

**Challenges of Smallholder Farmers in Jamaica:
Bridging Perspectives in Agriculture Development**

by

Joel Matheson

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Thesis Committee:

Dr. Stephen Wooten, Chair

Dr. David Meek, Member

Dr. Galen Martin, Member

University of Oregon

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THESIS ABSTRACT

Joel Matheson

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Title: Challenges of Smallholder Farmers in Jamaica: Bridging Perspectives in Agriculture Development

Smallholder farmers constitute a vital component of agricultural systems globally, playing a pivotal role in ensuring food security. This thesis delves into critical issues surrounding agricultural development in Jamaica, focusing on the role of government, education, access to resources, and perspectives on climate change. By foregrounding local viewpoints, this research contributes to the broader discourse in development studies, emphasizing the necessity for inclusive and context-sensitive approaches. Adopting a critical development perspective, this study aims to elucidate power dynamics and structural complexities hindering development efforts.

Conducted as a case study in Jamaica, this research seeks to address several key questions. Firstly, it examines the primary challenges confronting smallholder farmers at the local level. Secondly, it explores the involvement of Development Actors in assisting these farmers on a global scale. Lastly, it investigates the alignment of views between smallholder farmers and Development Actors regarding challenges and solutions.

Qualitative methods, including 17 semi-structured interviews (11 with smallholder farmers and 6 with Development Actors), were employed to gather data. Analysis revealed a notable gap in the literature pertaining to Small Island Developing States, particularly regarding

the limited inclusion of smallholder farmer voices in decision-making processes related to agricultural development.

Key themes emerged from the analysis, highlighting a disconnect between the perspectives of smallholder farmers and Development Actors. While both groups acknowledge challenges, disparities exist in their perceived solutions. Effective communication and collaboration between global and local stakeholders are underscored as crucial for addressing these disparities. In the context of Jamaica, recommendations include enhancing the messaging and outreach of Development Actors to better serve the needs of smallholder farmers.

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Introduction

Smallholder farmers play a crucial role in agricultural systems and food security worldwide, reducing dependency on imports while enriching the cultural and social fabric of their communities. Unlike large-scale commercial operations, smallholder farms typically operate on up to 10 hectares (24 acres), with most farmers cultivating less than 2 hectares (5 acres) of land (Knight, 2022). These individuals or households engage in small-scale agricultural activities, including livestock rearing, fishing, and crop cultivation. Farms smaller than 2 hectares collectively produce roughly 35% of the world's food (Lowder et al., 2021). Smallholder farmers are particularly important in the Global South, with the International Fund for Agricultural Development (IFAD) estimating that they provide 60 to 80 percent of the food produced in developing countries (2024).

Smallholder farmers in Small Island Developing States (SIDS) face unique challenges due to their small size, limited land availability, vulnerability to natural disasters, and heavy reliance on global markets. These challenges are expected to increase due to global environmental change and economic transformations (Lowitt et al., 2015). As the world's population grows, these farmers are under increasing pressure to enhance their productivity and ensure food security. Smallholder farmers worldwide face challenges in accessing micro-loans, insurance, and markets (von Loeper et al., 2018).

Effective interventions can help address these challenges, but smallholder farmers' voices need to be included in the conversation. Agricultural development is deeply influenced by both global and local factors, necessitating a dialogue between these two levels to effectively address complex challenges for sustainable development.

In this paper, the individuals and organizations responsible for agricultural development in Jamaica, representing the global perspective, are referred to as Development Actors. These Development Actors aim to foster sustainable growth, improve living conditions, and stimulate economic progress. Development Actors include governmental agencies, NGOs, educational institutions, international development agencies, and the private sector. These organizations operate with different goals and perspectives but often collaborate with one another and smallholder farmers. Although these organizations sometimes have conflicting agendas, for the purpose of this thesis, they are grouped together as Development Actors since their projects, policies, and initiatives directly affect smallholder farmers. The government of Jamaica, one of the most prominent Development Actors, faces domestic and international pressures to increase food production, balance Jamaica's high dependency on food imports, address rising malnutrition, and prepare for natural disasters and climate change (Ministry of Agriculture and Fisheries, 2013).

Representing the local perspective, smallholder farmers play a significant role in Jamaica's agricultural landscape. With a population of over 2.8 million people, Jamaica's agricultural sector is crucial for both national food security and the livelihoods of about 17.6% of its labor force (Brown, 2014). Approximately half a million individuals are engaged in agriculture, emphasizing its critical significance within the country's economy. As a SIDS, Jamaican smallholder farmers face challenges of access to land and competition from global markets, as well as common issues such as accessing capital and fair markets. Additionally, Jamaican smallholder farmers are burdened by the high cost of fertilizers, lack of irrigation, availability of labor, praedial larceny, and weather changes (Brown, 2014). These farmers exhibit

individualism, low levels of cooperation (McCulloch, 1970), and a lack of trust in Development Actors (Bourne, Clea, 2013; Bourne, Paul, 2010; Bourne, Paul A., et al., 2022).

The ability to adapt and overcome these challenges is hindered by limited access to resources. Therefore, collaboration with Development Actors is crucial, necessitating the creation of projects and initiatives tailored to each community's needs. This collaborative approach is essential for addressing the unique challenges faced by Jamaican smallholder farmers and promoting sustainable agricultural development in the region.

It is important to note that smallholder farmers themselves are significant stakeholders in agricultural development and could be categorized as Development Actors. However, for the design of this thesis, smallholder farmers are categorized separately to compare the perspectives of these two groups.

Bridging the gap between the global and local perspectives is essential for understanding the complexities of agricultural development and formulating effective policies that address the concerns of both policymakers and smallholder farmers. Global studies scholars Eve Darian-Smith and Philip C. McCarty write, “Analyses of global processes should always take into account the people and communities who ultimately feel the impact of those processes even when impacts are unintended or unforeseen. We should be anxious to explore the global dimensions of the local and how local forces may be both resisting and reconstituting national contexts.” Furthermore, a thoughtful global studies analysis may include “regional histories of colonization, multinational development policies, national politics, and demographic and environmental changes as well as local institutions, customs, and agricultural practices” (Darian-Smith and McCarty, 2017).

Through detailed examination of the different perspectives on key themes such as the role of the government, education, land, capital, market access, and climate change, my findings underscore the importance of listening to local stakeholders. This study demonstrates that meaningful insights can be gained by understanding the concerns of those directly affected by development policies. By bringing local perspectives to the forefront, this research contributes to the broader discourse in critical development studies, highlighting the need for more inclusive and context-sensitive development approaches. By adopting a critical development perspective, this study aims to shed light on the power dynamics and structural issues that complicate development efforts.

Literature Review

Influential scholars in critical development studies include Arturo Escobar, Gustavo Esteva, Vandana Shiva, Akhil Gupta, and Gayatri Chakravorty Spivak. In his book *Encountering Development: The Making and Unmaking of the Third World*, Escobar (2011) critiques development in the Global South as a Western construct, laying the foundation for critical development theory. Vandana Shiva's book *Staying Alive: Women, Ecology, and Development*, originally published in 1988, critiques the impact of global development practices on biodiversity and local communities, advocating for ecological and social sustainability (2016). Akhil Gupta (2012) examines the relationship between bureaucratic practices and the perpetuation of poverty and structural violence in his book *Red Tape: Bureaucracy, Structural Violence, and Poverty in India*. Spivak's essay "Can the Subaltern Speak?" critiques the silencing of marginalized voices in development discourse and highlights the importance of representation and voice.

The literature regarding Small Island Developing States (SIDS) is also important to this research, as Jamaica fits into this group. SIDS have been recognized as a political identity since the establishment of the Alliance of Small Island States in 1990 (van der Velde et al., 2017). SIDS experience challenges balancing the fragility of delicate ecosystems with the need for GDP growth and export-oriented agriculture, further exacerbated by climate change. Scholars have identified institutional reform and governance solutions at the national and international levels as key to addressing these challenges (Betzold, 2015; van der Velde et al., 2007; Williams and Smith, 2008; Wong, 2011).

In Jamaica, the challenges faced by smallholder farmers are well understood by scholars, policymakers, and development agencies (von Loeper et al., 2018; Brown, 2014; Weis, 2007). A wealth of literature spanning various disciplines, including history, anthropology, and economics, has delved into the legacies of colonialism and plantation economies, shedding light on their enduring impacts on modern-day SIDS societies (Beckford, 1999; Besson, 2003; Mintz, 1986; Weis, 2006). However, despite this rich scholarly tradition, the perspectives of smallholder farmers remain absent in discussions surrounding agricultural development (Harvey and Sulemana, 2014). While some recent scholarship highlights the voices of smallholder farmers (Brown, 2014; Weis, 2006), the majority of literature focuses on the global perspective in agricultural development.

There exists a gap in the literature for Small Island Developing States regarding the limited inclusion of smallholder farmer voices in discussions and decision-making processes concerning agricultural development. This omission overlooks local knowledge, firsthand experiences, challenges, and perspectives of those directly involved in local food production.

Understanding the local perspective, in dialogue with the global, is crucial for agriculture development to be effective and sustainable.

The literature on critical development studies and SIDS underscores the necessity of incorporating local perspectives into development practices. The contributions of Escobar, Shiva, Gupta, and Spivak provide a robust framework for critiquing and reimagining development. This review highlights the persistent challenges in SIDS, particularly the need for institutional reforms to address the impacts of climate change and economic pressures. Importantly, it identifies a significant gap in the literature: the limited inclusion of smallholder farmer voices in agricultural development discussions. Bridging this gap is essential for creating sustainable and effective development policies that are informed by the experiences and knowledge of those directly involved in local food production. By prioritizing these local perspectives, development initiatives can become more inclusive, equitable, and responsive to the needs of all stakeholders.

Research Methodologies

This thesis adopts a critical development studies perspective to understand agricultural development in Jamaica. Utilizing a qualitative research approach, it aims to address the gap identified in the existing literature concerning agricultural development in Small Island Developing States (SIDS), as detailed in the Literature Review chapter. Jamaica serves as a case study, with the research design focused on conducting interviews with smallholder farmers and development actors during the summer of 2023.

The research seeks to address the following inquiries:

- 1) Local Challenges: What are the primary challenges faced by smallholder farmers?
- 2) Global Involvement: What are Development Actors doing to assist smallholder farmers?

- 3) Perspective Alignment: How do the views of smallholder farmers align with the Development Actors on these challenges and their solutions?

The choice of qualitative methods, particularly semi-structured interviews, facilitates an in-depth exploration of perspectives, experiences, and challenges related to agricultural development. This approach aims to capture nuanced insights and foster direct engagement with participants, thereby providing a comprehensive understanding of the issues at hand.

The study involved interviews with 17 individuals engaged in agricultural development in Jamaica. Interviewees were chosen based on opportunistic sampling, focusing on participants available and willing to speak with the researcher, without specific design for gender differences, age gaps, religious backgrounds, or geographic locations. While this sampling method provided a range of perspectives, it is acknowledged that other perspectives, such as those from different identities, backgrounds, or geographies, were not captured. Thus, the study recognizes the limitations of its sample but still provides valuable insights.

The primary goal was to capture the local perspective of smallholder farmers and highlight the challenges they encounter. To achieve this, 11 interviews were conducted with smallholder farmers, providing an opportunity to learn about the challenges that this demographic experiences.

The decision to interview farmers from the Parish of St. Thomas, particularly those from the rural town of Hayfield, was deliberate. St. Thomas is renowned for its agricultural activities, and Hayfield's mountainous terrain presents unique challenges and opportunities for smallholder farmers. Focusing on this specific geographical area aimed to capture insights relevant and contextualized to the local farming context.

To ensure a diverse range of perspectives and expertise were incorporated into the study, interviews were conducted with six key stakeholders, including government officials, non-governmental organizations, educational institutions, and international development agencies. This multi-stakeholder approach enriches the research findings and enhances the credibility and applicability of the study's conclusions. The perspectives of both smallholder farmers and key stakeholders are juxtaposed in dialogue to identify alignments or disconnections, which are discussed in the Discussion section.

Overall, the research design and methods employed in this study aim to address the identified gap in the literature and generate valuable insights into agricultural development in Jamaica and other Small Island Developing States.

Findings

The Findings section is divided into two perspectives: Development Actors and smallholder farmers. Each perspective is organized into six subsections, representing common themes that emerged from the interviews. These themes are partially informed by the literature, which suggests that they are significant challenges for farmers. Grouping the themes in this manner not only reflects the insights from the interviews but also enhances readability by presenting related topics together. The subsections are as follows:

1. **Government:**

- **Development Actors:** This subsection delves into the initiatives, perspectives, and limitations of the Government of Jamaica in addressing the challenges faced by smallholder farmers.

