

Institutions, Innovation and Grassroots Change: Alternatives to Transnational

Governance in the Global South

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Dissertation submitted in partial fulfillment of  
the requirements for the degree of Doctor  
of Philosophy in the Environment  
in the Graduate School of  
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ABSTRACT

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## **Abstract**

Transnational governance has been advanced as a viable option for regulating commodities produced in emerging economies—where incapable or unwilling states may undersupply institutions requisite for overseeing supply chains consistent with the quality, safety, environmental, or social standards demanded by the global marketplace. Producers from these jurisdictions, otherwise left with few venues for securing market access and price premiums, ostensibly benefit from whatever pathways transnational actors offer to minimize barriers to entry—including voluntary certification for compliance with a panoply of public and private rules, such as those promulgated by NGOs like the Fair Trade Federation or multinational retailers like Wal-Mart.

Yet, such transnational “sustainability” governance may neither be effective nor desirable. Regulatory schemes, like third-party certification, often privilege the interests of primary architects and beneficiaries—private business associations, governments, NGOs, and consumers in the global North—over regulatory targets—producers in the global South. Rather than engaging with the international marketplace via imported and externally-driven schemes, some producer groups are instead challenging existing rules and innovating homegrown institutions. These alternatives to commercialization adopt some institutional characteristics of their transnational counterparts yet deliver benefits in a manner more aligned with the needs of producers. Drawing on original

empirical cases from Nicaragua and Mexico, this dissertation examines the role of domestic institutional alternatives to transnational governance in enhancing market access, environmental quality and rural livelihoods within producer communities.

Unlike the more technocratic and expert-driven approaches characteristic of mainstream governance efforts, these local regulatory institutions build upon the social capital, indigenous identity, “ancestral” knowledge, and human assets of producer communities as new sources of power and legitimacy in governing agricultural commodities.

## Dedication

This dissertation is dedicated to my family— who’ve devoted tremendous resources, time, and emotional support to my unending passion for education. To my parents, Susan and Oscar Starobin, who encouraged me to pursue my own interests from an early age, who endorsed my independent explorations (even if reluctantly at times, especially travel that took me to far-away, unfamiliar places before cell phones became commonplace) and who modeled for me the pursuit of careers in service to others that bring purpose and meaning to life. To my husband, Moshe, who deserves a badge of honor for enduring the long slog through graduate school, international fieldwork, and dissertation—at times a reluctant voyager on my wayward academic and professional journey, but a steadfast traveling companion nonetheless. And to my most beloved son, Eli—who brings abundant energy, curiosity, and joy to my every day, shepherding me into the present moment and giving me many reasons to look forward to the future.

# Contents

Abstract .....	iv
Dedication.....	vi
Contents.....	vii
List of Tables.....	iv
List of Figures .....	v
Acknowledgements .....	vi
1. Where is Your Village?: Positionality and Entering the Field .....	1
2. Producers and Policy Change at the Bottom of the Pyramid .....	17
2.1 A Mexican (European) Honey Crisis.....	17
2.2 Contending Approaches: Producers and Policy Change at the Bottom of the Pyramid.....	25
2.3 Governance Gaps in the Transnational Regulation of Commodities .....	35
2.4 Case Selection and Methods .....	40
2.5 Outline of the Dissertation .....	45
3. The Prospects and Limits of Transnational Governance and Development.....	48
3.1 Defining Terms .....	54
3.1.1 Institutions.....	54
3.1.2 Transnational .....	55
3.1.3 Sustainability.....	56
3.1.4 Governance.....	58
3.1.5 Smallholder .....	59

3.1.6 Commodity .....	59
3.1.7 Shadow vs Focal Commodities .....	60
3.2 The Supply and Demand of Transnational Governance .....	61
3.3 The Demand for Transnational Governance Solutions.....	63
3.4 Governance suppliers? .....	65
3.4.1 Weak States: Unwilling or Incapable of Effective Regulation.....	66
3.4.2 Local Actors and Institutions.....	69
3.4.3 The Rise of Private Authorities and Transnational Actors in Governance .....	70
3.5 Third party Certification as Transnational Governance Mechanism and Its Limitations.....	72
3.6 The Dilemma of “Costly” Credibility .....	77
3.7 The Problem of Uncertified Credible Producers.....	86
4. From Milpa to Market: Subsistence Crops, Agricultural Commodities, and Alternative Livelihoods in Mexico .....	94
4.1 Traditional Livelihoods and Political-economic Autonomy: A Close Up.....	94
4.2 Shifting Cultivation.....	101
4.3 Beyond Shifting Cultivation: The Pursuit of Alternative Livelihoods.....	106
4.4 Honey as an “Alternative Livelihood” .....	110
4.4 Analysis.....	121
5. Shadow Commodities and Interdependence.....	126
5.1 Downscaling in the Face of Globalization .....	127
5.2 “Governance gaps” in the Transnational Regulation of Agricultural Commodities .....	131



5.3 Commodity Characteristics and Lengthening Chains of Interdependence.....	141
5.4 Shadow and Focal Commodities: Characteristics and Interactions.....	144
6. Homegrown Institutional Innovations: Participatory Certification for Fresh Fruits and Vegetables in Nicaragua .....	152
6.1 Enabling Conditions: Conflict, Disaster, and the Coffee Crisis .....	154
6.2 Failure to Upgrade: Smallholders and Transnational Governance in the Coffee Sector .....	161
6.3 Beyond Certification for Focal Commodities: Fresh Produce and Participatory Oversight .....	166
6.3.1 Agro-ecology and the GPAE Participatory Approach to Certification .....	171
6.3.2 Agroecology and Smallholders as Agents of Agrarian Change? .....	172
6.3.3 Institutional Emergence: GPAE Certification.....	177
6.3.4 The Collective Mark of GPAE .....	179
7. Conclusion and Implications.....	196
References .....	205
Biography .....	218

## List of Tables

Table 1: Visits to International Field Sites and NGO Collaborations .....	5
Table 2: Certification Credibility Hierarchy .....	80
Table 3: Dilemma of Costly Credibility .....	82
Table 4: Compliance vs. Credibility Costs.....	88

## List of Figures

Figure 1: Map of the Yucatán Peninsula in Mexico.....	43
Figure 2: Map of Field Sites in the Yucatán Peninsula .....	44
Figure 3: Honey Commodity Chain from Local producers’ Perspective.....	119
Figure 4: Passive Education – Building Model Vegetable Gardens, Visible from Rural Roads in Matagalpa, Nicaragua (July 2007).....	174
Figure 5: Model Agroecological Garden for Diversified Production in Matagalpa, Nicaragua (July 2007) .....	176
Figure 6: “Trademark of Trust” Associated with GPAE.....	185

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community of thoughtful colleagues and dear friends during the latter part of my tenure at Duke. Lastly, I am indebted to the Penn Program on Regulation at the University of Pennsylvania Law School for fellowship support, continued mentorship, and a vibrant intellectual community within which to advance my scholarship.

