

Institution: University of the West of Scotland		
Unit of Assessment: 17: Business and Management Studies		
Title of case study: Improving commodities and trade, logistics/supply chains and the role of female entrepreneurship in Africa.		
Period when the underpinning research was undertaken: 2007 - 2020		
Details of staff conducting the underpinning research from the submitting unit:		
Name(s):	Role(s)	Period(s) employed by submitting HEI:
Prof John Struthers	Professor	1978 - 2020
Dr Firdu Gemech	Lecturer	1991 - 2020
Dr Dina Nziku	Lecturer	2013 - 2020
Dr Adebisi Adewole	Lecturer	2014 - 2020
Dr Evi Viza	Lecturer	2017 - 2020
Period when the claimed impact occurred: 2013 - 2020		
Is this case study continued from a case study submitted in 2014? No		
1. Summary of the impact <p>Influencing flagship United Nations entrepreneurship programmes, improving trade with Africa by working with African embassies, and influencing policy through the Westminster African Business Group have been the key achievements of the Centre for African Research on Enterprise and Economic Development (CAREED) at the University of the West of Scotland. The Honorary Consul for Ethiopia in Scotland appointment in 2015, as well as establishment of new networks and trade partnerships are a direct result of this pioneering work. CAREED's research has been translated into practical solutions for long-standing problems such as: <i>commodity price volatility</i>; <i>sub-optimal supply chains</i>; and <i>low participation of women in entrepreneurial activities</i>. The centre has therefore influenced a wide range of public, private and charitable organisations and local communities.</p>		
2. Underpinning research <p>Across these areas of research, impact can be identified at different levels. For example, Struthers and Gemech have been publishing distinctively on commodity price volatility since 2007 and specifically on <i>coffee price volatility</i> in countries such as Ethiopia. This has led to high level influence on the United Nations Conference on Trade and Development (UNCTAD), and Food and Agriculture Organisation (FAO). New insights on the possible welfare effects of commodity price volatility were highlighted [3.1 - 3.3]. Resulting from this highly visible influence, Struthers was appointed Honorary Consul for Ethiopia in Scotland in 2015, and works closely with the Ethiopian Embassy in London in promoting trade links with Ethiopia. A key objective of this collaboration is reducing the country's dependence on coffee for its export revenues which has been achieved.</p> <p>The team has also focused on female entrepreneurship in Africa, led by Nziku who has engaged extensively with a range of stakeholders relating to this vital area of research in Africa (e.g., Babson College; the Diana International Research Conference on Women Entrepreneurship; ThinkTank International Conference on Women Entrepreneurship; the Global Women Entrepreneurship Project (WEP) and Women in Business; as well as UNCTAD's EMPRETEC programme. In addition to interacting with UNCTAD she has been advising potential women entrepreneurs in Africa and also in Scotland [3.4, 3.6]. Her research has a clear focus on entrepreneurship policy in a number of African countries, and in particular her home country Tanzania. In 2017 the team were involved in securing funding for this aspect of its research in relation to women entrepreneurs in Uganda [3.A].</p> <p>The team's research on logistics and supply chains, led by Adewole has also been highly impactful. The extensive partnerships, particularly in Nigeria, have impacted on various African communities at a societal level, as well as culturally. Further, Adewole's entrepreneurial activities in the UK led to him being awarded an Honorary Academic Leadership title in recognition of his Outstanding Contribution to Enterprise Education and Research on Africa (Enterprise Minds Awards</p>		

2019 London). His 2018 co-edited book with Struthers [3.5] which has a particular focus on logistical obstacles to trade in Africa is particularly relevant in the context of the launch of the **African Continental Free Trade Area (ACFTA)** in the same year.

There is a strong thread which connects the above areas of research. This stems from the challenge of *commodity dependence* (defined by UNCTAD as at least 60% of a country's foreign exchange being derived from one commodity). This is exacerbated by poor access to global value/supply chains and low value added for primary producers, especially in African producing countries. The even fewer opportunities available for women to operate profitably in the global value chains for such commodities is a related problem. The complex and often intractable problem of *commodity dependence* in developing countries, especially in Africa, means that it can only really be fully understood if all three aspects highlighted in this Impact Case Study are researched together. In the same vein, the **UN's Sustainable Development Goals (SDGs)** are a *sine qua non* of the research work carried out in these 3 inter-connected areas. Specific SDGs that are supported by our research include: **1. (No Poverty); 2. (Zero Hunger); 5. (Gender Equality); 10. (Reduced Inequalities); 12. (Responsible Consumption and Production); and 17. (Partnerships for the Goals)**. In particular **SDGs 5, 10 and 12**, are pivotal to the applied nature of the research carried out across: *commodities and trade, logistics/supply chains, and female entrepreneurship in Africa*. In 2019, the team secured major funding for its research on the aquaponics sector in Rwanda which encompasses these three aspects [3.B].

3. References to the research

3.1 Struthers, J., and Gemech, F., (2007) "Coffee Price Volatility in Ethiopia: Effects of Market Reform Programmes", *Journal of International Development*, 19(8): 1131-1142. <https://doi.org/10.1002/jid.1389>.

3.2 Struthers, J., Gemech, F., Reeves, A. and Mohan, S., (2011) "Market-based price-risk management: welfare gains for coffee producers from efficient allocation of resources", *Oxford Development Studies*, 39(1): 49-68. <https://doi.org/10.1080/13600818.2010.550399>.

3.3 Struthers, J., Gemech, F., Reeves, A. and Mohan, S., (2016) "The Welfare effects of commodity price volatility: the case of Ethiopian Coffee Farmers", *Qualitative Research in Financial Markets*, 8(4): 288-304. <https://doi.org/10.1108/QRFM-01-2016-0005>.

3.4 Nziku, D. M., (2016) "Strategies and policies influencing entrepreneurship start-up decisions: evidence from Tanzania". In: *Women's entrepreneurship in global and local contexts*, Diaz-Garcia, C., Brush, C. G., Gatewood, E.J and Welter, F (eds), Edward Elgar. <https://www.e-elgar.com/shop/gbp/women-s-entrepreneurship-in-global-and-local-contexts-9781784717414.html>. (Output available on request)

3.5 Adewole, A. and Struthers, J., (eds) (2018) *Logistics and Global Value Chains in Africa: The Impact on Trade and Development*. Palgrave-Macmillan (Palgrave Studies of Sustainable Business in Africa): 356 pages. <https://doi.org/10.1007/978-3-319-77652-1>.

3.6 Nziku, D.M and Struthers, J., (2018) "Female entrepreneurship in Africa: strength of weak ties in mitigating principal-agent problems", *Journal of Small Business and Enterprise Development*, 25(3): 349-367. (Special Issue on Entrepreneurship in Africa). <https://doi.org/10.1108/JSBED-03-2017-0115>.

Grants

3.A Viza, E., Kirk, K., Nziku, D., Cano, M., Struthers, J., Kourouklis, A., *Critical Success Factors for Facilitating Building Manufacturing Capacity for Handcraft Women in Uganda*. Royal Academy of Engineering: Frontiers of Engineering for Development-Seed, 2017 to 2018, GBP19,990.00

3.B Struthers, J., Alcaraz Calero, J., **Nziku, D., Adewole, A.,** Quinn, B., *Cost-Effective Aquaponic Solutions for Developing Farmers in Rwanda.* Department for International Development (DFID)/Innovate UK, 2019 to 2021, GBP280,626.00

4. Details of the impact

Impact on Commodities and Trade

Scottish-based Fairtrade companies (**Just Trading Scotland (JTS)** and **Coffee Conscience**) specialising in importing African commodities such as coffee, rice and other commodities have specifically benefitted from our research. In his role as Honorary Consul for Ethiopia in Scotland, Struthers has facilitated new sources of coffee for Coffee Conscience from **Ethiopia** and **Burundi** with the aim of diversifying the company's current sources. While the demonstrable impact has been delivered, this is an ongoing activity as it requires the involvement of many different stakeholders including the Scottish Fairtrade Forum; as well as the implementation of sharing of the coffee roasting operation with the producing countries, thereby improving their value within the coffee supply chain. **Billy Miller (CEO Coffee Conscience)** said:

"The company has interacted with CAREED members at different levels. This has included the possibility of our company considering importing coffee from additional African countries such as Ethiopia and Burundi-based on CAREED's recommendations. The very strongly applied research conducted by CAREED members in these three areas of research, along with their impressive academic credentials and reputations are a major source of influence for our company in the direction of our activities in Africa going forward."

Drawing on their research interests in the areas of commodities and female entrepreneurship in Africa, **Nziku** became a member of the Board of JTS and **Struthers** became a member of the Board of its sister organisation, the **Baltimore Trust Projects Advisory Board** (both since 2018). Their involvement in these roles has been particularly impactful in securing ongoing JTS funded projects in **Malawi**; including with stakeholder Malawian farmers organisations supported by JTS. This has ensured that women are fully included in the supply chains (e.g., rice production). JTS is a long-standing member-based Fairtrade importing company, which has been working with CAREED for several years. Since 2013, **Struthers** has regularly provided influence to UN's *Global Commodities Forum (GCF)* and UNCTAD's (United Nations Conference on Trade and Development) *Multi-Year Expert Meetings (MYEM) on Commodities and Development*. He was also an invited panellist at the UNDP/ECA/ADB 2018 Annual African Economic Conference in Kigali, **Rwanda**, focusing on Leveraging the Private Sector for Africa's Integration.

Impact on Logistics/Supply Chains

Kenyan Ministry of Housing, Transport, Environment and Urban Infrastructure (MHTEUI) has benefitted from CAREED's advising role for high level infrastructural and transport facilities in Kenya's economic development. In February 2018, Adewole and Struthers, working along with Scottish-based **Diaspora Community Support Services (DCSS)** and UWS colleagues in the School of Health and Life Sciences, secured a World Bank funded project and organised a CPD training course in environmental waste management for 15 senior members of MHTEUI. Follow up programmes have been developed by DCSS based on this successfully initiated collaboration.

Impact on Female Entrepreneurship in Africa

Improvements for the **Ugandan** craftswomen in securing greater revenue for their products through ongoing contacts with Scottish-based African female entrepreneurship organisations, including *Kenyan Women in Scotland Association-KWISA*, has directly resulted from CAREED's research. **Nziku's** contribution on Empowering Women Entrepreneurs in UNCTAD Multi-year Expert Meeting (on Investment, Innovation and Entrepreneurship for Productive Capacity-Building and Sustainable Development in Geneva in June 2019) has been a pivotal impact channel, stemming from the successfully funded **UK Academy of Engineering** interdisciplinary project in 2018, led by the UWS School of Computing, Engineering and Science on the theme: **Improving Critical Success Factors for Facilitating Building Manufacturing Capacity for Handcraft Women in Uganda [3.A]**. This included in-country as well as UK-based workshops/conferences focusing on Uganda and Malawi participants with the aim of enhancing value chain returns for the women.

One of the Ugandan delegates (from the **Yaaka Digital Network**) took part in a **BBC World Service** interview which was transmitted to many millions of people, especially in the Commonwealth; and **Struthers** also appeared on **BBC Scotland News**.

CAREED's involvement with **EMPRETEC** is particularly noteworthy. This is a flagship UN programme established in 1988 to facilitate female entrepreneurship in developing countries (in > 30 countries). EMPRETEC offers bi-annual awards to the best female businesses against several criteria. **Nziku** and **Struthers** in particular, have interacted with the leadership of the programme for a number of years. The former Head of EMPRETEC presented a keynote paper at CAREED's first annual conference in 2015 and was the first recipient of the CAREED Fellowship. In addition, due to contacts made between CAREED and **African Forum Scotland/Next Step Initiative**, the CEO of this Glasgow-based organisation was invited to be a panel member and judge at the EMPRETEC awards ceremony and conference held in Nairobi in 2016, and subsequent awards ceremonies. This is a highly impactful example of the manner in which CAREED utilises its' applied research to facilitate partnerships between high level UN organisations such as UNCTAD and Scottish-based diaspora NGO's such as Africa Forum Scotland/Next Step Initiative. A Testimonial Letter from the former *Head of the UNCTAD EMPRETEC* programme states:

"A particular area of research carried out by CAREED related to my former role at UNCTAD is Female Enterprise in Africa. This area of research has had real impact concerning the promotion of female entrepreneurship, especially in Africa. Specifically, the research has identified many barriers facing female entrepreneurs in developing countries. These include: lack of start-up finance; absence of entrepreneurial education and skills development, and stereotyping of female businesses."

Wider Societal Impacts

(1) 15 people have been placed on year-long internships in the *Museums and Heritage Sector* in Scotland as part of the highly-innovative *Ethnic Minority Employment* project focusing on people from BAME communities, since 2018, and a number of them have secured permanent positions in this sector. This early impact has been achieved by Struthers through an ongoing project to monitor a programme for **Africa Forum Scotland / Next Step Initiative** on their project funded by the *Lottery Fund* and *Heritage Scotland*. These early achievements will be followed by further impacts as the project completes in 2021.

(2) African trade in general has been influenced by CAREED through the collaboration with the **Westminster African Business Group (WABG)** which hosts African Ambassadors and business people at the House of Commons, from which various trade missions to African countries take place. Struthers is a long-standing member of WABG.

A Testimonial Letter from the Chairman of WABG states: *"The areas of research that CAREED focuses on lie at the very heart of the current and future needs of economic development on the continent. The current Director of CAREED Professor John Struthers has been a long-standing member of WABG and his own area of research on commodities and trade in Africa has influenced the changing directions of trade for such countries as Ethiopia. For example, his co-authored work on the coffee sector in that country has been a central focus of Ethiopia's successful recent export diversification strategy. This has seen the reliance on coffee production in Ethiopia's export earnings reduce from more than 60% to less than 50% in the last 15 years."*

Struthers along with Nziku organised a high-level seminar to the WABG in September 2017 on **Entrepreneurship in Africa**, attended by circa 50 delegates at the House of Commons. In his role as Honorary Consul for Ethiopia, Struthers has very recently (December 2020) co-organised a **virtual Trade and Investment Mission** for Scottish-based companies and organisations with the assistance of the Ethiopian Embassy in London at which almost 70 delegates attended.

(3) Rwandan based partner (**Njordfrey**) has been able to set up a unique network of locally based stakeholders including farmers, women's groups, retailers, and potential investors as a result of CAREED's (Struthers, Nziku, Adewole) and colleagues' from other UWS Schools innovation-focused expertise, to progress a pioneering project *"Cost-effective aquaponics solutions for developing farmers in Rwanda"* funded by the **UK Foreign Commonwealth and Development Office (FCDO)/Innovate UK Agri-Tech Catalyst 8 Programme**. The funding [3.B] covers a substantial

pilot project in the country which commenced in November 2019 for 18 months (now extended to October 2021 due to COVID-19). This pioneering interdisciplinary project applies new sensor technology to fish and plant health in Rwanda with the objective of improving the livelihoods of subsistence smallholders. The project's aim is to increase the country's exports, improve supply/value chains, and enhance gender and social inclusion elements within the sector. CAREED's research has also influenced the design and development of an out-grower payback model for stakeholder development. This early success of the project in Rwanda has led to CAREED (November 2020) being awarded another Innovate UK grant (GBP199,814.00) for a project within the mango sector in Kenya, in partnership with the **Mount Kenya University** and Kenyan agricultural company, **Farmtrack**. This has been awarded as part of Innovate UK's brand new **AAKTP (African Agriculture Knowledge Training Partnership)** under their **Agri-Food Programme**. The project is designed to tackle fruit fly infestation on the mango crops which limits the supply chain and export of the commodity. At the time of writing **UWS is the first university in Scotland to be approved for an AAKTP award** – as featured in The Herald (circulation: 28,900), one of Scotland's leading broadsheet newspapers [5.1].

5. Sources to corroborate the impact

5.1 Media coverage: https://www.heraldscotland.com/business_hq/18933045.university-pioneering-partnership-african-academics-business/

5.2 Testimonial letter from Coffee Conscience

5.3 Testimonial letter from Just Trading Scotland

5.4 Testimonial letter from Njordfrey Rwanda (who also presented a paper on the project at the 5th annual CAREED conference on 9th December 2020)

5.5 Testimonial letter from EMPRETEC at UNCTAD

5.6 Testimonial letter from Africa Forum Scotland/Next Step Initiative

5.7 Testimonial letter from House of Commons, Westminster African Business Group (WABG)

5.8 Kenyan Women in Scotland Association-KWISA: www.kwisa.org.uk