- **Smallholder Farmers:** This subsection discusses the perspectives of smallholder farmers regarding government programs and their expectations from the government, specifically reacting to RADA's role in agriculture development.

2. **Education:**

- **Development Actors:** Highlighting education as a primary tool employed by Development Actors, this subsection examines the role of educational institutions in disseminating crucial information and skills within the evolving field of agricultural development.
- **Smallholder Farmers:** This section responds to the Development Actors' usage of education as an outreach tool, detailing how smallholder farmers perceive and engage with these educational efforts, but also highlights the importance of the local knowledge of smallholder farmers.

3. **Land:**

- **Development Actors:** Focusing on the critical issue of land access, this subsection discusses the challenges smallholder farmers encounter and explores initiatives, such as agro-parks, aimed at mitigating these challenges.
- **Smallholder Farmers:** Smallholders share their experiences with land, including leasing land, owning land, lacking titles for land, and dealing with family land issues.

4. **Capital:**

- **Development Actors:** Exploring the intricacies of financing for smallholder farmers, this subsection examines the dynamics of group collaboration versus individual loans and the limited options available to farmers for securing resources.
- **Smallholder Farmers:** Smallholders weigh in on their experiences navigating capital, highlighting how financial support can aid their farming activities but also shedding light on the risks associated with accessing loans, which can lead to debt. They also comment on group dynamics, which is important for understanding the opportunities available for farmers to access credit.

5. **Market:**

- **Development Actors:** Addressing the challenges posed by market dynamics, this subsection discusses the initiatives undertaken by Development Actors to support smallholder farmers in navigating competitive markets, including efforts in agro-processing and value-added production.
- **Smallholder Farmers:** This part highlights the challenges faced by smallholder farmers in the market, their perspectives on market conditions, and their views on agro-processing.

6. **Climate Change and Sustainability:**

- **Development Actors:** Providing a macro view, this subsection explores the perspectives of Development Actors on climate change and its influence on

agricultural development discourse, highlighting efforts to promote sustainability and resilience in the face of environmental challenges.

- **Smallholder Farmers:** Smallholders' views on climate change differ from those of Development Actors, often focusing on more immediate, short-term impacts. Additionally, organic farmers express greater concern about sustainability and climate issues.

These subsections reflect the core themes identified in the interviews, integrating both the perspectives of Development Actors and smallholder farmers to provide a comprehensive overview of the challenges and initiatives in the agricultural sector. This approach helps in organizing the discussion in a coherent and accessible manner.

Development Actors

In this section, I present insights from my primary research to highlight the perspectives of those working directly with smallholder farmers. This provides a better understanding of agricultural development in Jamaica. While this section highlights some initiatives undertaken by Development Actors, it offers only a snapshot of the intricate workings of agricultural development in Jamaica.

To better understand the smallholder farmers' perspective, we first need to understand the perspectives of the Development Actors. Presenting the Development Actors' perspectives first lays the foundation for the discourse surrounding agricultural development in Jamaica. It highlights not only the challenges smallholder farmers face but also the opportunities available to them.

The next section covers the perspectives of the smallholder farmers, whose viewpoints often respond to initiatives facilitated by Development Actors. This sequential approach ensures that the perspectives of smallholders are firmly grounded and contextualized within broader agricultural development narratives.

Government:

The government of Jamaica is one of the most important Development Actors for the small island state. It negotiates trade deals internationally, sets national agriculture policy, and promotes agricultural development locally. Within the Jamaican government, the Ministry of Agriculture, Fisheries, and Mining (MoAFM) is responsible for agriculture. The mission statement on the MoAFM website reads: “To grow and sustain the Agriculture, Fisheries and Minerals sectors by creating a safe and enabling environment while fostering social inclusion in all policies, programmes and projects.” Multiple agencies and departments fall under the MoAFM, all designed to develop the agriculture sector in Jamaica.

Kwesi Palmer works with the MoAFM Apiculture Unit but is also a smallholder farmer and beekeeper. A Rastafarian and proponent of organic agricultural practices, he advocates for sustainability in Jamaica, both environmentally and in the broader context of agricultural development. In our conversation, he emphasized that Jamaica needs to sustain itself before it can focus on growth and development. He says, “Before you can grow, you have to sustain yourself. Without sustaining yourself, how are you going to grow?”

He continues, saying, “Food and agriculture is international business. People ship food everywhere. Jamaica still eats 60% of what comes from somewhere else, 60%. With all of this sunlight and all of this land, same way. But also culture is the other thing. So if somebody tells you, ‘This you fi eat,’ and you start to think this is you fi eat, then now, the cultural aspects of it,

you start to eat that now. You understand? You start to think that is what you should eat.” He discusses how Jamaica relies heavily on imports to meet consumer demand for imported food options.

This demand for food imports is evident in Jamaica's food culture. The national dish, Ackee and Salt Fish, is made with imported salted cod. Every Sunday, families eat rice and peas, a uniquely Jamaican staple, but it is made with imported rice. Even the beans, which can be grown locally, are imported. Bun and cheese, a popular snack during Easter and year-round, requires imported wheat.

In response, the government promotes the national motto, “Grow what we Eat, Eat what we Grow,” to encourage local agriculture markets by connecting farmers with local industries or hotels. For instance, Red Stripe partners with farmers to provide cassava for brewing beer, and Grace sources peppers for hot sauce. However, there are barriers to entering these contracts, and some smallholder farmers critique the government motto, as discussed in the smallholder farmer section.

Kwesi highlights the plantation economy model, where historically, Jamaica produced goods primarily for colonial powers, such as England, creating a dependency that persists today. “The original economic model of countries like Jamaica,” he says, “was always that we produced things for the mother country. With England, a plantation system. And they chose what they wanted you to produce.”

Although no colonial power now dictates what Jamaican farmers should produce, global market forces continue to influence agriculture in Jamaica. The US Department of Agriculture, in collaboration with ACDI VOCA, announced a project to promote the cultivation of turmeric, ginger, and pimento in Jamaica. The project, called JaSPICE, provides grant funding to support

agricultural development in Jamaica. The government negotiates internationally with bilateral aid donors to influence agricultural development within the country.

When it comes to trade deals and international financing, Jamaica's position is not very strong. "Right, so we're indebted," Kwesi says. "Indebtedness starts from your capital and the social interest of your existence. That social interest puts you at a disadvantage." Jamaica has high public service debt, roughly 150 percent of its GDP. Twenty years ago, interest payments on loans accounted for over 50 percent of government expenditures (Jessen and Vignoles, 2005). The capital used to repay debt could be used for social programs and affects various levels of society. Kwesi notes this by saying, "Always, in a trade, in a policy, in everything, you're not negotiating at your strongest. So all of that trickles down to the micro level." Although smallholder farmers are not directly involved in financial decisions, they are still affected by global forces.

The government of Jamaica represents smallholder farmers on a macro scale and relies on organizations such as the Jamaican Agricultural Society (JAS) to convey the concerns and perspectives of smallholder farmers. The JAS, a quasi-governmental organization, falls under the MoAFM umbrella. Working with farmers in community-based farmers groups, the JAS claims to advocate for this demographic by presenting their issues to the government for resources. In a conversation with Donnette Skervin, who has worked with the St. Thomas JAS branch for many years, she sheds light on the Development Actor's significance in agriculture development in Jamaica. She says, "When [farmers] come into the office, whatever issues they put forward, we record and report that back to the main office, who then reports that to the government."

The Rural Agricultural Development Authority (RADA) is another important Development Actor in Jamaica's agricultural development. RADA, the MoAFM's extension

branch, is involved in community-based Farmer Field School trainings, assisting farmers with marketing produce, and sometimes providing farm inputs such as fertilizers, pesticides, or tools and equipment. Each parish has a RADA office and an extension officer responsible for outreach in different communities. RADA is involved in almost every agricultural development project, such as promoting applications for the JaSPICE project grant funding. Due to the timing of my research coinciding with the Denbigh Agriculture Expo, I wasn't able to interview someone from RADA, but the organization is well-represented with information online and from perspectives of other Development Actors and smallholder farmers.

The United States Peace Corps (PCJ) is an international development agency involved in the agricultural sector in Jamaica. I had a conversation with Dan Malone, the agriculture sector program manager for PCJ. Dan has been living in Jamaica for over 20 years and has worked closely with RADA, JAS, and other Development Actors. He spoke from his viewpoint as a program manager, collaborating with other Development Actors but also interacting directly with smallholder farmers.

Dan notes the importance of RADA but also highlights the challenges of effective outreach. "RADA, the extension services, do a really good job of helping farmers," Dan says, "but another challenge is RADA is very limited... one extension officer could be serving thousands of farmers and so just that one person, it's difficult for them to get in and help." The limited resources that the government of Jamaica has restrict the effectiveness of the RADA extension officers.

Despite these limitations, the government of Jamaica, along with organizations like RADA and JAS, is crucial to the development of agriculture in the country. Organizations under the MoAFM work together to advocate for farmers and distribute resources on a needs basis. The

JAS and RADA are involved in national projects such as the National Onion Project and the National Irish Potato Project, aimed at increasing the production of onions and potatoes, respectively.

An example of Development Actors working together is the group effort to mitigate the effects of drought. Donnette shares how the JAS and RADA work within the MoAFM. She says that the JAS makes “representation on behalf of the farmers and put forward the issues to the ministry. They will do some of the distribution by RADA. Because RADA, that is the government extension service delivery hand, so RADA now will go out with the technical support and identify the most badly affected farmers and set up a rainwater harvesting system in the field.”

The government of Jamaica serves as a pivotal Development Actor in the nation’s agricultural landscape. Through the Ministry of Agriculture, Fisheries, and Mining, it attempts to foster sustainable growth while addressing inherent challenges such as the dependency on food imports and paying back debt, and continues to grapple with legacies stemming from its colonial past. Organizations under the ministry, such as JAS and RADA, engage with smallholder farmers for advocacy and support. Despite constraints such as limited resources and global market influences, collaborative initiatives such as the JaSPICE project demonstrate a concerted effort toward resilience and self-sufficiency.

Education:

Development Actors often utilize education as a key strategy to engage with smallholder farmers. Education plays a fundamental role in agricultural development by equipping farmers with the knowledge, skills, and resources they need to succeed in a rapidly changing and competitive environment. Higher education plays an important role in shaping the next

generation of agricultural specialists. Other organizations like 4-H and the Peace Corps also see education opportunities excite the youth into agriculture and address the ageing farmer dilemma. Community outreach is a popular form of education, especially for RADA.

The government of Jamaica employs RADA as its extension arm, utilizing it for community outreach initiatives. Central to RADA's mission is farmer training, a critical function emphasized by the organization. Described on the RADA website, their approach involves employing modern methodologies such as Farmer Field Schools and conducting formal and informal training sessions across the island. RADA's role extends to providing technical assistance, including guidance on adopting new technologies and safe practices concerning chemical usage in farming. Moreover, topics such as animal husbandry and the adoption of Protected Agriculture methods are actively promoted. Additionally, RADA advocates for climate-smart agriculture techniques, educating farmers on these practices during their participation in farmer field schools.

The College of Agriculture, Science, and Education (CASE) is the leading Development Actor that is involved with agriculture development in Jamaica. Robert Logan, a senior lecturer at CASE, understands the global pressures that these smallholder farmers are up against. He has devoted his life to the study of agriculture and rural development, pursuing his education abroad, where he focused on veterinary medicine in the UK, but came back to Jamaica to teach the next generation of Jamaicans at CASE. He says, “the space that farmers need to compete in now is sort of global, because we have lost a lot of protection that we had coming with our independence. We had trade barriers and tariffs to protect the inefficient farmers. But in the main, those are no longer there. So we have to compete with the big farmers from the developed world”.

He says that smallholder farmers are rather inefficient when compared to the global competition with larger scale farmers that take advantage of economies of scale and subsidies. “Productivity and profitability”, he says, “you can’t really keep propping up these small farmers if you have not addressed those things. That is just so important”. His perspective for agriculture development for smallholder farmers is to improve their productivity and profitability.

When asked about the future of farming in Jamaica, he responds, “the survival of farming I think is dependent on institutions like CASE providing farmers with viable alternatives. Currently it’s just not good enough for them to make a decent living... by and large you really need external intervention I think, to offer something to the farmers that they can run with and yes, they can make a decent living”. These interventions, then, should ultimately increase the farmers productivity and profitability.

CASE is the primary education system within Jamaica that trains Jamaicans for working in the agriculture sector. A quote from the CASE website reads, “the faculty of agriculture is committed to teaching, research, outreach to produce graduates for the 21 century job market and advance development in Jamaica’s agriculture sector”. Here CASE is claiming that the organization’s is in the position to advance agriculture development in Jamaica.

Robert suggests that appropriate technology could improve the lives of farmers in Jamaica. The college was well represented at Denbigh, the national agriculture expo, showcasing such technology. Two of the more exciting technologies on display were the use of drone technology in agriculture and hydroponics. This technology has potential to advance agriculture development but is currently too expensive for smallholder farmers to access. While it is easy to critique cutting edge technologies, it is also important to note that CASE is involved with

research and trainings that help smallholder farmers in Jamaica, such crop production, livestock management, agricultural economics, and agribusiness.

CASE is also involved in community outreach. Robert Logan says, “you do have the farming community who depends on us for planting material or breeding animals. They depend on us for technical advice. So wherever we can support, we go to farmers group and provide education and certification on certain topics of interest.” CASE also collaborates with different government agencies, NGO’s and international development agencies to assist farmers. “When we work together”, says Logan, “then we think we will have a better chance of benefitting the farmer.”

The aging of farmers is a challenge that is not unique to Jamaica, but nonetheless is a challenge that this island nation experiences. Smallholder farmers are crucial to the local food system and enhance food security, but this demographic is aging. Young people are not interested in the hard work of subsistence farming and are turning towards other alternatives. Dan says, “I think the average age of the Jamaica farmer is still in the mid-50s. It's really a challenge to get young people involved.” External intervention from Development Actors is crucial to get the next generation involved in farming and enhance food security in Jamaica.

The 4-H club is the Development Actor that is involved with youth and agriculture. The organization has a presence in primary and high schools all across the island in the form of 4-H clubs. It is not uncommon for schools to have a garden or raise broiler chickens to supplement the food that is served for lunch. Students actively participate in these activities, gaining hands-on experience in agricultural practices. I talked with Mr. Mitchell, the Agricultural Officer for the 4-H in Jamaica. I met him at the Denbigh agriculture expo and we had a video meeting a few days after it ended.

The 4-H uses education as an action for outreach to younger Jamaicans to try and inspire them to get involved in agriculture. Mr. Mitchell highlights the Jamaica Rural Youth Economic Empowerment Programme (RYEEP) as one of the organizations initiatives for engagement. RYEEP is an entrepreneurial training program where Jamaicans can learn skills, but there is also a small grant component to it. Mr. Mitchell said that, “those who are very serious about the business entity, we select them for the builder program where they get additional funding to expand on what would have started with already.” The goal is to get younger generations into agriculture through fun competitions that draw some amount of interest.

The Peace Corps has a similar approach with educating the younger Jamaicans to get them interested in farming. Dan says, “we're trying to approach young people as, don't think about it as farming, think about it as a business, just utilizing farming to make your money”. The Peace Corps uses volunteers as outreach to build capacity in communities and educate farmers on climate-smart agriculture techniques.

Education is a strategy employed by Development Actors in Jamaica to address various challenges and foster agricultural development. From community-based outreach from RADA to the 4-H and Peace Corps effort to engage youth, educational outreach from Development Actors to smallholder farmers is evident. Institutions like the College of Agriculture, Science, and Education play a crucial role in training the next generation of agricultural specialists and advancing the sector through research and community outreach. Despite challenges such as the ageing farmer demographic, external interventions and innovative approaches aim to inspire youth involvement in agriculture and ensure the sustainability of Jamaica's agricultural future. Through education and collaborative efforts, Development Actors continue to pave the way for positive change in Jamaica's agricultural landscape.

Land:

Access to land is one of the biggest challenges for smallholder farmers in Jamaica. The absence of secure land tenure not only impedes farming activities but also undermines the socio-economic stability of farmers and their families. The inheritance-based tenure system prevalent among Jamaican farmers exacerbates the lack of formal land ownership documentation, leaving many vulnerable to displacement and legal disputes. The absence of a comprehensive agricultural land use policy further compounds these challenges, allowing prime agricultural lands to be diverted for urban development without adequate protection or regulation. Initiatives like the Agro Parks established by the Agro-Investment Corporation is an attempt at consolidating agriculture lands for cultivation, providing opportunities for investors to lease land and engage in agricultural ventures.

Land access is widely understood by Development Actors as a challenge for smallholder farmers. “Well, one of the challenges we are facing in Jamaica, as people who want to farm, whatever you farm, is land”, says Kwesi, “not many persons, although we have a whole leap a land in Jamaica, not many people have access to land, that is a issue. People who have access to land, some time, dem no have proper titles for the land, they need a proper formal arrangement for land.” Kwesi highlights the reality that many smallholder farmers in Jamaica are using lands that they don’t hold the official title for.

Donette Skervin talks about the implications of not having official title for family land in Jamaica. She says, “but the thing also with farmers is that a lot of the land that farmers are farming on were inherited from grandparents, generations coming down, but at the same time, they don't have the documents to show that this piece of land is coming down and it is passed down to [them].” In Jamaica, it is common for land to be passed down like Donette suggests. This can sometimes lead to fragmented land in small parcels. But it also presents other

challenges with the legal recognition of the land. She continues, “so it's like you're farming based on hearsay, as it relates to the tenureship. Because one of the components of being a registered farmer [with RADA], you must present ownership of the land. So either you present a lease document to the extension officer, or a title to say, I have permission to farm.” Without the official land title, smallholder farmers are not able to access certain resources.

The National Land Agency (NLA) serves as the executive agency of the Government of Jamaica tasked with overseeing various aspects of land management and administration. Specifically, the NLA is responsible for critical functions including the issuance of Land Titles, conducting Surveys & Mapping activities, conducting Land Valuation assessments, and managing Estate (Crown Land) properties. Although there is a department that is responsible for addressing the land tenure challenge, but there are still barriers that prevent smallholder farmers from obtaining legal recognition for the land.

In his position with the Peace Corps, Dan also recognizes this challenge. He says, “I mean, a lot of the farmers are, even if it is their land, sometimes they don't have the titles and it's a very complicated process to get that. There's so many different bureaucracies they have to go through to get that.” Not only is it a long, drawn out process, but many smallholder farmers lack the resources required to obtain the official land tenure.

The discrepancy between informal recognition and formal acknowledgment by the government underscores the need for policy reforms to address land tenure issues. It is because of these challenges that Kwesi claims that there needs to be policy change. He says:

“Land policy that is considerate to the people, and know that poverty alleviation and social development affi... land affi be the base of it, not only for agriculture and production. So a land policy that is considerate of that, understanding that land play an important role in

development and poverty reduction as well as increased productivity of the country as well as it helps to provide housing solutions because many people, because you see the model of farming is not just as people think it is, in a capitalistic manner. It's not just to make money, it's a whole way of life. So the small farmer lives where his farm is, and the family, the first thing is to feed the family from it. Both food and fi get income from it, so it's not just a capital enterprise. The land will be central to that because it can feed himself.”

Such initiatives are crucial for ensuring that smallholder farmers receive the legal recognition and security essential for effectively managing and developing their land for the benefit of future generations. Recognizing that land serves as the foundation for various aspects of life, including agriculture, housing, and livelihoods, the quote advocates for a holistic approach to land policy that acknowledges its multifaceted significance. Ensuring equitable access to land and promoting sustainable land management practices are essential for fostering inclusive development and improving livelihoods across society.

Policy change is something that is echoed by Joan Brown Morrison, the director of agriculture land management division. She says, “When you have a strong policy and you can have the program that come out of the policy, or the legislation that comes with the policy, then you can have better, or stronger foot to stand on for the program or the project. For instance, we do not have an agricultural land use policy. In Jamaica, we are actually now just working on it.”

Simply put, she says, “There is no legislation to protect the lands that are suitable for agriculture”. The lands that are most suitable for agriculture are also lands that are prime for real estate development. This competition is in favor of the urban developers who have more capital, as opposed to smallholder farmers who often have less. This can be seen in the difficulties that

some of the farmers experience in leasing some of the lands that used to be sugar cane production in St. Thomas. Farmers are competing with global forces.

Robert Logan's statement underscores the pressing issue of land scarcity and competition between agricultural and urban development interests in Jamaica. He says, "certainly the good lands are being used for housing. So land is not getting any more abundant. Unfortunately, a lot of really good lands are being used to build houses and hotels." This trend poses a significant challenge for smallholder farmers, who lack the financial resources to compete in such a competitive real estate market. Moreover, the absence of a dedicated agricultural land policy exacerbates the situation, leaving agricultural lands vulnerable to conversion without adequate safeguards in place.

In response to the challenges of land ownership and access faced by smallholder farmers, the government of Jamaica has initiated the establishment of Agro Parks through the Agro-Investment Corporation, a subsidiary of the Ministry of Agriculture, Fisheries and Mining (MoAFM). Agro Parks are large, continuous pieces of land that are subdivided into small parcels and then leased out to investors. These parks are equipped with essential infrastructure, including irrigation systems, to support agricultural activities. Additionally, the Agro-Investment Corporation offers comprehensive assistance to lessees in developing and implementing business plans, thereby facilitating investment and promoting agricultural development within the country.

At the Denbigh agricultural show, the Agro-Investment Corporation had a booth and were advertising the opening of two new Agro Parks in Jamaica. Currently there are 8 Agro Parks and ten Production Zones totaling 7,778 acres. It was at Denbigh that I met Owen Scarlett, the Senior Director for Agro Park Development with the Agro-Investment Corporation.

His vision of the Agro Parks is an investment opportunity, not only for the investor, but for the community with the Agro Park. He says, “we expect you as an investor when you come in, you're going to create wealth for that particular community. So, you're going to employ somebody, the community members to work on your farm.” This vision is for this style of agriculture resembles the plantation style of agriculture with a land owner that takes advantage of cheap labor to produce crops for profit.

I asked him who can be an investor into agro parks. He replied, “Well, anybody can be an investor, whether an individual or a group. So, once you have the, you have some capital you know, you have some cash in the bank, you want that to grow into wealth, you know, you can apply to Agro Investment Corporation.” The organization presents itself to investors as a way to grow wealth and economic growth from agriculture. He continues, “our long term business, we want you to grow crops that can be going to agro processing, you know, for export, you know, going to the supermarket, you know, going to restaurants.” The organization is trying to stimulate agriculture investment in Jamaica.

He brings up the topic of the sugar cane lands in St. Thomas. He says, “Also in St. Thomas, where we have the decline of the sugar industry, we are now going to see if we can get some of those land, develop our own land bank.”

In theory, this land consolidation could be a way to address some of the challenges for smallholder farmers. He says that Agro-Investment Corporation is developing, “a land bank kinda, where [investors] can lease this land with a small, medium or large size, commercial farmer to create investment opportunities for the community and as a nation.”

The potential is there for smallholder farmers to take advantage of this system. There are also optimistic plans for the produce to be connected to a wider market of agro-processing

facilities and export markets. Additionally, Owen talks about plans for an insurance for farmers using the agro parks. With the irrigation infrastructure and business plan support, farmers would benefit from leasing land from agro parks.

With only a small fraction of Jamaica's agricultural land allocated to Agro Parks (estimated at 0.5% of total agricultural land), the question arises as to whether this initiative will primarily benefit smallholder farmers or wealthy investors with sufficient capital to engage in the inherently risky agricultural sector. Only time will reveal the true impact of this endeavor. However, current indicators suggest that the Agro-Investment Corporation will continue with its agro park project and continue to attract investors, procure land, and grow agriculture production in Jamaica.

Land access challenges continue for smallholder farmers in Jamaica, impacting their livelihoods and socio-economic stability. Despite efforts by the government of Jamaica, the lack of formal land tenure recognition hampers farmers' access to resources and perpetuates cycles of poverty. Urgent policy reforms are needed to address these issues comprehensively, emphasizing equitable land access and preserving the land designated for agriculture. While initiatives like Agro Parks offer potential for agricultural development, questions remain about their impact on smallholder farmers. Moving forward, collaborative efforts among policymakers, development actors, and communities are crucial to enact policies that promote sustainable land management, empower farmers, and ensure food security for future generations.

Capital:

Access to capital poses a persistent hurdle for smallholder farmers, significantly impeding their ability to invest in and expand farming activities. However, amidst these challenges, Development Actors offer opportunities for financial support. Understanding the

dynamics of group participation is crucial in navigating the agricultural finance landscape, as funding agencies often prioritize collective approaches. While group-based initiatives provide access to grants, individual farmers may opt for loans as an alternative financing option. Some smallholder farmers who do seek loans might face barriers such as lack of credit or legal documentation.

The preference for group collaboration is evident across various initiatives. For instance, the Jamaica Agricultural Society utilizes community farming groups as channels for farmers to voice their concerns, with the JAS advocating on their behalf. Similarly, many grants programs, such as the JaSPICE program, require that applicants are legally recognized group entities. This collaborative approach offers benefits like shared resources, with the potential to benefit more people and addressing common challenges.

The Development Bank of Jamaica (DBJ) and the National People's Cooperative Bank (NPCB) are two institutions which provide financial support to smallholder farmers in Jamaica. The DBJ offers farmer grants to support the development of micro small businesses within the agricultural sector. These grants are particularly beneficial for farmers already engaged in business activities, offering them an opportunity to further expand and enhance their operations. The NPCB, formerly known as the Agricultural Bank, provides farmers with access to loans and grants specifically tailored to support farming activities. One notable offering from the NPCB is the crop lean loan, which has been utilized by farmers to finance various agricultural endeavors. However, while there are attractive offers for loans from these institutions, the loans will ultimately need to be paid back, making grants a desirable alternative.

Despite the benefits of group collaboration in accessing grants and addressing common challenges, many Jamaican farmers are hesitant to work in groups and prefer to work alone.

Jamaican smallholder farmers are individualistic and prefer the autonomy of working alone. This is further explored in the smallholder farmer section. Donette Skervin, who works closely with community-based farmer groups, and she puts it by saying, “our farmers lack what is called teamwork energy”. This reluctance to engage in group activities poses challenges for initiatives that mandate collective participation for accessing grants and support services, underscoring the need for a nuanced understanding of farmer preferences and motivations in agricultural development efforts.

When smallholder farmers decide to take out a loan, they are often met with some barriers. Kwesi points out such barriers, saying, “[farmers] have a challenge in acquiring resources in terms of credit because they no have no collateral. So the land is not there and they don’t have the necessary documents to get that kind of capital investment to improve their farming, as well as to expand it.” Without collateral or necessary documents, farmers face barriers in accessing credit to enhance their farming practices and expand their operations. This cycle perpetuates the financial constraints experienced by farmers and underscores the need for comprehensive solutions to break this cycle of dependency and enable sustainable agricultural development.

The challenge lies in bridging the gap between farmers' needs and preferences and available financial resources. While group-based initiatives offer avenues for support through grants, not all farmers are interested in working with groups. Individual farmers face hurdles in accessing capital through loans. Smallholder farmers often face barriers such as lack of credit or legal documentation, highlighting the need for tailored financial mechanisms to cater to diverse farmer needs. Addressing these challenges requires nuanced approaches that consider farmer

preferences and motivations, ultimately enabling sustainable agricultural development in Jamaica.

Market:

Access to markets is another significant challenge for smallholder farmers in Jamaica. Improved market access and fair prices for their goods could enhance their profitability. However, the current market structure is fragmented, lacking a cohesive, island-wide system. Market-Driven Agriculture and Fisheries Production is a strategic priority of the Ministry of Agriculture, Fisheries and Mining (MoAFM).

Donette voiced her opinions about Jamaica's fragmented market, saying, "I am not going to say there isn't any market at all for the farmers' produce, but our marketing structure, as it relates to farm produce, is very fragmented. There is no clear-cut way to say to the farmer, I can give you this or that for your produce. It is like everybody's just putting their hands in the tail when marketing is concerned. No structure is there." She believes that better communication across the island, and a system to share certain crops between parishes experiencing a surplus and those with excess, could help farmers get better prices for their crops.

She also discusses farmers entering contracts with buyers. While many farmers I interviewed were not enthusiastic about such contracts, despite the benefits of guaranteed buyers, Donette has a different perspective. She says, "The issue that these suppliers, the purchasers, will face from the farmers is commitment. Farmers are not committed to the contract. They enter the contract and a vendor will come and say, okay, I am giving you \$10 more than what the contract is saying. And then the farmer breaks that contract. And when the purchaser comes now, either he gets less or he gets nothing. So that kind of issue is plaguing in terms of setting up a

marketing structure, how to get the farmers to be disciplined to be committed to a contract.” This lack of commitment deters buyers from working with smallholder farmers.

The government has initiatives to encourage farmers to grow popular crops to offset imports, such as potatoes and onions, through the National Onion Project and the National Irish Potato Project. The government connects these farmers with buyers and often provides additional assistance to those participating in these projects. Donette notes, “Farmers involved in the National Onion Project, the National Irish Potato Project, all the national projects, the government tries to get those farmers to be contracted to a supplier who takes the produce from the farmer based on the contracted price.”

Robert Logan mentions another challenge: access to technology. This topic was also highlighted by Brown in her research but did not come up in my interviews with farmers. Robert says, “It’s all about using technology. Technology is getting cheaper, when I say technology, I’m talking about ICT (Information, communication, technology). Yeah, you have your devices, your smartphones, tablets, the internet, pure accessibility. That’s probably where we would have to go as far as some of the challenges pertaining to marketing.” If farmers were more connected, as Donette suggested, they could improve market access.

Agro-processing and value-added products are areas key stakeholders are focusing on to expand the agricultural sector. This was a prevalent theme at the Denbigh Agricultural Expo. Dan highlights the issue of post-harvest management, saying, “Another big issue we have a problem with is post-harvest management, right? Because people are such small stakeholders, they don’t have access to, you know, freezers, other cold rooms to store the stuff, and maybe sell it later.” Without proper storage, produce can go to waste if farmers are unable to find buyers.

Donette discusses the potential of agro-processing, particularly in national projects. She says, “If we are able to grow enough potatoes and process it as a mash, that you can take that dried potato, you can stretch for a family of six, so it can replace rice. But then, where is our agro-processing facility to get that going? So, as you asked before, our opportunities, it is mostly always in raw production, but there is great potential for us in terms of agro-processing, which we do not tap into a lot.”

Mr. Mitchell talks about promoting agro-processing in youth education through 4-H. He says, “We're looking at, for example, ginger and turmeric. We can powder those, we can package them out and we can have them for up to next year, the year after. So those are some of the things that we're looking at to kind of curb the glut that we experience from time to time.” This could lead to increased profitability and production for farmers.

Agro-processing and warehouse rental are also promoted by the Agro-Investment Corporation. Owen mentions that they encourage farmers to grow crops suitable for agro-processing, such as converting locally produced breadfruit or cassava into flour.

Smallholder farmers in Jamaica face significant challenges accessing markets, affecting their profitability and sustainability. The lack of a well-organized market structure and clear communication channels makes it difficult for farmers to secure fair prices and reliable contracts with buyers. While government initiatives aim to connect farmers with buyers, development actors highlight farmers' lack of commitment to contracts and limited access to technology. Promoting agro-processing and value-added products could help address market fluctuations, but without proper post-harvest management infrastructure, farmers risk waste and financial losses. To overcome these challenges and support sustainable growth, efforts are needed to enhance

market structure, communication networks, and investment in post-harvest management infrastructure.

Climate Change/Sustainability:

Development stakeholders often center their discussions on climate change within the realm of agricultural development, expressing concerns about both its immediate and future impacts on the sector. Many of these stakeholders adopt a holistic approach, emphasizing concepts such as "sustainability" and "resiliency." This forward-looking outlook considers long-term implications, contrasting with the more immediate concerns typically voiced by smallholder farmers. International organizations significantly shape agricultural development by including sustainability components in grant requirements. The government of Jamaica and other development stakeholders widely recognize the risks associated with climate change, as evidenced by their various initiatives and programs.

The government of Jamaica has acknowledged the importance of addressing climate change in the agricultural sector through policies such as the National Food and Nutrition Security Policy. This policy explicitly states that "focus should be on finding ways in which Jamaican farming systems can adapt to climate change, particularly in reducing farmers' vulnerability" (Ministry of Agriculture and Fisheries, 2013). It emphasizes the need for adaptation strategies to reduce farmers' vulnerability and promotes climate-resilient development strategies for food and agriculture. Additionally, the government has established the National Agricultural Disaster Risk Management Programme to address the increasing risks of agricultural disasters exacerbated by climate change.

Development actors like the Peace Corps are actively involved in promoting climate change readiness through initiatives such as the Sustainable Agriculture and Livelihoods

Initiative. This initiative focuses on improving agricultural productivity and sustainability by addressing soil and water management practices through outreach by Peace Corps Volunteers. Dan expresses the unpredictability of the weather and how it has been affecting Jamaica, saying, “climate change is really hitting Jamaica hard... farmers used to be able to predict the day that rain, you know, dry season would end and rainy season would start... nobody knows anymore.” The goal is to improve agricultural productivity and sustainability on Jamaican farms by promoting adaptation strategies to cope with changing weather patterns.

There is recognition, however, of the need to balance climate change adaptation with farmers' immediate economic concerns. Dan talks about the reality that smallholder farmers face when trying to balance: “But we have to be careful about pushing agendas because while we might all think this is the best way to do it ecologically and everything else, farmers are human beings first. They have got to send their kids to school. They're not going to be so worried about the ecological impacts. They're more worried about can they survive and put food on the table this month and send their kid to school, right?” This highlights the importance of crafting adaptation strategies sensitive to the immediate socio-economic realities of smallholder farmers, ensuring that interventions are sustainable both for climate change adaptation and for smallholder farmers' livelihoods.

Development actors use education and outreach to increase farmers' awareness of climate change impacts. Universities like CASE offer courses related to environmental sustainability, including soil conservation practices and livestock waste management. However, there is acknowledgment that these offerings may not be sufficient to adequately address sustainability issues across various disciplines. Robert Logan admits that there is not enough being taught about climate change and sustainability. There is a perceived need to expand the curriculum and

incorporate more comprehensive education on sustainability to better prepare students to tackle environmental challenges in their future careers and communities.

Development actors in Jamaica increasingly recognize the urgent need to address climate change within the agricultural sector. Through policies and programs, efforts are underway to promote adaptation strategies and enhance resilience among smallholder farmers. However, there's a crucial balance to strike between climate change adaptation and addressing farmers' immediate economic concerns. While education and outreach programs aim to increase awareness of climate change impacts, there's a recognized need for broader integration of sustainability education across disciplines to better prepare stakeholders for the challenges ahead. Overall, a multi-faceted approach is essential to ensure sustainable development that prioritizes both climate resilience and livelihood security for smallholder farmers in Jamaica.

Smallholder Farmers

The purpose of this section is to highlight the perspectives of the smallholder farmers. This section aims to provide insights directly from the smallholder farming community, offering a response to the initiatives discussed in the preceding section. By building upon the perspectives of Development Actors, this section seeks to contextualize the experiences and challenges faced by smallholder farmers within the broader discourse of agricultural development in Jamaica.

Smallholder farmers do not experience the same challenges. Brown (2014) emphasizes the diversity within the smallholder farming community, noting that these farmers are not a homogeneous group. Their motivations, priorities, and identities are shaped by various social, economic, and cultural factors, resulting in a wide range of experiences and perspectives. The voices and perspectives that are included don't fully represent the demographic of smallholder farmers in Jamaica, and I wouldn't even say that the group fully represents the smallholder

farmers that are in St. Thomas or even more locally the community of Hayfield. But by looking into their answers and finding commonality, we can try and better understand what the main challenges are of smallholder farmers and make more informed decisions that ultimately affects this group.

Government:

Smallholder farmers in Jamaica have varying perceptions of the government, which serves as a prominent development actor in the country. Their interactions with the government primarily occur through the extension arm of the Ministry of Agriculture and Fisheries, where they engage with extension officers from RADA. Consequently, much of the discourse surrounding the government's role centers on RADA's involvement with farmers. While some farmers express mistrust in RADA and raise concerns about its lack of accountability, others rely on the organization for assistance. Inconsistencies in the government's messaging draw criticism, especially from farmers who practice organic agriculture.

Many smallholder farmers, including Stella from St. Thomas, express a common sentiment regarding the perceived lack of support from RADA in their agricultural endeavors. She states, "Me no see dem do nothin more than so. Dem no do nothing more already still. Ca me na see dem maybe once a while dem give you something. Me no see wha dem give you." Other farmers share this perspective, acknowledging that while RADA occasionally provides free items such as fertilizer, machetes, or rain boots, they perceive the organization as offering limited support overall.

In an interview with Soba, a young farmer from Hayfield, he shared his perspective on the government's role in agricultural development. I asked him how government organizations such as RADA, JAS, and the Ministry assist farmers. Our conversation went like this:

Soba: “Well a couple days ago me a look bout me farmers ID an so enuh, and ... (chuckles), me no really get nothin from them yet. When me say dat, yet, you know, so maybe if me ago get anything. Ca me no get anything from them yet. So me couldn’t tell you seh if dey good or dem bad.” Joel: So you’re talking about RADA? Soba: “Yes.” Joel: So besides giving you things, what is the use of RADA or JAS? Soba: “Yeah, fi give the farmers, you know, like ferti and so on, you know? And seeds too.”

Many farmers feel that RADA's role is primarily about distributing free items rather than providing substantial support, creating a perception of dependency rather than empowerment among the farming community.

Some farmers, like Lloyd, have come to expect that RADA gives out fertilizers. Lloyd reflects on RADA's support by saying, “Well, very less. Very less. I like the idea with RADA, but they slow, with farmers. Especially the small farmer like we here. Less. Because, what RADA need fi do, in due time you give we some fertilizer.” Lloyd emphasizes the importance of timely provision of fertilizers for his coffee plants, underscoring the reliance of farmers on RADA for crucial agricultural inputs.

Not all farmers are glad that RADA is giving away fertilizer and promoting conventional agricultural practices. Farmers who practice organic farming, like Junior, don’t like how RADA is giving out free chemicals for farmers to use. Junior says, “RADA is old-fashioned and they are not susceptible to changes, or they're definitely not with what's good for the people. Because RADA are the ones that will pack us up with fertilizers.” He talks about the importance of soil health and how RADA is promoting increased production and growing crops in bulk. He concludes with, “so I think RADA is lame. Yeah. Because they're still pushing more of a global agenda than a local agenda. And they go for the export.”

There's a discrepancy between the government's rhetoric of "eating what we grow" and the reality of government entities promoting food production for export markets. Zuberi, another farmer who practices organic farming, questions the logic behind prioritizing export-oriented agriculture, as it raises concerns about the quality of food available for local consumption. He highlights the stringent standards imposed on exported food products, such as low chemical residue levels, while domestic food safety regulations remain lax.

Zuberi says, "They say we should eat what we grow and stuff like that, but yet a lot of government entities are pushing us to grow food for the export market. So when you grow food for the export market, what are we going to have? I think to even export food, there's a high expectation, like the residue, the chemical residue, got to be very low, but yet there's no regulation on the residues for domestic use. So it seemed like we're growing the greatest stuff to export, but we could eat any garbage, you know, and I find that to be insult in a way."

Some smallholder farmers in Jamaica are critical of the government's involvement in agriculture and exhibit a general mistrust towards institutions like RADA. This skepticism is part of a broader sentiment of distrust among smallholder farmers towards government entities. When asked about the role of RADA and the government in agricultural development, Zuberi expressed uncertainty and skepticism: "What their role is? I'm not sure. Okay. Because as me say, them talk that they want to improve agriculture, but to me it's just talk. You know, a lot of the issues they're not addressing. I think they're more of a hindrance more than anything else."

This reflects a common perception among smallholder farmers that while government agencies may articulate plans and promises to enhance agriculture, their actions often fall short of addressing the practical issues faced by farmers. Many farmers feel that these institutions do

not provide the necessary support and resources and instead can be more obstructive than beneficial.

Nick is one farmer who is not very trusting of the government, especially RADA. In our conversation, we discussed some of the challenges he experiences. He noted that it would be nice for development actors, specifically referring to banks, to perform outreach and “check on farmers, see what farmers need, see where farmers are weak. Have someone going to check on farmers on a regular basis.” This action is exactly what the extension officers at RADA are tasked with doing. When I followed up by asking him, “what about RADA?” He says, “No, RADA, to me, RADA is not helping as much. Because there are so many things that come to RADA, [water] tanks come to RADA, fertilizers. When you look at it now, everyone at RADA is doing farming, so everyone at RADA now take those things, or they have their friends come in and collect, but at the same time, it's for the RADA officers they are collecting for. Yeah man, that is basically how the thing is working, you see right now, if it's not links, you are not getting anywhere. If a no link, you nuh get no weh.”

To him, the people at RADA are taking advantage of the system and he doesn't trust them, so he doesn't end up working with them. Resources such as water tanks and fertilizers were often misappropriated or distributed unfairly among RADA officers and their associates, undermining the effectiveness of the institution. This perception led him to distrust RADA and refrain from collaborating with them.

During the interviews, the term "government" was frequently used to refer to one of the numerous agencies constituting the Jamaican government. For instance, Zuberi highlighted that "the government is making it very hard to import organic seeds." Given the myriad challenges faced by smallholder farmers and the broader issues confronting the Jamaican government, it is

unsurprising that the government often finds itself at odds with smallholder farmers. The historical context further exacerbates this strained relationship, contributing to a general lack of trust among Jamaicans towards the government, which persists to this day.

Even the JAS, which claims to be an organization that advocates on behalf of smallholder farmers, is prone to criticisms from farmers. On the topic of the JAS, Junior responds, “JAS, now to me, they're like very much interested in you when it's time for the annual general election. Apart from that, you hardly hear them. But when it's election time they are all over your phone.” This highlights a common frustration among farmers who feel that the JAS only engages with them during election periods, seeking support rather than consistently addressing their needs and concerns. This perception of opportunistic behavior further contributes to the mistrust and dissatisfaction among smallholder farmers towards agricultural organizations and government institutions.

The interviews with smallholder farmers in Jamaica reveal a complex relationship with the government, particularly through its agency RADA. While some farmers express appreciation for occasional support from RADA, many harbor deep-seated mistrust due to perceptions of mismanagement and favoritism within the organization. This skepticism extends to broader issues of government involvement in agriculture, with concerns ranging from inconsistent messaging to the prioritization of export-oriented agriculture over local food security. Farmers like Nick and Zuberi highlight the disconnect between government rhetoric and on-the-ground realities, further eroding trust. Overall, these insights underscore the need for transparent and equitable agricultural policies that prioritize the needs and well-being of smallholder farmers, ultimately fostering a more trusting and collaborative relationship between farmers and government institutions.

Education:

In the dynamic landscape of agricultural development, the narratives of smallholder farmers offer profound insights into the intricate relationship between local knowledge and formal education. Through their lived experiences, smallholder farmers underscore the complex interplay between traditional wisdom, practical needs, and institutional interventions in sustaining agricultural livelihoods.

The significance of local knowledge in agricultural practices is exemplified through the experiences of smallholder farmers like Lloyd. A seasoned coffee farmer in his 70s, Lloyd's lifelong dedication to farming highlights the profound role that local expertise plays in sustaining agricultural livelihoods. Coming from a large family, Lloyd has provided for himself and supported his family through farming endeavors. For Lloyd, farming is more than just a job—it's his expertise. As he proudly states, “that’s my degree. You know, I know everything about farming.” Later, he emphasizes, “That’s my living. Farming is the best.” Despite the challenges of farming, Lloyd has been able to provide for himself and his family through the fruits of his labor and feels a deep connection to the land.

Another farmer, Mrs. P, echoes Lloyd’s sentiments about farming. A long-time farmer in Hayfield, Mrs. P speaks highly of farming as a profession. She says, “that is my education, farming.” Having farmed for many years, these farmers have mastered the skills necessary to produce food in their local food systems. Mrs. P shared a story about applying for a visa to the US, proudly claiming farming as her profession to the embassy employee. Farming is a source of joy and fulfillment for her. She says, “the more I plant and see it come prettier, the more I want to work.” At 70 years old, she intends to continue farming for as long as she can, driven by her passion and deep-rooted local knowledge.

The experiences of Lloyd and Mrs. P highlight the crucial role of local knowledge in agriculture, especially in challenging environments like mountainous terrains. Unlike formal education, which can be inaccessible or impractical for many rural farmers, local knowledge is acquired through hands-on experience and community wisdom. Lloyd claims to have never been to a farmer field school organized by RADA, saying, “no, I never been a dat [farmer field school] yet, I never, I know bout it, but I never get to it.”

Chippy, a younger farmer from Hayfield, learned farming through observation and hands-on experience rather than formal education. He explains, "me no really learn fi farm, as what me tell you is true, we come from a likkle farming area and we see everybody a farm we kinda have a skill and we know how fi do it." This indicates that Chippy's farming knowledge is deeply rooted in local practices and community-shared knowledge.

When asked about the farmer field schools organized by RADA, Chippy responds, "yeah me go deh more dan one time. They aright, you know seh me wan sign up [with RADA] too and me can get a few bag a ferty and ting." This highlights a critical aspect of how farmers perceive governmental programs. While RADA aims to promote climate-smart agriculture through these field schools, they often use incentives like free fertilizer to attract farmers. Chippy's comment suggests that for many farmers, the draw to these programs may be more about the tangible benefits (like free fertilizer) than the educational content itself.

Soba, another young farmer from Hayfield, discussed the farmer field school programs organized by RADA in our conversation. I asked him about his thoughts on the training sessions:

Joel: “What about the trainings?”

Soba: “Sometime dem come up here, you know, and do dem training and so.”

Joel: “Do you think they are efficient? Do you learn from those things?”

Soba (hesitates): “Yeah... yeah from (laughs).”

Joel: “Do you ever take the techniques and put them on your own farm?”

Soba: “Yeah, like the, um, contours? Yeah, me do those a regular man. When me have a banana tree an you know, me do those on regular.”

This exchange highlights Soba's mixed feelings about the efficiency of the trainings but also shows that he does incorporate some techniques, such as contour farming, into his practices.

Why do smallholder farmers not attend farmer field school? RADA officers are trained at CASE, the institution to train development actors in agricultural development. There are often incentives to get farmers to attend by providing lunch for the day or even free fertilizer.

Zuberi makes a point that he prefers more organic and sustainable techniques be taught, which is somewhat ironic because RADA promotes climate-smart agriculture and sustainable practices. However, organic farmers like Junior and Zuberi are critical of the farmer field curriculum. Zuberi says, “it's the knowledge of how to do organic farming. If we can have workshops to teach [farmers] these things, maybe a lot of them would more accept that.” This indicates a gap in the current educational offerings provided by institutions like RADA, which may not adequately address the evolving needs and preferences of farmers, particularly those interested in organic and environmentally-friendly farming practices.

While critical of the farmer field schools, Zuberi also mentions that teaching farmers about the proper usage of chemicals could lessen the harmful effects of agriculture. Zuberi's concerns about farmers' literacy levels and their ability to read and understand chemical

instructions underscore a significant challenge in agricultural education. “I think with RADA, people need to do a lot of training because a lot of the farmers can't read or they can't read that well. And to actually read the instructions on how to use those chemicals, a lot of them don't. And they misuse the chemicals. Like, um, ticks wash. They'll use ticks wash on fruits and vegetables.” Without adequate understanding of the chemicals being used for farming, farmers may inadvertently misuse chemicals, posing risks to both human health and the environment.

There still exists reluctance among some farmers, like Warrol, to attend farmer field schools, highlighting a common sentiment among smallholder farmers who may not see the relevance or applicability of the training provided to their farming practices. Despite incentives like the potential for receiving fertilizer or free lunch, these farmers may feel that they already possess sufficient knowledge and skills to farm effectively.

Warrol: “Yeah me no really do [farmer field school], me dun know how fi do me ting.”

Joel: “So you don't need to learn?”

Warrol: “mhm me know how fi do me ting. Mek me tings come, me just want a little fertilizer, and give me a money. Just gi me the fertie and gi me a money. Me sort out myself an get a help. Nothing more.”

For Warrol, the primary concern lies in obtaining tangible resources like fertilizer, emphasizing his desire for practical support rather than educational interventions.

These perspectives underscore a potential misalignment in messaging. While RADA's goal is to educate farmers on sustainable practices, the immediate, practical benefits are what primarily attract participants. This doesn't necessarily undermine the value of the field schools but suggests that the incentives are crucial for participation. While the free items might initially

draw farmers in, it also provides an opportunity for RADA to impart important agricultural knowledge once the farmers are engaged. Thus, the incentives could be seen as an effective strategy to increase attendance and subsequently promote the adoption of climate-smart practices.

There is also criticism of the sustainable farming techniques, with some claiming that RADA doesn't do enough to promote organic farming. How can RADA claim to promote climate-smart agriculture when fertilizer and chemical usage are the topics of the farmer field school and RADA is actively engaged in distributing such resources to farmers?

Education is a constant process. Whether seeking formal education or learning from hands-on experience, farmers are constantly learning. Nick describes farming as a complex and meticulous profession, emphasizing the extensive use of chemicals required just to grow the plants. We joke about how his farming technique sounds like working in a chemistry lab and not farming in the field. Nick elaborates, "So it's just like you're in a classroom learning. Each time you plant, you try to make sure that you learn something new from the plants. You learn how to do your maths better for the next time." This analogy highlights the educational aspect of farming, where each planting season offers new lessons and opportunities for improvement, requiring farmers to constantly adapt and refine their techniques.

Overall, these diverse perspectives underscore the multifaceted nature of agricultural education and the ongoing commitment of farmers to adapt, innovate, and sustainably steward the land for future generations.

Land:

Access to land presents a significant challenge for smallholder farmers in Jamaica, where the majority of land is owned by a minority of individuals. While some smallholder farmers may

have access to family land, this informal arrangement often lacks legal recognition by the government. Moreover, the land available to smallholder farmers is frequently situated on less desirable terrain, characterized by steep slopes and limited access to water sources. In contrast, the more coveted lowland areas offer flat terrain, proximity to water sources and roads, and greater fertility, making them highly sought-after for both agricultural and housing purposes. The absence of agricultural land policies exacerbates this issue, leading to the gradual loss of agricultural land, as highlighted by development actors. Farmers often resort to leasing land, which diminishes their profits, or cultivate land without legal title, further complicating their land tenure rights.

The story of this struggle is best captured in the interview with Nick, a farmer in his 30s who has been farming for over 13 years. Living closer to Morant Bay, he doesn't own any land and relies on leasing land for most of his farming. However, he does have a small plot of land given to him by a Rastafarian community, where he grows long-term plants like trees. This 4-acre plot represents a more sustainable investment into the land. Nick leases other land—10-20 acres—to run a larger operation and cultivates quick crops on it.

Nick has experienced challenges with leasing land. When the St. Thomas sugar cane factory closed in 2019, the land used to produce sugar cane went dormant. The demand for these fertile lands increased, with unlanded farmers competing against developers who want the land for housing. With the completion of the South Coast Highway, land in St. Thomas has become more expensive, further burdening smallholder farmers. Private holders make it difficult for smallholder farmers to access the land.

In Jamaica, one must have connections with landowners to work on the land. Nick is struggling with access to this land. Regarding the sugar cane situation, four years after the lands

stopped sugar cane production, he says, “You can lease, but you affi know the persons you fi link fi get it fi lease, or you can't get it.” When asked if he is able to buy the land, he responds, “No, them na sell it, because then you have some direct persons responsible for the lands, so it's not really government land. Some of them are government land, while some of it is like investors like me, who own them land deh and lease the land.”

Junior says, “Let's say who is to have land already have it. If you never inherited no land or you didn't make enough money to buy any, it's not easy to get land now.”

Zuberi, a farmer who practices organic farming, is also trying to take advantage of the newly available lands for farming. He lives with his family near the town of Bath in St. Thomas and close to the lands formerly used for sugar cane. “Yeah, when they shut down the sugar cane, the cow farmers are taking over the lands. The Sugar Estate people then started to lease out all of this land. So it's been divided up into four-acre plots. And they're renting it, they're leasing it to people.”

Although the land is not being used for sugar cane and much of the land is passively being used for cattle grazing, leasing the land can be a challenge. Zuberi says that the process of leasing land is slow. “It’s a slow process with leasing out the land. Yeah. There's three and a half acres down here that we're in the process of leasing. And it's been in the process almost three years now.” From a production standpoint, that is three and a half years that Zuberi isn’t able to use the land to grow crops to support himself and his family.

The process for leasing land is long and drawn out, but it is even more difficult when trying to purchase prime agricultural land. Zuberi says that “there's wealthy people that own a whole heap of land. And when you check into it, how did they come by this land? (laughs) It’s

like a big question mark.” Land in Jamaica is limited and there is a demand for fertile agricultural lands. Since the days of colonial rule, the elite planter class has passed down the more desirable lands to their kin, while the smallholder farmers struggle with food sovereignty without the ability to own land. Zuberi can attest to this, saying, “people have been asking, can I get this land to buy? ... And it's very difficult to buy these lands, you know.”

With urbanization and urban sprawl from the capital city of Kingston, people are looking to St. Thomas for housing options. People searching for housing and developers looking to build on newly vacant land are competing with the local farmers. Zuberi speaks on this challenge, saying:

“So many people from town have bought land up here. I mean far away from the main roads. But there are hotels and stuff like that being built out there on that side. And as I said, people from town are buying up plots of land to build their homes. So, it's difficult. I mean, even up in the hill there, the price of land is just skyrocketing.”

The land in Jamaica is limited and there are competing interests vying for the fertile flat land. The multiple parties in competition have different development goals and different resource pools to draw from. The land in the mountains is usually easier to access for smallholder farmers. This land in the mountains is less fertile, has more aggressive slopes, is further away from main roads, and more difficult to navigate. Hayfield is such a community where these conditions exist, and farmers have adapted to hillside farming.

At the base of the Blue Mountains and the John Crow Mountains is a community called Castle Hill. This community is a good contrast between the fertile lowland that is in high demand and the marginal, aggressively sloped land in the mountains. Farmers are close enough to both of

these options that a farmer could choose to pursue either option. In an interview with two farmers from Castle Hill, access to land wasn't the biggest challenge for them.

Stella is a farmer from Castle Hill who has been farming for many years. She suggests that it is easy to lease land. She says, "you have some weh you can lease and farm, beca if you want you can get piece fi lease." She says that if you really want to get a piece of land to farm, then that isn't very hard to do, pointing towards the mountains. She agreed that it is cheaper and easier to lease the land in the mountains than in the valley.

Because the land is difficult to navigate with poorly maintained roads and dangerous, narrow walking paths, there is less traffic into the mountains. There is less documentation and enforcement of legally recognized land boundaries in the mountains. The further away from the road, the easier it is for unlanded farmers to claim unused land for agricultural purposes. Some of the farmers in Hayfield farm on family land, but when asked, they don't necessarily have the paperwork for the land.

Warrol is a coffee farmer in Hayfield, over 50 years old, and does, "farming fi a living." He isn't one of the farmers who believes that farming is easy, saying it, "Cyan easy. It tough, it hard." The land he farms is far away from where he lives, accessible by walking a few miles over steep terrain. Just getting to the land is a challenge. "Most of the land deh out deh far. Some people na go deh so, who can go deh go work dem. An when the load a come, put pon yuh back and carry it out. Ca it deh far. So who have the strength will go. Who no have the strength must stay and cyan go." Warrol is saying that the land that is available is difficult to get to, so only the strong can farm on the lands that are available.

Warrol says that not everyone in Hayfield owns the land they farm. When asked if he owns the land that he works, the conversation went like this: Joel: “Do you own the land that you work?” Warrol: “Mhm, yeah. Yeah man, me own a likkle (mumbles) ... my own dem.” Joel: “Do you have the title for it?” Warrol: “No, me no really have no really title still, but everybody dem know seh is mine.”

This interaction sums up the reality that many farmers in Jamaica experience. Farmers utilize land and everyone in the community could recognize it as theirs, but when it comes to official recognition, the farmers aren't able to produce any documents to claim that the land is theirs. This isn't necessarily a problem, until it is. At any moment, the legal owners of the land could evict the farmer and seize any produce growing there.

Mrs. P is aware of this and has been in the situation. She only uses land if she has something that shows she has permission to work the land. “Because when you work on land and you don't have anything to show, people take any step off it, and you can work and people come run you off and they take it. And suppose him dies before you, some people can come and kick you off and all the laborers go in jail. So you give me a paper.” She also mentioned that it matters how you treat people and who you know. If you get along with people who have land that is available for agriculture purposes, then it is easier to use that land. It matters, “how you move with people and how you live with people,” as she says.

This is true about leasing or using land from strangers, but the same concept applies for family land. A lot of the land in Hayfield is considered family land. An interview with Soba, a young farmer in Hayfield, reveals that land is not an issue for him because he has access to family land. Soba is in his twenties and has been farming for over ten years now. Most of his family members are farmers, and he says that he just fell into farming because of where he grew

up. He says, “me kinda interested in it from way. Because at the end a di day, from me deh ya so, it me affi look. You see me.” Because he grew up in a farming community, he more or less has to farm, as there are limited other opportunities in the community.

When I asked Soba about access to land, he said that land isn’t really a challenge for him. When asked about the land that he farms, he says, “a family land still enuh, you see me. Whole leap a acres man, whole leap a acres. Up a this side, same way, family.” But when questioned if there was a title for it, “Alright, me no really know if (thinks for a moment)... yeah, dat piece, that piece over there (points up the road), title is there for it. But down a this side, me no sure bout down a this side.” This is a common theme for many farmers in Jamaica who have farms on family land.

In rural communities, farming stands out as one of the few viable economic options, prompting many to pursue it. However, smallholder farmers face additional hurdles when accessing land. They often resort to the arduous process of leasing or settle for less favorable mountainous terrain, often inherited within families. Jamaica's legal system sometimes fails to acknowledge land passed down informally or claimed by individuals. Consequently, farmers may resort to cultivating land without formal rights. This is not to suggest they're engaging in illegal activities; rather, it underscores the land sovereignty issue. Without secure land access, farmers risk losing their hard-earned yields, exacerbating their already slim profit margins.

Capital:

Access to capital is another significant challenge for farmers in Jamaica. Many farmers contend that financial resources are critical to their operations. This issue is intertwined with the challenges of accessing land, as acquiring or leasing land requires substantial investment.

Unfortunately, securing the necessary capital can be a significant challenge for smallholder

farmers. The avenues available, such as grants, often require group participation, a condition that many farmers are hesitant to meet. Loans then become the alternative, especially for younger farmers looking to expand their agricultural endeavors. However, loans carry the risk of debt, exacerbating the financial instability caused by market fluctuations and environmental unpredictability. Thus, many farmers argue that enhanced access to financial resources is essential for improving their productivity and sustainability. With limited resources, smallholder farmers often don't have the necessary capital to insure their farms, making them susceptible to natural disasters.

Money plays an essential role in the lives of smallholder farmers, who value it highly. Warrol encapsulates this sentiment by saying, "A money run tings a Jamaica." Barros echoes this, emphasizing the importance of financial stability: "If you have money, you ago happy, or when you no have no money, it come like it hard, no true?" Despite the challenges, Barros remains optimistic about the opportunities that farming provides, noting, "Because three months time, something can reap. Cucumber, corn, no true? Nothing na hard."

The belief that money can stimulate their fields and enable them to grow more plants is widespread among farmers. This belief is why Warrol suggests that the most significant assistance he could receive for farming is financial support. "Just give me a money fi a help myself ina farm," he says, adding, "give me a likkle money, me can pay some people fi help me." The infusion of money is seen as a crucial factor that can enhance productivity and ease the burdens of farming for smallholder farmers.

Reliable labor is a significant challenge for farmers, who often struggle to find dependable help for their farms unless they have the money to pay for it. Farmers frequently express frustration with the difficulty of securing labor assistance. Lloyd highlights this issue,

saying, "It don't easy an if you don't have the money, fi employe some hand, or cant get help, then it rough fi you as a one man." He shares how the lack of capital to hire help has directly impacted his income, recounting, "Three years straight, my coffee spoil. Because me no get the help." Lloyd firmly believes that with sufficient capital to employ workers, his farming operations would be much more successful. This situation underscores the critical role of financial resources in enabling farmers to secure the labor necessary for maintaining and improving their agricultural productivity.

One of the primary avenues for financial support is through grants. However, most grants are only available to farmers who work in groups. This stipulation poses a problem for many smallholder farmers who are reluctant to form or join groups due to various personal and logistical reasons.

Zuberi is a farmer who is hesitantly involved with two different farmer groups. He says, "I think working in a group is very beneficial because there's strength in numbers, right? But organizing those groups now is a very difficult task, you know? Because people have this mindset not, we have this mindset of not trusting one another."

Zuberi confirms what Donnette says about Jamaicans lacking "teamwork." He continues, "Transparency is a big issue here in Jamaica. So, a lot of people are very (pauses for a few seconds) ... not trusting of groups. And as I said, just to get the whole group to function is a problem."

As an alternative to group collaboration, farmers often turn to loans to secure the needed funds. Younger farmers, in particular, view loans as opportunities to scale their agricultural operations and increase their income. However, taking out loans comes with the inherent risk of

accumulating debt. This financial burden can be particularly severe for farmers whose income is already unstable due to factors such as fluctuating market prices, unpredictable weather conditions, and other agricultural risks.

Nick echoes the idea that you need money to farm in Jamaica. He says, “So, it’s like you have the money fi pay man, or you have the water fi mix with chemical, fi can spray and at the same time you cant spray too close to your plant, so you a need man fi come out and weed it.” Nick needs money to pay for help on his farm as well as money to pay for the inputs that his style of farming requires. He continues, saying, “So a whole leap of challenges deh deh. So as me tell you inna Jamaican ya, money. If you no have the money fi run the ting, it na work for you. You affi have the money fi run it. Affi have money fi run it breddeh.”

Not only are labor and inputs expensive for farmers, but Nick is a farmer who has relied on loans to be able to access land for agriculture. He is one of the farmers interviewed that is not from Hayfield and doesn’t have access to family land like some of the other farmers do.

He speaks about the challenges of getting access to capital. He says, “To even get money to do farming, it’s pretty much hard, cause especially if you’re not from a strong background, you affi go on and do loan. And it’s very hard to get loan, yeah or you affi seek persons to help you.”

Nick was able to get a loan which helped him start farming, but he is still paying off the loan payments. He says, “Loan me did affi do fi start out my farming, an me a pay loan and all that, cause me a pay like 60,000 a month fi loan. And me a try me best fi get that off a me.” But even after the 13 years of farming, he is still working to pay the loan payments.

When I asked Nick if getting loans has been worth it, he replied:

“No, not yet, but the ting is enuh, you really want to do what you have to do. So you say, aright then me ago run the risk, me ago make the sacrifice beca me affi reach someweh. You know seh when you decide you affi reach someweh you ago do whatever it takes to reach weh you wan fi reach. So you ago do it. Beca you a seh you no have no next option. Make sure seh you a do what you affi do, you understand, in order fi you can benefit in a di long run.”

Nick sees loans as a necessity but remains optimistic that his hard work will pay off. However, taking out a loan carries the risk of failure and potential debt. With limited economic opportunities, some farmers like Nick are willing to take this risk to try and make a profit. For many farmers, getting a loan is seen as an attractive and potentially lucrative investment. In theory, a loan allows farmers to expand their operations and address arising issues. With more land, they can plant more seeds and expect to harvest more crops, thereby making more money. This mindset reflects the thought process of some farmers regarding farming.

Many farmers express that a straightforward solution to ease their farming challenges is increased access to financial resources. They believe that having more money would enable them to invest in better equipment, seeds, fertilizers, and other essentials that could enhance productivity and sustainability in their farming practices.

Chippy is another farmer who is optimistic about loans. He is the youngest farmer that I interviewed at only 20 years old. When I asked what could be done to help him as a farmer, access to a loan was one of his responses. With a loan, he explains, he “can buy some more dasheen suckers and buy some fertilizers and tings dat a help me.” The way Chippy talks about a loan makes it sound like it is a sure bet. “Like if you a borrow a \$50,000 (around \$300 USD), do some farming, when you make it back you can pay them back.” This assumes a successful crop,

as farming is a gamble with many risk factors. However, sometimes there are no other options for farmers like Chippy.

The margins for farmers are thin as it is. These smallholder farmers' experiences underscore the central role that access to capital plays in the success of farming ventures. Without adequate financial resources, farmers like Nick face significant hurdles in realizing profitable returns from their agricultural endeavors. Because of this, many smallholder farmers in Jamaica live paycheck to paycheck, or harvest to harvest. This lifestyle makes smallholder farmers particularly vulnerable to disasters, as one bad crop could be catastrophic.

The lack of certainty in farming poses significant risks for smallholder farmers like Barros, who often lack insurance coverage to mitigate potential losses. Smallholder farmers often diversify their production as a way to mitigate risk. Like many farmers, Barros raises goats, which are considered a delicacy in Jamaican cuisine and command high prices in the market. Despite the lucrative market for goats in Jamaica, Barros recounts a distressing incident where four of his goats fell victim to a pack of dogs, resulting in substantial financial loss.

When I asked if his goats were insured, he quickly responded with a no. "No sir, me no have no insurance pon goat, a rich man must insure dem farm. A poor man no have no somethin man. Poor man just a live by the mercy a god, that how it go." Without insurance or other forms of risk management, farmers like Barros bear the full brunt of losses incurred due to natural disasters, animal attacks, or crop failures. This lack of assurance amplifies the inherent uncertainty in farming, underscoring the need for mechanisms to provide financial security and stability for smallholder farmers in the face of adversity.

Although the interviews in this research only represent a small sample size for the farmers in Jamaica, there seems to be a trend in risk-taking and age. The younger farmers like Nick and Chippy are more interested in exploring loans, whereas older farmers like Lloyd are less interested in loans.

Lloyd is a longtime and successful coffee farmer in Hayfield. He says that he has never had a loan for farming. He talks about the barriers to even applying for a loan, needing different forms and ID. He says that if he did manage to get a loan, he wouldn't mind, but wonders how he would pay it off. "How you going pay it back? Me is a farmer," he says. As a farmer, he recognizes the inherent unpredictability of agricultural income streams, which may fluctuate seasonally or be affected by factors beyond his control, such as weather conditions or market prices.

Access to capital stands as a formidable barrier for Jamaican farmers, echoing the sentiments of Warrol and Nick, who emphasize the pivotal role money plays in agricultural success. The necessity of funds to tackle various farm challenges, whether through soil improvement, pest control, or land acquisition, underscores the criticality of capital in Jamaica's modern agricultural landscape. Despite the allure of loans for expanding operations, the reality for farmers like Nick is fraught with uncertainties and risks, as highlighted by the cautious optimism and acknowledgment of potential debt. Every season, farmers gamble with planting crops and invest time and money into a return that isn't guaranteed. The lack of insurance for smallholder farmers highlights the fragility of their livelihoods. This, coupled with financial limitations and the inherent risks of agriculture, emphasizes the urgent requirement for accessible and sustainable capital solutions to aid Jamaica's farming community in overcoming these obstacles and fostering long-term sustainability.

Market:

For many of the farmers interviewed for this paper, access to a market was the biggest challenge. To many, the farming and growing produce part of agriculture isn't challenging. The difficult part is bringing the food to market and getting a decent price for it. With a "plant first, find a market last" mentality, these smallholder farmers excel at production but experience challenges with markets.

Farmers choose their crops for various reasons. For instance, Lloyd, a coffee farmer with over 13,000 plants, grows mostly coffee because of his expertise and passion. In contrast, Nick bases his planting decisions on market returns, such as choosing melons for their quick turnaround and steady demand. Mrs. P follows her instincts or uses the Macdonald Farmer's Almanac to decide on planting carrots, tomatoes, or other crops. Zuberi practices diversified farming for both environmental sustainability and economic stability.

Contracts with private companies or even government-led farm contracts can guarantee farmers a buyer for their produce, but there are barriers to entering these contracts, and farmers express why they don't want to do these contracts. Some farmers are in a situation where they don't have options on who to sell to and have to take whatever price they can get for the produce they grow. This is especially true for farmers in Hayfield, which is an isolated community with limited traffic coming in and out.

Hayfield is 7 km from the next town. It is located in the mountains, and there is only one road that leads into the community of about 200 people. It is another 20 km to Morant Bay, which hosts the central market for the parish. It is further still from Kingston, which many farmers boast has the best markets, but it is difficult and costly to transport goods there.

Due to Hayfield's isolation and the fact that most farmers don't have a vehicle or capital to transport goods to the market, many of them rely on a middleman to transport the produce. These middlemen, called higglass in Jamaica, buy the produce from the farmers and bring it to the market to sell to vendors at a higher price to make a profit. Farmers in Hayfield don't have much choice but to sell their produce to the higglass at the price that the higglass set. The option is to take the price or not to sell at all. Many of the farmers complain about this dynamic and claim that they aren't offered fair prices. Warrol comments on this dynamic by saying, "They give you a money but it might not suit you, but just take it. Mhmm, yuh must take it." Even if the price that is offered by the higgla isn't a good price, he feels as if he has to take the price as there are not many other options.

Soba says that to get a better price, you have to search outside of Hayfield. He says, "If you want to get it at a good rate, you have to go way out and go look a market." This puts a burden on farmers to find a market for their goods and potentially disproportionately affects farmers with fewer resources and less ability to transport their goods. Soba has gone through the trouble to take his produce to the market a few times before. He says, "I've done it a couple of times, man, and it's not bad. But just that I don't really plan to do it often. Because if I'm doing it often, I don't have any time for the farm. How am I going to produce the things?" More time searching for a market means less time working in the field.

With the challenges of bringing the goods to the market themselves, some farmers aren't able to do that and decide to take the price the higglass offer, even if it's low. Warrol explains why he doesn't take his produce to the market himself, saying, "We need some more money too, because when you call the vehicle man and he charges you a lot of money. Because sometimes, what you pay them and everything, it's like you sell in the district the same way." He believes

that if he were to go through the trouble to pay someone to transfer the goods directly to the market, then it would potentially be the same price if he just sold it to the higgla in the first place.

Junior, a farmer who lives in Castle Hill and is slightly closer to the market than farmers in Hayfield, shares the viewpoint of transporting goods to the market. Farming is already on a tight profit margin, and transporting the goods directly to the market isn't worth it for him. He says:

“On top of bad roads, transportation costs, man that will kill you... There's no way I'll be able to get a private vehicle to take me for less than probably 17, 18 thousand dollars. Because that's going all the way to St. Catherine. I mean, after you pay all that much for transport, I mean, after you sell the produce, there's actually nothing left in it for you. You know, unless you're doing like a great volume.”

Sometimes the produce has a good price and the farmer makes a decent return, but other times the farmer isn't able to find a buyer for the produce and the fruits of their labor go on to spoil. Soba shares a recent experience where he planted “a whole lot of sweet pepper and something, a lot of them spoiled off up there.” He wasn't able to find a buyer for the sweet pepper, and it ended up going to waste.

Jamaica's location in the Caribbean grants it a climate conducive to agriculture, characterized by hot temperatures and ample sunshine throughout much of the year. These conditions create favorable growing environments for a wide range of crops, including tropical fruits, root vegetables, and spices. There are times of increased demand for certain crops, such as sorrel (hibiscus) during Christmas time. But a lot of the time, demand isn't fully understood, and

farmers are left to gamble on the crop to plant now, which might experience volatile demand fluctuations between the time it's planted and harvested.

With price volatility and not a guaranteed market, perhaps contracting with a buyer would be of interest to smallholder farmers. There are producers in Jamaica that are in need of locally produced crops, such as Grace who makes hot sauce out of Scotch bonnet peppers, or Red Stripe, which brews beer out of cassava. Farmers can sign contracts with buyers at a guaranteed price and quantity. But some of the farmers voiced the barriers to this contract farming. Soba mentions that he doesn't want to "receive no money first" before he plants, so he doesn't enter any contracts with buyers, which isn't exactly the way that these contracts work.

Stella shared a story of a contract deal with RADA that she was a part of. RADA supplied her with cassava suckers and some fertilizer. When the crop was ready to harvest, a buyer purchased the crop from her. But after that, there was no buyer. The project was not sustained, and she was left with a field full of cassava and no market. When I asked her if she signed a contract with RADA or with a buyer, she replied that she did not. It was a verbal contract.

She goes on to explain that in order to sign a contract with a buyer, there need to be around "10, 20 people to sign that contract." Smallholder farmers need to group together to produce in large enough quantities that buyers are willing to work with them. Farmers in Jamaica are individualistic and don't want to work together in groups, even if it could potentially benefit everyone.

On the topic of working in groups, Zuberi says, "So, a lot of people are very... not trusting of groups. And as I said, just to get the whole group to function is a problem. But if we

could work as a group, that would have been great. There's a lot of benefit in working with groups.” There are a lot of benefits, yet farmers are not trusting of others and tend to work for themselves. Smallholder farmers in Jamaica tend to have small circles of people they trust and work with, but this small circle often isn't large enough to provide enough produce to meet the expectations of the contract buyers.

Coffee is another story, with its own pros and cons. Junior says, “Over the years, there's only one market I see where farmers plant to target and that's for the coffee. Because the people who buy the coffee, they come right to your farm to get it. They pick it up. Yeah, so that's the best bet, so to speak.”

The area of Hayfield has a lot of coffee plants around the area. It was historically a coffee-producing community, and although the production of coffee in this area has gone down a little bit, coffee production is still one of the most grown crops in the area. In 2018, the price of coffee dropped from around 10,000 JMD a box to as low as 2,000 JMD a box. Some coffee farmers were not able to weather this change in price and switched out coffee for different plants. Many coffee farmers, like Lloyd, kept their coffee.

One advantage of coffee is that the buyer will drive directly to the producer's farms, similar to how a higgla will drive into the district. The disadvantage is that the buyers once again get to set the price. The further disadvantage with coffee is that if the buyers don't come, there is no other market. Coffee isn't a crop that is sold in the local markets, and so if the coffee buyers don't come, then there is no market at all. Jamaican coffee is controlled by a few people.

But whether a farmer is growing coffee or other produce for local markets, some farmers claim that finding a market isn't hard. Farmers like Nick are closer to the market towns and have

better opportunities for finding a market. Nick's entrepreneurial mindset helps him find a market. He tells other farmers, "You sit down and wait for people to come buy from you, go out deh and go look it, go out deh go find people, no sit down an look and wait pon people, go out deh go find it." He is able to go out and look for markets, but many farmers don't have that same opportunity or optimism that he shares.

Access to markets emerges as the foremost challenge for many Jamaican farmers, particularly those in remote areas like Hayfield. While agricultural production itself may not pose significant difficulties, navigating the complexities of market dynamics presents a formidable hurdle. Farmers like Lloyd, Nick, and Ms. P employ various strategies in crop selection, ranging from personal preferences to market demand considerations. However, the prevailing reliance on middlemen, such as higglas, underscores the limited agency farmers often have in determining prices for their produce. Transportation costs and market access further exacerbate these challenges, particularly for isolated communities like Hayfield. While contract farming offers a potential solution, barriers such as trust issues and the need for collective action hinder its widespread adoption. Ultimately, the experiences of Jamaican farmers illustrate the intricate interplay between agricultural production, market dynamics, and the broader socioeconomic context in which they operate.

This is why there is a push for the agro-processing. If Jamaica can capture the produce by processing it, then the locally produced materials can be used by Jamaicans and reduce the level of imports. Junior mentions that there are barriers to the agro-processing. He says, "Being in a poor neighborhood, if you notice there's hardly any farm here that has a post-harvest space, or the ability to dry and store stuff, or even transform to wine or whatever. Because all of that could be done with most of the produce here, like the mangoes, the apples, breadfruit, all of that, could

be turned into further, added further. But that extra material or machinery or equipment that's necessary to take that other step, most farmers can't afford it.”

This situation underscores the need for agro-processing in Jamaica. By processing locally produced materials, the country can reduce imports and add value to its agricultural products. Junior points out that lack of post-harvest facilities and equipment for drying, storing, or processing produce into value-added products is a barrier. Most farmers can't afford the necessary machinery, highlighting the need for investment in agro-processing infrastructure.

Climate Change/Sustainability:

The smallholder farmers' perspective on climate change significantly differs from that of Development Actors. While Development Actors view climate change as a long-term issue, requiring preparation and adaptation for future impacts, smallholder farmers focus on immediate weather patterns and their short-term effects on agriculture. Smallholder perspectives are more season-to-season, rather than looking at how climate change will affect the region ten years down the road.

For example, Chippy notes the recent shift in rainfall patterns, saying, "normally, we'd get a little rain, a little sun, a little rain, a little sun. So the things would grow up properly and nice. True from the other day, it's like the climate shifted on us." His observation reflects the immediate and practical concerns farmers have regarding changes in weather patterns that directly impact their crops.

Similarly, Lloyd comments on the variability of seasons, indicating a short-term perspective shaped by recent weather patterns. "We had the right season. This year and last year. Last year was a bit wetter, but this year now, even July, more into it right now, what we're in right now, is not a rainy month... And now we get a pretty season, from July started." This

emphasis on seasonal weather highlights how smallholder farmers gauge climate change through the lens of their immediate experiences rather than long-term trends.

Mrs. P also focuses on the timing of planting in relation to weather patterns, illustrating that farmers in the region manage the farm based on the immediate weather trends. "Sometimes it's dry, sometimes we get rain, so we just focus on the time when to plant it."

In contrast, organic farmers like Zuberi and Junior are more concerned about sustainability and the challenges of finding organic seeds. Zuberi emphasizes the importance of seed saving and the difficulties posed by government regulations on importing organic seeds. "It's hard to get organic seeds in Jamaica. You know, we really need to start doing seed saving... The government is making it very hard to import organic seeds."

Junior echoes this sentiment, expressing a preference for using seeds saved over multiple generations to ensure their quality and nutritional value. "There is no better joy to me than being able to eat what you produce yourself... if you have seeds running on your farm over a period of ten years or so, then you're sure you have the right seed."

He also criticizes the heavy use of chemicals in farming, saying, "Our soil is so much a part of the food chain, that if there are no organisms in your soil feeding, then you have a dead soil."

Overall, these perspectives underscore the diverse views and concerns among smallholder farmers regarding climate change and agricultural sustainability. While immediate weather patterns and practical challenges dominate their outlook, there is also a growing awareness and advocacy for sustainable practices among organic farmers.

Discussion

This thesis analyzes the interplay between global and local perspectives in the context of smallholder agriculture. As a global studies scholar, I am particularly interested in examining the dynamics between these two viewpoints. Development Actors embody the global perspective, offering long-term insights into the challenges facing the agriculture sector. In contrast, smallholder farmers represent the local perspective, bringing invaluable local knowledge and often focusing on shorter-term concerns. The difference in the long term and short term perspectives are important and influence the needs and how they approach agriculture development.

Smallholder farmers in Jamaica possess exceptional farming skills, particularly when it comes to cultivating challenging terrains. Despite Robert Logan's critique of inefficiency, it's important to recognize that their efficiency should not be judged against conventional agriculture's standards, which involve large fields, monoculture, tractors, and irrigation systems. Instead, these farmers are highly adept at farming on less-than-ideal lands, such as mountainous regions with poor irrigation and minimal infrastructure.

Prime agricultural lands are scarce and highly coveted. Joan Brown Morrison rightly points out the absence of an agricultural land policy to safeguard these valuable areas. Consequently, smallholder farmers are often relegated to more difficult terrains, where they demonstrate remarkable ingenuity and resourcefulness. They excel in this environment, relying on local knowledge and community-shared wisdom to thrive.

The challenging part for smallholder farmers in Jamaica is not necessarily the act of farming itself, but rather the factors beyond their control. These include access to land, capital, fair market opportunities, and the impacts of climate change. These challenges are well

understood in academic literature and by Development Actors. The perspectives of global and local to address these challenges, however, reveal areas of both alignment and disconnect. By bridging these gaps, we can enhance the efficacy and sustainability of development initiatives aimed at supporting smallholder farmers.

There are three themes that emerge from the interviews. The first theme is the drastic differences in understanding with how the government of Jamaica is contributing to agriculture development. The second theme is the time scale with which the global and local view challenges, with the global exhibiting a long-term perspective, and the local concerned with the more immediate, short-term. The third theme is the individualism of the smallholder farmer in Jamaica, which is identified in reference to access to capital, but this cultural dynamic influences how Development Actors could approach agriculture development.

The government of Jamaica arguably plays the biggest role on agriculture development within the country, negotiating trade deals on an international level, setting national policy, and through RADA, engages directly with smallholder farmers on addressing challenges. There are also many different departments within the government that are useful for farmers that can help with the land, capital, or market challenges. With a global perspective, the government of Jamaica is concerned with food security and climate change.

There appears to be a disconnect in the messaging of the Development Actors. Smallholder farmers struggled to articulate the roles of the organizations that claim to serve their best interests. For instance, the JAS asserts that it advocates on behalf of farmers, yet the farmers interviewed were generally unable to describe JAS's role. The only farmer who could comment on JAS's role mentioned that the organization only seemed interested in farmers during election periods.

RADA interacts with farmers more frequently, yet the organization's mission is not reflected in the farmers' responses. Farmers often view RADA as either ineffective or merely a source of free supplies. For example, Sobas remarked that he couldn't judge whether RADA was good or bad because he hadn't received any assistance from them yet. This disconnect highlights a critical gap between the intentions of these organizations and the perceptions of the farmers they aim to support.

The government of Jamaica lacks the necessary resources to effectively perform outreach services. This limitation is highlighted by both Development Actors and smallholder farmers. For example, Kwesi points out the inadequacy of government resources, and Dan observes that agricultural officers are overextended, responsible for large areas. Similarly, smallholder farmers like Lloyd note that RADA's responses are often too slow to meet their needs. The lack of resources could be a reason as to why these farmers, predominantly in a difficult to reach area, are responding the way that they do.

Smallholder farmers often adopt a short-term perspective on land use, which is understandable given their circumstances. For instance, in cases where farmers do not own the land, such as Nick's situation, they are less inclined to practice sustainable farming techniques. Leasing the land, Nick focuses on maximizing immediate output, utilizing an intensive chemical input regime. This approach contrasts with farmers in Hayfield, who, although they might not hold official titles, farm on family land and are likely to continue farming on the same plots for the foreseeable future. These farmers are more inclined to consider the long-term sustainability of their farming practices.

The government's response, in contrast, is geared towards long-term agricultural development. Initiatives like the agro-park aim to establish a foundation for sustained

agricultural production. By promoting crops such as onions and potatoes, which are commonly consumed in Jamaica, the government seeks to reduce dependency on imports. This is also the objective behind the National Onion Project and National Irish Potato Project.

Both groups are hesitant to get into contracts with the other. There were anecdotes from both sides, claiming that the other side didn't hold their end of the deal. This mistrust can be detrimental to establishing a guaranteed market for smallholder farmers. Furthermore, smallholder farmers like Lloyd shared that he also has difficulties with reliable labor, as the hired help tends to be concerned about the best price, rather than informal agreements.

Both smallholders and Development Actors acknowledge that market access poses a significant challenge in Jamaica. Donnette Skervin emphasizes that the marketing structure is highly fragmented, presenting a notable area for improvement within the government's purview. Given the individualistic nature of smallholder farmers, the prospect of forming cooperatives to sell in bulk or coordinate the transportation of produce across the island may not seem feasible. However, there is an opportunity for Development Actors to intervene by establishing distribution channels to effectively move produce, as Donette suggests, from areas of glut to areas of scarcity.

Investing in agro-processing facilities is generally agreed on by both parties, although once again, the smallholder farmers currently don't have the capacity to invest in such technology. Development Actors can invest in this technology for benefit of the smallholder farmers. This investment could increase the market for smallholder farmers to sell into by creating value for products that are already grown, such as potatoes, ginger, and turmeric. These facilities could increase the sustainability of projects, such as the national projects promoted by the government or international projects like JaSPICE.

Education continues to be the platform for outreach and communication from Development Actors to smallholder farmers. Although the farmers interviewed are a small sample size, it seems that the commonly held belief among farmers is that the farmer field schools are not worth going to. Even with incentives from the Development Actors to get farmers to attend, many still don't. But even in with the low turnout, the fact that Soba uses contours on his farm highlights success. Even organic farmers who are critical of RADA promoting conventional farming, like Zuberi, understand RADA's outreach to promote the safe use of chemicals, viewing it better than farmers using chemicals improperly.

Climate change is out of the control of smallholder farmers. The narrative on the global scale is that climate change is going to affect these farmers. Smallholder farmers see things in a short term perspective, season to season and year to year. The comments that the smallholder farmers make are supportive of that. Yet the development actors are promoting climate smart agriculture. They are educating farmers that the climate is going to change, and so there needs to be a change in how farming is done in order to adapt to changing weather.

Understanding the dynamics of smallholder farmers is essential to catering outreach to these rural communities. Development Actors need to be able to bridge the gap between their long-term development goals with the immediate challenges that smallholders face. Balancing the promotion of group collaboration with avenues of individual support is also crucial. Overall, the Development Actors, specifically the government, need to work on the messaging to smallholder farmers, as the missions of these organizations are not always understood by rural communities.

Conclusion

This study has illuminated the challenges and dynamics of agricultural development in Jamaica, with a particular emphasis on the perspectives of smallholder farmers. Interviews from smallholder farmers and Development Actors underscore the profound challenges these farmers face, from limited access to land, markets, labor, and capital, to the exacerbating effects of global phenomena such as climate change and competition from international markets. As critical development scholars like Escobar and Shiva emphasize, despite advancements in development discourse, persistent struggles underscore the need for continued critical examination.

A significant disconnect between Development Actors and smallholder farmers is evident, highlighting a fundamental issue in agricultural development. Although there is an understanding of the challenges from both groups, the perceived solutions to the challenges don't always align. This underscored the importance of effective communication and collaboration between the global and the local. In the case of Jamaica, the Development Actors can improve the messaging and outreach of the organizations to better serve the smallholder farmers. This isn't always easy to accomplish, as the Development Actors in Jamaica are operating with limited resources.

By centering the perspectives of smallholder farmers, this study contributes to the broader literature of critical development studies, highlighting the importance of local representation and voice. As outlined at the beginning of this thesis, longstanding critiques of development have been voiced. Through this study, we have delved deeper into these critiques, highlighting the complexities of power relations and the marginalization of local voices. The findings of the disconnect in the perspectives on the role of the government, education and the

access to key resources for agriculture underscore the concrete concerns faced by smallholders, emphasizing the importance of listening to this key demographic in the development process.

Beyond Jamaica, the imperative of listening and engaging with local perspectives can be extended globally. This study demonstrates that meaningful insights can be gained by dedicating time to listen to the voices of those directly affected by development initiatives. By highlighting the significance of including smallholder farmers voices, this research contributes to a nuanced understanding of the challenges and opportunities in agricultural development in other Small Island Developing States globally.

In essence, this study serves as a bridge between the local and the global, offering valuable insights for development studies and critical development scholars alike. By amplifying the voices of smallholder farmers and interrogating power dynamics, this research calls for a reevaluation of development paradigms and advocates for a more inclusive approach to agricultural development worldwide.

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