# 1. Where is Your Village?: Positionality and Entering the Field

*“¿Dónde está tu pueblo?”* (Where is your village?). Five small faces pressed up against the bottom of the screen door—awaiting an answer. Clearly, I was an outsider to the community of Diosbotek<sup>1</sup>—a Mayan village of some 70 families, near the heart of the Yucatán peninsula in Mexico. Though their question struck me at the time as more existential than literal—Who am I? Where do I come from? What am I doing here?—my best answer in the moment was to respond with my current hometown and place of work: *“la ciudad de Durham en Carolina del Norte”* (the City of Durham, North Carolina) and *“la Universidad de Duke”* (Duke University)—from which I had trekked via plane and overland to conduct field research for my dissertation. That either Duke or Durham sufficiently accorded with the children’s notion of village, I wasn’t so sure.

I was likely an unexpected resident of the little cinder block house—located next to one of the only known spots in the village where cell phones have a chance of linking up with satellites roving in the sky above, beneath the stretching canopy of a

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<sup>1</sup> Diosbotek is not the real name of this village. I use pseudonyms for village names and people to protect their identity and preserve anonymity, in accordance with disciplinary norms for qualitative, ethnographic research and ethics guidelines for research with human subjects. One exception to this is that I use the true names of organizations (i.e., NGOs). The name, Diosbotek, comes from a commonly used phrase to express thanks in Yucatec Mayan parlance, though the Spanish word for God, Dios, has replaced the word from the Yucatec Mayan. The adoption of “diosbotek” as the primary word commonly used, even in Mayan villages, to express thanks was pointed out to me by Eduardo Moh—a trained biologist and native speaker of both Yucatec Mayan and Spanish—the NGO support staff member often relied upon to interpret the multi-lingual interactions central to s work among various outside stakeholders with Mayan community members.

humungous old growth tree. Owned and rented out by a local family, the house was typically occupied by leaders and staff of a Mexican NGO, *El Hombre Sobre la Tierra* (Man on Earth), which worked on sustainable development projects in the community and elsewhere in the region. In Diosbotek, *El Hombre Sobre la Tierra* (HST) provided me with not only practical logistical support, but a most crucial social license to operate. One cannot readily show up in a random Mayan village in the Yucatán for an extended stay—not least because there are no hotels, hostels, campgrounds and the like amidst most village centers.

In my past experience traveling and living in Central America, I found it best to arrive with an introduction from a trusted source—even better if the contact can accompany you in person. If you are not from that town or village, usually it's preferable to have a connection with a local NGO or other organization with strong local contacts, networks and a good reputation (that can also advise on reasonably safe places to stay, and bodegas or people to eat by, so as not to get sick). A few summers earlier (2007), I lived and worked as an intern in a rural outpost of the international microfinance organization FINCA—in the town of El Rama, Nicaragua, along the *Rio Escondido* (Hidden River) in the country's Southern Autonomous Region, not far from the Caribbean Coast. Arriving in El Rama, it helped in no small measure that staff from FINCA's head office in Managua had alerted their branch office director to my pending

arrival—who assisted me in finding accommodations with a local family, who all in turn helped me find my way and make sense of the place, my work and research in the region.

While on paper I had no formal affiliation with the NGO that rented the house in Diosbotek, I had previously collaborated with HST and stayed in the village on two prior occasions during the six years that I worked under contract with the international development organization—American Jewish World Service (AJWS). Both a grantee and local NGO partner of AJWS, *El Hombre Sobre la Tierra* (HST) had received financial support from AJWS for select development projects—centering on food security and sustainable agriculture. HST, moreover, partnered with AJWS over several years to bring delegations of North American visitors for extended village stays in rural communities—for first-hand opportunities to witness so-called “grassroots development” in action.

My official position with AJWS during my initial visits to HST—and to many other local NGOs in Latin America, Asia, and Africa—was as a “group leader” to such delegations. Over the course of 6 years—beginning in March 2007 and ending in May 2012—I led 16 such programs for AJWS, to 10 distinct grassroots NGOs, in 9 different countries—and visited several of these organizations multiple times, notably in Nicaragua and Mexico, but also Honduras and Guatemala. Beyond these programs, I



additionally spent one summer interning and conducting research on rural microfinance with the Foundation for International Community Assistance (FINCA) in Nicaragua (July-September 2008), which provided me with a further introduction to not only the country but also a broader spectrum of development interventions beyond AJWS's particular approach. At FINCA Nicaragua, I was largely an intern-observer— shadowing the El Rama branch offices' two microcredit officers as they formed “village banks” and recruited potential clients from rural communities across the region. Moreover, I served in a similar capacity to my role with AJWS as the facilitator and on-the-ground coordinator for a two-month pilot project through Duke with BRAC in Bangladesh. The largest development NGO in the world, BRAC is the culminating achievement of Bangladeshi social entrepreneur Fazel Abed's scaled-up effort to alleviate extreme poverty and empower the poor—a model that BRAC has introduced to many countries beyond Bangladesh, especially post-conflict and post-disaster countries of in Asia and Africa and. Akin to my experience at FINCA, my time embedded within BRAC and learning about its complex institutional structure and diverse programs deepened my insights into innovative approaches to development, including the notion of South-South development. Table 1 summarizes the list of the countries, programs

and NGO affiliations that I held.

<b>Table 1. Visits to International Field Sites and NGO collaborations (2007 - 2012)</b>			
<b>Countries</b>	<b>Regions (main cities, towns)</b>	<b>International NGO Affiliations and local host NGOs</b>	<b>Dates Visited with NGOs and independent research</b>
<b>Primary Field Sites</b>			
Mexico	Chankom, Merida, Valladolid	AJWS, El Hombre Sobre La Tierra	Jan 2011, May 2012, June-July 2012
Nicaragua	Matagalpa	AJWS, Fundacion Denis Ernesto Gonzalez Lopez	March 2007, August 2007, March 2011
Nicaragua	El Raama (RAAS), Managua	FINCA Nicaragua	July-September 2007
Nicaragua	Carazo	AJWS, COOPAD/ RENIC	March 2009, March 2011
<b>Secondary Field Sites</b>			
Dominican Republic	San Salvador	AJWS, MOSTCHA	May 2010
El Salvador	Ciudad Romero	AJWS, La Coordinadora	January 2010
Guatemala	Chimaltenango, Santa Rosa II	AJWS, OPCION	May 2007, May 2009, March 2010
Honduras	Gracias, Siguatepeque	AJWS, RED COMAL	February 2008, March 2008
<b>Tertiary Field Sites</b>			
Bangladesh	Dhaka, Saavar, Mymensingh	Bangladesh Rural Advancement Committee (BRAC)	June-August 2008
Senegal	Dakar	AJWS, TOSTAN	June 2011
Thailand	Bangkok, Uban Ratchetani	AJWS, Pattanarak foundation	January 2008
Uganda	Kampala, Tororo	AJWS, Uganda Orphans Rural Development Program	May 2007

**Table 1: Visits to International Field Sites and NGO Collaborations**

My initial interest in linking up with AJWS, in particular, stemmed from their inclusive vision of pursuing “justice for all” and their “rights-based” approach to development. I, moreover, was compelled by their unique notion of global civic engagement and nuanced view of experiential, popular education<sup>2</sup>—that bringing

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<sup>2</sup> AJWS’s curriculum—used as a guidance document and source for textual resources—is an iterative product that emerged over a decade of the organization’s experiences. Adopting an appreciative inquiry approach, the curriculum responded to questions that emerged authentically through the unique cross-cultural interactions fostered by the civic engagement experience. A massive bound volume (with separate versions for the facilitator and participant), the curriculum was only first being assembled into discrete chapters when I began working with AJWS. It draws on both the traditional expertise and training of international development practitioners and internal education division staff—as well as the experiences, insights and education of facilitators (group leaders) running programs in the field, many of whom were seasoned development practitioners or experiential educators themselves.

college students and community leaders from the global North in direct contact with poor and marginalized communities in the global South offered a powerful venue to cultivate the next generation of leaders and advocates for social change. Only by witnessing poverty first hand through the AJWS delegation I led to Nicaragua, for example, could many of my students begin to see possible interconnections between poor migrant coffee pickers and the cups of coffee they purchase at the Starbucks drive-thru in Seattle. Familiarized by the faces and stories that made more complex their notions of poverty—its root causes and possible solutions—participants often conveyed, at least anecdotally, how these experiences reshaped their notions of personal and collective obligations to a diffuse global community with which they were unexpectedly linked—suggesting that bearing witness to people and circumstances of which they had previously been ignorant newly implicated them to become voices for change and advocates for a more just society.

In the unique position as group leader for AJWS—a position usually shared with one other seasoned traveler and educator—I was trained to wear many hats and play multiple roles simultaneously. Apart from a pre-program conference call and brief interactions during a week-long annual training facilitated by AJWS’s main office staff based in the United States, the beginning of each program in the field represented the first occasion of ever working together with my co-leader—usually in a country or

community that neither of us had ever visited before, alone, much less accompanied by a group of 10-20 North American strangers. Meeting for the first time by the baggage claim in a major city airport, like Cancún or Managua, we would embark for hours in tightly squeezed 15 passenger vans and the occasional pick-up truck, en route to rural host communities—where we would encamp on the floor of a village school or community center to live communally for 8 days or more. Upon first meeting at the airport, as group leaders we commenced our respective jobs in conjunction with counterparts from partner universities (from which the participants usually came), regional or local NGOs from the country visited, as well as local workers staffing development projects, and members of rural host communities where we stayed. As the primary Spanish language speaker, I served as the cross-cultural interpreter and primary liaison with host NGO and community leaders—getting to know well both organizational founders, administrative staff and local community leaders with which the NGOs collaborated.

In sum, I was a participant-observer in the fullest sense of the term. By virtue of my position as a representative of an international development organization, I possessed the power of convocation—to bring together subsets of these various stakeholders for formal and informal meetings and interactions. Such meetings were scheduled for the expressed purposes of learning more about the NGO's development

projects and the history of the country and community—as told by individuals whose voices were often omitted from recorded colonial histories and conventional narratives, like rural peasants and indigenous women. I strived to mindfully interpret all dialogues and exchanges as an active listener and conduit of the stories recounted to me—faithful to the best of my abilities to the model of interpreting in multi-lingual spaces that do not privilege access to one party over another. (For example, I interpret everything that I hear and understand, including dubious, naïve or altogether ignorant questions asked by North American visitors—who might otherwise presume some level of confidence or allegiance). At the same time, there was a performative dimension to the meetings I organized, as they were facilitated with the intent of visitors bearing witness—to help them acquire a deeper knowledge of highly localized conditions and to hone their notions of what poverty “looks like” (or doesn’t) on the ground in developing countries (as contrasted against the inner perceptions, expectations, and beliefs sometimes held by North Americans).

There were further performative dimensions to the entire immersive experiences and encounters with host NGOs and local communities. At times more a bumbling collective of foreigners than a dignified delegation of North American university students and faculty, still, these groups were always nominally ambassadors for an important international development organization. We were not the “donors” or

representatives of AJWS's grants department (or even full time staff) per se, but we were linked to them in a meaningful way. At the very least, we were a large group of witnesses, if not auditors, of AJWS's grants—which, among other things, financed small agricultural development projects conceived of by host NGOs with the intent of being completed over the course of our visit and, in theory, with our physical assistance (when our participants rallied and local contractors permitted us to work).

And, yet, despite the orchestration and logistics which might hint at a routinized program, these immersive field experiences almost always evolved organically over the course of a week or two—full of authentic—if often awkward—attempts at cross-cultural interaction amongst groups of global strangers, brought together for a shared purpose, even if at times that purpose was ill-defined or poorly understood by some parties involved. These were experiments in transnational engagement and cross-cultural learning as well as grassroots development—intended at best to contribute to the incremental change at the local level (via a concrete and discrete micro-development projects) while striving to awaken the sensibilities of privileged North Americans—a subset of the world's wealthiest 10%—to the lives of the bottom billion.

At a minimum, we aspired to “do no harm” by our presence—on its own a difficult task. The philosophy and travel policies of AJWS guiding the behavior of staff and volunteers evolved to actively discourage “volunteer-giving”—one-time hand-outs

of sundries or other miscellaneous items of little value to North American visitors but of great value, perhaps, to locals—materially (leather work-gloves, hats, flashlights)—or symbolically (a handmade friendship bracelet). They might create unintended consequences in host communities—possibly seeding jealousy or resulting in unnecessary waste that cannot be disposed of locally in an environmentally safe manner. Even the heralded sustainable travel and wilderness backpacking philosophy of “Leave No Trace”—“Take only pictures, Leave only Footprints”—failed to be conservative enough along certain dimensions of the transnational civic engagement—with the rise of Facebook, Twitter and the like. In the digital “selfie” age, telling heroic stories of adventure and accomplishment, it was a perpetual uphill battle to restrain participants’ universal desire to capture every moment and record every move—even when pulling out a digital camera or cell phone might either provide profound evidence of the economic disparities between foreigners and locals, or the act of taking a picture (with or without permission) might inadvertently objectify individuals, communities and their lives as images to be consumed by external audiences. We often treaded fine lines—and sought to raise awareness along a spectrum of “productive discomfort”; what then constitutes “poverty tourism” as compared to civic engagement, local empowerment, or sustainable development?

Indeed, if the aspiration of sustainable travel is to tread lightly in the wilderness—to “Leave No Trace”—what then is the purpose of international development at its best? To never go and do nothing at all? Grassroots development, as practiced by AJWS, was intended to be a thoughtful intermediation—done selectively, in small increments, through credible local partners, with a deep knowledge of their contexts, constraints and opportunities. To provide a boost—often, a small grant from AJWS (\$3000 - \$30,000) was the first of such external grants the organizations received, which these small NGOs could leverage in their future pursuit of other sources of external funding. “Development” in this way may really not look like “development” at all, in any conventional sense, as viewed only through the top-down lens of major international organizations, foundations, government aid agencies and the like.

This is the context that shapes my positionality as a researcher, practitioner, and educator, and that foregrounds questions, observations and analysis presented in this dissertation. Most important, the questions central to this dissertation are motivated by my experiences and exposure to the internal operations and field programs of international development organizations like FINCA, BRAC, and AJWS—and especially my many extended visits to rural communities and collaborations with grassroots NGOs, like HST. Each of these experiences and interactions exposed me to a diverse array of NGOs—large and small—and the myriad strategies each had devised to



address unique challenges within their communities and countries. At each level of my field experience, I had been exposed to diverse geographies, dynamic communities, and a range of sizes and scales of organizations seeking to address some particular development challenge. But universal to all of these experiences has been the emphasis on communities and addressing real needs from the bottom-up—not perceived needs from the top down.

This “grassroots,” bottom-up view of development stands in stark contrast to conventional ideas, models, and institutions depicting how development “works.” Microfinance, for example, seems like an innovative idea with the potential to be a universal poverty panacea—winning Mohammed Yunus and the Grameen Bank a Nobel Prize. Yet microfinance does not work in Nicaragua in the same ways that it appears to operate so well in Bangladesh. FINCA’s model of village banking is different from the solidarity, revolving lending circles central to the Grameen Bank (relying on communal norms of monitoring and sanctioning, like shaming one’s neighbor, which work in tight-knit Bangladeshi villages). Yet this did not strike me as the only reason why microloans (as a separate, single-minded intervention) were ill-suited as a remedy to the particular struggles of many rural poor in Nicaragua and elsewhere in Central America. Lack of capital was but one problem among many, and microfinance a

solution, thus, to merely one dimension of a complex set of issues for which a more one-size fits all intervention might neither be helpful nor appropriate.

From my visits to Nicaragua, Guatemala, El Salvador, Honduras and Mexico, in particular, I continued to be struck by the commonalities across the multitude of rural small holder producer communities that I encountered: limited land on which to produce for subsistence and market; lack of access to information and markets; lack of access to capital; social and political marginalization; increased risk of falling into poverty and ill-being. Yet, the institutional remedies devised by grassroots rural producer organizations and their NGO allies to address some of these same problems bore little resemblance to one another. Some, like FDGEL in Nicaragua, la Coordinadora in El Salvador, and HST in Mexico sought to improve producer productivity and livelihood security through capacity building and education around agro-ecological production methods, as well as innovative schemes to enhance producer access to market, including participatory agro-ecological certification. Others, like Red Comal in Honduras, endeavored to create a separate solidarity economy (including its own currency) to foster economic independence among rural producers and to advance commercialization alternatives to participation in the globalized, export-driven marketplace. OPCION in Guatemala took a further unusual approach—engaging Mayan indigenous communities—prior victims of systematic violence from the

Guatemalan government—as collaborators in an effort to identify high-value commodities, like french beans, which could be produced year-round on the tiny parcels of land they had available.

Though the strategies pursued by these organizations and communities exhibited institutional innovation, they also revealed substantial variation. I found this all the more surprising given that many of these organizations participated in overlapping networks with one another and, at a minimum, were aware of the ideas and strategies advanced by others. AJWS actually fostered and funded a three-year program in an attempt to explicitly facilitate interaction among many of the very same NGOs and communities that I visited—in hopes that ideas might be diffused across country and community lines or that strategic collaborations might ensue.

Repeated among many of the institutional approaches of these organizations were a range of institutional devices thought to improve producer access to domestic and/or global markets—including public regulations and private certification standards related to the quality, health, safety, ethical or environmental criteria often demanded for participation in the global market place. In turn, I began questioning the relative influence of exogenous factors—the demands of the global marketplace—often thought to drive and shape the responses of producers at the bottom of the pyramid—as compared to those domestic and local factors that struck me, through my iterated

observations and interactions in the field, as also contributing to the choices made by communities and organizations alike. Specifically, I ask, how do transnational actors—businesses, NGOs and government regulators—wield authority over global commodity chains—in proposing rules and demanding compliance from producers in other political jurisdictions? How do producers respond? And when and why do they innovate their own alternative solutions?

I returned to the village of Diosbotek, not merely because I happened to know the community and the region well and was familiar with an NGO deeply engaged in grassroots development there—one with ties back to a leading international development organization. As one site in the multi-sited ethnography I endeavor to present here, Diosbotek, moreover, represents a site of transnational engagement and interaction— where I first heard about a purported “victory” secured by Mayan bee keepers against the multinational biotech corporation, Monsanto. My reason for returning to the village of Diosbotek in the summer of 2012 was to follow up on this perplexing rumor—that linked together Mayan subsistence farmers at the bottom of the economic pyramid with processes of national and possibly transnational contestation of agricultural practices, development, and even regulation. Among other places, I began in Diosbotek to seek a deeper understanding of the possible interrelationship between traditional Mayan agricultural practices with market based, more industrial-modes of

agricultural production and the commercialization of commodities, like honey, for global markets.

## 2. Producers and Policy Change at the Bottom of the Pyramid

### 2. 1 A Mexican (European) Honey Crisis

In 2012, a coalition of bee keepers, peasant social movements and their allies launched opposition to a bid by the multinational agro-biotech firm Monsanto to secure permits for genetically-modified (GM) soy plantations across thousands of hectares in Mexico—large swaths of land in proximity to land collectively owned and cultivated by Mayan *campesinos*, engaged in traditional subsistence agriculture and honey production. Initially granted by the Mexican agricultural agency SAGARPA (and later rescinded by court mandate) Monsanto's permits allowed for the commercial cultivation of more than 13 thousand tons of genetically modified seed on 253,500 hectares across Mexico.<sup>3</sup>

In a move that initially sparked concern for the Mexican beekeepers, the European Court of Justice had previously ruled (in 2011) on a case regarding German beekeepers with hives located close to fields of maize grown with genetically modified

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<sup>3</sup> "Amparo prohíbe la siembra de transgénicos en Yucatán," *Yucatán Ahora*, March 27, 2012. Monsanto petitioned the government of Mexico for permits to commercially plant some 253,000 hectares of GM soy, of which 60,000 hectares were planned in the Yucatán. Previously a court order invalidated a permit to Monsanto to plant 30,000 hectares with 'pilot sowing' of GE soy in the States of Campeche, Yucatán and Quintana Roo. Bee keepers—especially those producing "organic" honey—were especially concerned about contamination by pollen from Monsanto's GM soybean. See also "Monsanto Loses to Beekeepers of Yucatán Peninsula," *The Yucatán Times*, August 6, 2012.

(GM) seeds from Monsanto, in the German state of Bavaria.<sup>4</sup> The German beekeepers—no longer permitted to sell their honey in the European market—sought damages and requested that precautionary measures be put in place to mitigate further impacts from neighboring fields with GM crops. In particular, the beekeepers requested the Bavarian government to further prohibit GM planting close to their hives and to implement measures to limit contact between bees with their crops. The ruling set a precedent by characterizing trace amounts of pollen in honey—previously deemed a natural element of the honey itself—as an “added ingredient.” This seemingly subtle change in terminology was accompanied by significant new labeling and certification requirements for honey. According to the court’s ruling, minute quantities of pollen from GM crops—even if present in honey unintentionally as through bee pollination—would necessitate the labeling of honey as a genetically modified food, if not also requiring further restrictions.

Eventually billed as a precedent sparking a European “honey crisis,” news of this ruling and new GM-food labeling and certification requirements spread beyond Germany and the EU to producers around the globe. To comply with these standards, honey producers seeking to export to the EU could be required to pursue additional laboratory testing, certification and labeling of their product to indicate the presence (or

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<sup>4</sup> See Case C-442/09, *Bablok v Fristaat Bayern*, EUR-Lex 62009CJ0442, at 8 (September 6, 2011).

absence) of GMOs in their honey. For producers in Mexico—the third largest country exporting honey to the EU after China and Argentina—the message seemed clear: honey “contaminated” with GMOs would not be accepted for import and sale in EU markets.<sup>5</sup> How exactly producers might prevent such “contamination” from occurring (if Monsanto were to cultivate GM-soy in large quantities across the peninsula) was a different question: as confirmed by scientific tests conducted by a group of Mayan beekeepers themselves, bees indeed visit soy-flowers (even though they self-pollinate) as part of their daily work of gathering nectar and pollen from whatever flowers emerge in the vicinity of their hives.

The not-so-strange bedfellows coalition<sup>6</sup> of bee-keepers and NGOs—including Green Peace Mexico—contended that Monsanto’s introduction of massive monocropped plantations of GM-soy threatened to “contaminate” the region’s otherwise GM-free and high-value honey exports to the EU—thereby undermining a key source of

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<sup>5</sup> A significant consumer of honey, the European Union accounts for between 20-25% of global honey consumption. Since the EU does not produce sufficient quantities of honey to meet demand, the EU remains one of the world’s largest import markets for honey—with some 39 countries permitted to export to the EU. After China and Argentina, Mexico was the third largest supplier to the EU from 2006-2011, with exports increasing over that period by 27% (from 12,424 to 15,717 metric tons). USAID-CIAFS. “The World Market for Honey: Market Survey #01,” September 2012.

<sup>6</sup> As opposed to those with more outright divergent interests—akin to environmental activists and large-scale industry. See De Sombre 1995.



income for thousands of Mayan families that rely on beekeeping and honey production to supplement their subsistence livelihoods.<sup>7</sup>

Against seemingly long odds, the bee keepers secured victory—in the court of public opinion and eventually through the region’s highest tribunals.<sup>8</sup> The restrictions on the use of GM seed represented an outright ban on commercialization—ensuring *de-facto* collective compliance from all agricultural producers in the region and preserving the status of honey from the Yucatán as compliant with EU standards. Such a restriction on the planting of GM seed did, moreover, represent a departure from Mexico’s national policy (which authorized the cultivation of GMOs under certain conditions), making the Yucatán state the first transgenic-free zone in all of Mexico and a site of contested politics over the transnational governance of GMOs.

This turn of events—a GM-food labeling and certification rule in the EU compelling producers to pursue local policy change at a sub-national level in Mexico—prompts a number of compelling questions about the nature of risk regulation in a globalized world of commerce: How does the regulatory authority of the EU or, for that matter, any one public or private rule-maker, extend over global commodity chains, both through proposing rules and demanding compliance from producers outside of its

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<sup>7</sup> “Ma OGM – No a Los Transgenicos,” Green Peace Mexico [Web log post], May 14, 2012. Retrieved from <http://www.greenpeace.org/mexico/es/Blog/Blog-de-Greenpeace-Verde/ma-ogm-no-a-los-transgenicos/blog/40427/>

<sup>8</sup> “Revés a Monsanto,” *La Jornada*, July 23, 2014.

political jurisdiction? How do the targets of rules respond—especially when those targets (producers in this case) are embedded in jurisdictions with different governing rules and institutions? How and under what conditions do producers in emerging and developing countries comply with labeling and certification rules—as well as environmental and consumer health standards—devised in the more industrialized countries of the global North? And when and why do they innovate their own alternatives?

In this dissertation, I investigate these questions by illuminating the multi-dimensional dynamics of transnational governance in increasingly complex commodity chains. Ever more rigorous standards for quality and safety along with environmental and social criteria—often requiring certification and labeling of goods along commodity chains—were designed with the interests of Northern consumers, businesses and producers in mind. Implicitly, a trade-off is made among the preferences and interests of those demanding regulation, those supplying it, and its ultimate targets.<sup>9</sup> While a plethora of certification schemes have been well documented by social scientists over the past two decades, most schemes have been devised in and diffused via global commodity chains in the global North, with producers in the global South involved as “participants” to the extent that their practices are often the intended targets of

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<sup>9</sup> Büthe (2010, 9) distinguishes three main subsets of stakeholders engaged in the supply and demand of private regulation—rule-makers (suppliers), rule-demanders, and the targets of rules.

regulation. Unlike their multinational corporate counterparts, small firms and producers generally do not retain a seat at the international negotiating table.<sup>10</sup> For example, at issue-specific conferences of the parties (COPs), such as the Convention on Biological Diversity, representatives of producer organizations, coffee cooperatives, and the like may appear at “side-events,” but they themselves are rarely seen as direct agents, advocates or influencers of policy change. Nor do the producers themselves tend to be viewed as the sources of new rules or key actors contributing to the design of standards or the agents voicing innovative policy ideas. With some exceptions, conventional wisdom holds that small-scale producers are by and large “rule-takers.” That is, they take and react to requirements handed down to them by “rule-makers” and “rule-intermediaries.” They are not, themselves, often viewed as the source of new institutions—the demanders or suppliers of regulation. The caveat here is that some firms do engage in self-regulation, which further complicates their roles in governance—as potentially maker, target and enforcer of rules.<sup>11</sup>

Contrary to this conventional wisdom, this dissertation shows how small producers in global supply chains negotiate the demands placed upon them to comply

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<sup>10</sup> The work of Keck and Sikkink (1998) and O’Rourke (2004) suggests that affected communities can influence policy on the international stage, yet they operate through organizational intermediaries—such as transnational advocacy networks to access and influence corporations accused of misdeeds or global policies that impact them.

<sup>11</sup> Levi-Faur and Starobin 2014.

with increasingly uncertain and fluctuating global markets and institutions—often on their own terms. This is not simply a dynamic of authorities issuing rules and producers “complying or else.” While standards may be issued and passed down by powerful states or private actors, producers in jurisdictions with different rules—encountering gaps among international, state and local markets and regulations— may, under certain conditions, endeavor to comply with those rules via other forms of policy change. These governance gaps in the transnational regulation of commodities represent both challenges and opportunities for the targets of rules to contest regulations in their jurisdictions—allowing for the bottom-up emergence of new local institutions in addition to the possibility of new configurations of local and global regulatory arrangements.

In the case of honey in Mexico, the success of the non-so-strange bed-fellows coalition of small-scale bee-keepers, peasant social movements, and environmental NGOs depended on the formulation of new ways of thinking about regulation. This intellectual departure was sparked by shifting regulations in the European Union and hinged on the unique characteristics of honey as a traded commodity. I propose that “shadow” and “focal” commodities represent new independent variables contributing to regulatory change that need to be considered in tandem—in ecological, market and regulatory systems alike. I articulate the concept of “shadow” commodities to

distinguish a subset of traded commodities that are produced in the periphery of formal markets—largely unregulated and unregistered by governments. In contrast, I delineate “focal” commodities to be those that are not only identified and calculated as part of a country’s Gross Domestic Product (GDP), but relatedly, ones that are prioritized by political and economic actors because of their significant economic contributions to GDP. Focal commodities are often central to global trade negotiations, as they often represent the source of a country’s comparative advantage, whereas shadow commodities usually are not. As will be discussed in my conceptual model in Chapter 4, the interactions and interdependencies shared between shadow and focal commodities in natural and human systems generate new possibilities for producers to pursue policy change and innovation. Regulations contrived with focal commodities in mind—like soy, corn, and coffee—can have significant spillover effects to shadow commodities, like honey, as the case of honey in Mexico demonstrates. In a very different way, shifting dynamics with other focal commodities like coffee—including those associated with market volatility or a crop failure—can also create new windows of opportunities for the emergence of new niche markets and institutions related to shadow commodities, as the case of fresh produce in Nicaragua will show. To succeed in challenging status quo regulations, small-scale producers may find greater success in tackling regulatory issues related to shadow commodities rather than focal ones—given the likelihood of fewer

concentrated and entrenched interests centering on smaller, niche markets, like honey and fresh vegetables, as compared to other majorly traded commodities, like corn and coffee.

One policy implication of this analysis is that the effectiveness of transnational regulatory arrangements governing global commodities—such as certification and labeling schemes—may depend upon not only the substance of standards and proposed monitoring and enforcement arrangements proclaimed by rule-makers in one jurisdiction but also on the existence or emergence of such institutions in the jurisdictions of rule-takers—as well as the particular qualities of the regulated commodities themselves. In this respect, my analysis questions the assumption that efficacy of regulatory efforts undertaken by rule intermediaries—such as third party certifiers—can be independent of those of rule-makers and rule-takers, or the nature of the good itself subject to regulation.

## ***2.2 Contending Approaches: Producers and Policy Change at the Bottom of the Pyramid***

The issue of how producers respond to demands for compliance with transnational standards and certification schemes has received considerable attention among scholars of transnational regulation and governance, though the literature has generally focused on larger firms and those companies operating at a global scale.

Though this literature may be less helpful in illuminating how and why small producers—like subsistence farmers and bee keepers—respond to changes in transnational regulation, it provides the context for understanding what conventional wisdom leads us to expect with regards to firms as regulatory targets, in general, and large multinational corporations like Monsanto, in particular.

That the targets of regulations might seek to change rules in their jurisdictions in order to facilitate compliance with a given industry's standards or those of a key market, like the EU, is not, viewed in isolation, surprising—especially if certain firms or groups of producers are poised to be disadvantaged by failing to comply with such rules. As the perpetual moving targets of regulatory rules of all stripes, producers, especially large multinational firms, have long evinced dynamic responses to the regulatory landscapes they inhabit (or plan to)—from local to international levels.

A firm's legal compliance with home rules in the jurisdictions where it originates (or where it is legally chartered as a company) represents a baseline expectation for a presumably "compliant" firm.<sup>12</sup> Apart from electing to challenge or change rules in the jurisdictions where they are based, some firms may opt to voluntarily comply with the standards of key markets and apply those standards uniformly across their production processes (benefitting economies of scale), even if those standards are stricter than other

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<sup>12</sup> This assumes, for the moment, that basic compliance with existing legal rules and norms is, in fact, the rule rather than the exception and that effective institutions exist to assure monitoring and enforcement.

jurisdictions where the firm operates. Consistent with the “California Effect” phenomenon, jurisdictions like California—with strict environmental and consumer standards yet a large market highly attractive to businesses—are able to set the *de facto* standard for business, effectively trumping those of laxer jurisdictions.<sup>13</sup> On a global scale, the “Brussels Effect” has been argued as an international parallel to the California Effect, with Brussels and the EU as sources of “unilateral regulatory globalization,” by which firms and producers seeking access to highly valued EU markets adopt EU rules, however stringent, to gain market entry.<sup>14</sup> The theory of the Brussels effect has both relevance and limitations to the questions and cases considered in this dissertation. Bradford’s (2009) theory applies well to large firms and those with “indivisible” production, less well to smaller firms and those producers engaged in the production of intermediate or composite goods rather than final products. Moreover, as noted by Bradford, it offers as of yet an incomplete explanation for the partial influence of EU regulatory authority in the global governance of GMOs, in particular.

Beyond simple compliance and the adoption of standards in jurisdictions relevant to trade, firms may actively strive to influence public rule-making processes at domestic and international levels in an effort to remove barriers to trade or to achieve

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<sup>13</sup> Vogel 1995.

<sup>14</sup> Bradford 2012.



regulatory harmonization.<sup>15</sup> Moreover, firms have worked preemptively in public and private forums to influence the formation of substantive standards, especially as a means to protect their future comparative advantage in new markets.<sup>16</sup> For example, firms may seek to shape the design of new policies and regulations around a particular issue area by participating in key business and trade associations or as observers to standard-setting and expert advisory committees associated with public institutions, like the Codex Alimentarius Commission.<sup>17</sup> Indeed, large firms—especially multinational corporations—have excelled at influencing their home country governments’ positions at the negotiating table for key international agreements, compelling their governments to advocate for regulations that would best serve firm interests. Especially powerful global firms have succeeded in influencing the stance of those countries directly negotiating treaties or other policies with substantive impact to firm interests, like intellectual property rights<sup>18</sup> and GMOs. For example, Smythe (2009) offers an extensive discussion on the role of global companies in influencing the rule-making processes of

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<sup>15</sup> Braithwaite and Drahos (2000, 25) define harmonization as "the prescription that different levels of government and different governments should set the same rules."

<sup>16</sup> Smythe 2009.

<sup>17</sup> The Codex Alimentarius Commission is a joint body of the Food and Agriculture Organization (FAO) and the World Health Organization (WHO). It was founded in 1962 with the specific mandate of developing and harmonizing food standards in order to both protect consumer health and guarantee fair practices in the food trade. See Smythe 2009; Büthe 2009.

<sup>18</sup> Sell 1999; Sell 2009.

the Codex, especially with regards to the possible development of standards for the mandatory labeling of foods containing GMOs.

One further driver for firms to endeavor to influence the specific policies adopted by individual countries, if not also subnational or local jurisdictions, is to facilitate convergence among global and domestic rules—thereby enabling market entry and reducing compliance costs for firms operating across multiple jurisdictional boundaries.<sup>19</sup> Multinational firms striving to operate in multiple countries must navigate a multifaceted web of regulations across a multitude of issue areas (from safety and quality standards to health and the environment), with the likelihood of differences across and within countries, from national to subnational and even local levels of government. A similar web of rules, moreover, exists for actors operating at smaller scales, yet they often lack, at least individually, the resources and capacities to respond akin to large firms and MNCs—access to information, power, financial resources etc to circumvent or change undesirable rules. Likewise, in the interests of maintaining uniformity of standards across a firm’s production processes, even firms relocating to jurisdictions with lower standards may in fact import the stricter standards to apply to their operations, effectively ratcheting up local environmental standards.<sup>20</sup> Garcia-Johnson’s (2000) work on Responsible Care provides empirical evidence for how MNCs

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<sup>19</sup> Bütte and Mattli 2011.

<sup>20</sup> Garcia-Johnson 2000.

relocating to developing and emerging markets may actually ratchet up standards in their new jurisdictions, by importing and diffusing the stricter environmental standards from their home jurisdictions. Large firms—rather than small-scale or individual producers—are central to her analysis. In this case, the major corporations which might be "importing standards"—large multinational agribusinesses—are actually seeking to diffuse and establish a weak regulatory environment for GMOs, consistent with U.S. policy, rather than a more strict approach that constrains GMO cultivation and commercialization. This would be opposite to what Garcia-Johnson demonstrates, where the global companies were importing voluntaristic corporate environmental standards that actually led to strengthened domestic standards in the jurisdictions where companies operated. In sum, large firms, especially MNCs, wield significant corporate power and authority to influence the design of policies to best serve their interests in creating for themselves a more certain and homogenized regulatory world—to facilitate their globalizing operations across multiple jurisdictions.<sup>21</sup>

Yet, while such regulatory convergence may align with the interests of MNCs seeking to reduce their overall compliance costs,<sup>22</sup> such harmonization may conflict with the interests and needs of other subsets of firms and domestic stakeholders who might actually face increasing compliance costs and other consequences should domestic

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<sup>21</sup> A similar argument is advanced by Braithwaite and Drahos (2000).

<sup>22</sup> Vogel 2012.

standards (or private industry standards) suddenly shift to a different set of rules. According to Bütthe and Mattli (2011), a number of factors will contribute to the size and distribution of costs firms face when existing rules are revised by public or private authorities (or when switching to new sets of technical standards). International rules—especially those that go uncontested in global forums—can readily become embedded in national and local standards and regulatory policy. When developed at the international level, these standards are purportedly recommended for “voluntary adoption.” In practice, however, even voluntary international standards, like Good Agricultural Practices (G.A.P.) advanced by GLOBALG.A.P, can become the *de facto* norm operational in domestic settings as well.<sup>23</sup> The use of international standards in place of domestic ones represents a “non-trivial” commitment made by governments, which has substantial economic implications, if not also social and environmental ones.<sup>24</sup> In this way, competing alternative policies or standards may intentionally or inadvertently be pushed out—policies potentially deemed more consistent with the preferences of domestic stakeholders, including small to medium enterprises, local retailers, small farmers, or civil society more broadly.<sup>25</sup>

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<sup>23</sup> GLOBALG.A.P. is an NGO which sets voluntary standards for the certification of agricultural goods produced internationally according to Good Agricultural Practice (GAP).

<sup>24</sup> Bütthe and Mattli 2011.

<sup>25</sup> Fuchs et al 2009.

Hence, conventional wisdom would lead us to expect that producers and firms engaged in the production of commodities destined for global markets would likely possess the interest, if not also the capability, in affecting the regulatory rules governing the production, distribution and sale of their goods in the various jurisdictions where they operate. We would, thus, expect that a powerful corporation like Monsanto would be poised to win (not lose) the regulatory battles it confronted—be them in the EU or Mexico’s Yucatán Peninsula, especially given that company’s history of influencing the formulation of global regulations for GMOs. As Smythe (2009) suggests, the fact that the Codex Alimentarius Commission refrained from articulating a clear position on the mandatory labeling of GM food implicates the instrumental power of large agribusinesses like Monsanto in influencing the development of new rules (or perpetuating the absence of them).<sup>26</sup>

Moreover, the literature generally focuses on how producers of given commodities “individually” respond to the demands of global certification schemes rather than organizing collectively to change local policy. Individual producers can choose to comply or not for most goods they are producing. Heterogeneity of adoption of standards in a given growing region indicates that producers—facing different incentives and costs—may elect to opt in or out of a given scheme if made available to

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<sup>26</sup> See also Schurman and Munro 2010; Toke 2004; Bernauer 2003.

them. This is truer when schemes offer ways to distinguish attributes of products beyond basic quality and safety—such as shade-grown, bird-friendly or fair trade coffee (though some would argue that these so-called “amenities” are bound to the quality of the product in other ways). For other product attributes, some basic level of certification—such as following basic safety and hygiene practices on farm to assure that a product is “safe”—represent a minimum barrier to entry enabling a farmer’s product to qualify for export (even minute quantities of it). Good Agricultural Practice (GAP), for example, represents one such certification effort to bring up all farms to some minimum level of “good” agricultural practices. In many of these cases, however, producers can individually elect to comply with certification demands promulgated by government or private authorities in order to participate in the market. Collective compliance from all producers in a given region—of the same or different commodities—is not generally a prerequisite for individual compliance. Barring problems of leakage from other possible sources of negative impacts (i.e., contaminated upstream water for irrigation or wafting pesticides from one farm to another), various approaches to producing a commodity for market appear to coexist alongside one another—high sun coffee plantations abutting rainforest, “shade-grown” coffee plants, fair trade alongside the less fair. With the caveat that such heterogeneity might translate into a highly fragmented ecological landscape, in principle, coffees bearing certifications

for a multitude of premium-worthy attributes could in fact all originate from the very same coffee-growing region. For example, the Fair Trade movement and its related certification schemes actually compelled producers to undertake collective action in order to participate—by requiring they be organized into cooperatives in many cases. Yet such collective action was mandated as a prerequisite to compliance rather than something voluntarily pursued by producers in order to pursue local policy change (i.e., policies beyond those that would affect only producers involved in the particular commodity chain).

In essence, with a dominant focus on larger firms and producers over smaller ones, the regulation and governance literature emanating from political science offers limited insight into how small producers in global supply chains similarly navigate complex multi-jurisdictional regulatory terrain. Sociological studies taking a global value chain approach have offered a more acute lens for examining heterogeneity in how smallholders engage with standards in global commodity chains, though this work too suggests that small firms and producers are marginalized participants if not solely passive recipients of global standards rather than active agents. Lee, Gereffi and Beauvais (2009) surmise that “...the presence of multiple governance structures and stringent private food standards shape the strategic options available to smallholders, who confront three basic choices: upgrading, downgrading, or exit.” For example,

coffee producers might elect to “upgrade” —by pursuing strategies to access higher value markets which grant price premiums and complying with increasingly stringent quality, safety, and environmental standards and/or additionally seeking certification for these goods. Alternatively, they can “downgrade” —as when their products no longer meet the changing *de facto* or *de jure* quality standards of the marketplace, and they can only sell them into lower quality markets (or informal ones) for which they receive a reduced price. Exit is also an option—to altogether cease attempting to earn a livelihood from growing coffee and instead pursue another means of subsisting off the land or earning a cash income. Exiting can mean many things: joining the local labor market as a seasonal picker or harvester for another grower; migrating to an urban area in search of temporary work in a factory, at a construction site, or shop; or leaving one’s country of origin altogether in search of economic possibilities elsewhere.

### **2.3 Governance Gaps in the Transnational Regulation of Commodities**

For small firms and producers, challenges to status quo rule-making authority or the innovation of alternative institutions represent the exception, rather than the rule. My analysis, however, shows that small producers often viewed as less powerful—with different ideas about what the rules that govern ought to be—can challenge, at the grassroots level, powerful actors and existing regimes and paradigms. As a response to



externally-driven, top-down transnational market and regulatory pressures, some producers instead “down-scale” in the face of globalization—pursuing bottom-up solutions to the market and regulatory problems they face. In essence, this analysis shows that voice—not only dutiful compliance or simple exit—may also represent a viable pathway for producers of globally traded commodities to assert their values and interests.<sup>27</sup>

To understand the changing dynamics of transnational agrifood governance, I elucidate a typology of “governance gaps” to augment the conventional wisdom on the transnational regulation of commodities, in general, and the governance of genetically modified organisms more specifically. Perceived regulatory gaps in need of “filling” are central to scholarly and policy-relevant discussions of increasingly trans-boundary trade in the wake of globalization. So-called “gaps”—holes in oversight left by states appearing to lacking the willingness or capacity to regulate portions of supply chains within their jurisdictions—are often construed as policy problems in need of “solving” (i.e., as governance deficits or missing institutions). Frequently prescribed remedies to these governance gaps emphasize international regime formation and harmonization of public rules at the national level as well as the creation or deployment of other policy

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<sup>27</sup> Hirschman 1970.

instruments, like certification and labeling schemes—promulgated by public or private actors—to serve as a substitute or complement to existing institutional arrangements.

An often unchallenged assumption in the literature is the inherent desirability of regulatory harmonization—and the level of governance at which such convergence occurs. While formal harmonization of regulations at the national level may more readily allow for trade among countries (as achieved through negotiated treaties, bilateral agreements and the like), there are relative losers and winners in this process. The literature’s emphasis on a “problem-solving” approach to regulatory change further glosses over potentially contentious undercurrents that may instead be driving the perpetuation of governance gaps and the seeming absence of typical institutional remedies.

Indeed, in the case of GMOs in Mexico, what we observe is not the formal convergence of Mexico’s national policy with that of the European Union; rather the *de facto* harmonization of a geographic region of Mexico with supranational EU policy. What this case suggests—and will be demonstrated in this dissertation—is that there were “governance gaps” in the transnational regulation of GMOs which compelled changes to local rules in order that Mexican honey producers could ostensibly be in compliance with European labeling and certification laws for GM foods. Such a transformation of rules would not be necessary were it the case that Mexican GM rules

were the same or aligned with those of the EU (yet they are not harmonized for a variety of reasons). The certification demanded by the EU, moreover, created new governance gaps—hurdles for producers seeking to comply despite residing in jurisdictions with different rules. In addition to the mutual interest shared by producer communities to pursue rules protecting their interests (i.e., access to global honey markets), producers and other stakeholders leveraged the GMO governance gap as an opportunity to pursue rules aligned with other interests and values (i.e., the large-scale plantations of GMO soy proposed by Monsanto may have been out of step with producers’ values beyond any possible threats of contamination to their own product.)

Adopting an analytical approach advanced by Hedström and Swedberg (1998, p. 1), I endeavor to “...explicate the social mechanisms that generate and explain observed associations between events.” In the case of honey in Mexico, beyond describing the “unique chain of events” that led from the EU ruling to policy change in the Yucatán, I use process tracing to illuminate the underlying causal mechanisms that explain these unfolding events, including the legal rules, social institutions and causal agents (acting individually and collectively) to shape these unfolding events. The governance gaps that emerge in this case include those that emerged amongst the overlapping and competing legal rules governing GMOs from global to local scales—gaps which producers and other stakeholders were able to exploit to advance policy change. The

gaps, moreover, include missing institutions demanded by local stakeholders, though not yet supplied at a regional scale to tackle the complex spillover effects and externalities from the interactions among local socio-ecological systems with the global agricultural commodity trade—emerging as a result of the interaction between the characteristics of a focal and shadow commodity.

If my argument is correct about the social mechanisms<sup>28</sup> driving Yucatán beekeepers and others to challenge the status-quo governance of GMOs, this example offers assistance in understanding the conditions under which the targets of global rules respond to them, especially when embedded in jurisdictions with different governing rules and institutions. Although the articulation of global standards and demands for compliance certainly can compel shifts in producer behavior to toe the new regulatory lines, that process typically also involves producers undertaking considerable effort to reshape local rules and institutions from the bottom up—to remake a policy environment that will conform to their needs. It further demonstrates how small-scale producers, often portrayed as rule-takers and passive adopters of rule, are actively engaged in collective action and the shaping of markets and institutions. This is not just about compliance with proclaimed rules, but a further step beyond compliance that may go so far as to reshape the local institutional context for engaging with global trade.

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<sup>28</sup> Hedström and Swedberg 1998.

## **2.4 Case Selection and Methods**

I use the cases of honey in Mexico and fresh produce in Nicaragua to build middle range theory and uncover new independent variables for studying regulatory change, namely: the interaction between the commodity characteristics of “shadow” and “focal” commodities.<sup>29</sup> Both uncommon instances of creative adaptivity by local economic groups and their political allies, these two cases were selected based on the unexpected outcomes observed—namely that regulatory change or innovation was achieved when we might otherwise not expect it to occur, involving agents we normally expect to be the losers, not winners, in the politics of business regulation and governance. The inadequacy of conventional wisdom to account for the unexpected outcome of regulatory change and innovation suggests that new theory is needed. