages between Canadian ODA and Canadian trade are possible and potentially plentiful, the "win-win-win" benefits presented in this report have so far been more coincidental than purposeful. This could be a result of the limitations and strict restrictions that accompany Canadian ODA. This challenge is especially pertinent in the implementation of renewable energy projects in developing countries, which involve high technology, high value-added goods and services. Future research should explore how new and existing Canadian ODA projects can be strategically and more explicitly linked to private sector development, market creation and expansion, and trade facilitation, in a way that purposively links Canadian expertise and competencies with local priorities, demands, and needs.

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Notes

¹ CIDP's quantitative study, Trade with Developing Countries and Development Assistance, available from: http://www.cidpnsi.ca/canadian-exports-odagravity-model.

² All amounts in CAD\$ unless otherwise noted.

³ This project was implemented in Costa Rica, Guatemala and the Caribbean by TDV Global Inc, an independent Canadian consulting firm.

⁴ Some Costa Rican officials participated in study tours to learn from Canadian traceability systems and laboratory training while others were trained in Costa Rica by Canadian experts.

⁵ Bovine spongiform encephalopathy (BSE) is a fatal neurogenerative disease commonly known as "mad cow disease".

⁶ Information about SPS-related policy areas considered by the OIE criteria for BSE risk categorization is available via the Canadian Food Inspection Agency: http://www.inspection.gc.ca/ animals/terrestrial-animals/diseases/reportable/ bse/risk-categorization/eng/1363872983008/136 3873065426.

⁷ World Trade Organization (2018). WTO technical assistance and training. Available from: http://www. wto.org/english/tratop_e/devel_e/teccop_e/tct_e.htm.

⁸ Library of Parliament. (2005). Mad Cow Disease in Canada: An Economic Overview. Available from: https://lop.parl.ca/Content/LOP/ ResearchPublications/tips/tip116-e.htm.

⁹ Costa Rica only imports top grade beef (such as Canadian beef) to meet the demand generated by their tourist industry.

¹⁰ Global Affairs Canada. (2010). Canada and Costa Rica Set to Enhance Free Trade Agreement. Available from: http://www.sice.oas.org/TPD/ CAN_CRI/Negotiations/ModernizationFTA_e.pdf.

¹¹ Agriculture and Agri-Food Canada. (2015). Agri-Food Sector Profile - Costa Rica. Available from: http://www.agr.gc.ca/eng/industry-marketsand-trade/international-agri-food-marketintelligence/latin-america-and-the-caribbean/ market-intelligence/agri-food-sector-profile-costarica/?id=1485199986497.

¹² CowaterSogema. (2017). Building markets for small-scale solar to achieve affordable and clean energy for all. Available from: https://cowatersogema.com/wp-content/ uploads/2017/12/Building-markets-for-smallscale-solar-CowaterSogema.pdf.

¹³ CowaterSogema specializes in providing a wide variety of services to improve the public, social, economic and physical environment of developing and emerging countries. Services range from the design and conceptualization of a project to the management and implementation of large scale, long term programs.

¹⁴ Burkina Faso's Fonds de développement de l'électrification has existed since 2003 and became a Public de l'Etat à caractère administratif (EPA) or state institution in 2010. It enjoys the legal personality and prerogatives of public law and is responsible for the implementation of the rural electrification policy. It is placed under the technical supervision of the Minister of Energy and under the financial supervision of the Minister of Finance.

¹⁵Approximately 98.5% of Canadian ODA is untied. Aid is considered "tied" when a condition for its disbursement to a partner country is that the proceeds can only be used to buy goods and services from the donor country providing the assistance. Tied aid has been shown to be less effective from a development perspective, and moreover goes against country ownership which is a key principle in aid effectiveness since at least the Paris and Accra rounds.

¹⁶ CowaterSogema. (2017). Building markets for small-scale solar to achieve affordable and clean energy for all. Available from: https://cowatersogema.com/wp-content/ uploads/2017/12/Building-markets-for-smallscale-solar-CowaterSogema.pdf.

¹⁷ Microgrids are small-scale versions of the centralized electricity system. They generate distribute and regulate the flow of electiricity to customers. They aim to target local goals such as reliability, carbon emission reduction, diversification of energy sources, and cost reduction. Microgrids are an ideal way to integrate renewable resources on the community level. Smart grids are modernized electrical grids that use technology to constantly gather and act on information about the behaviors of suppliers and consumers, to improve the efficiency, reliability, cost and sustainability of the production and distribution of electricity.

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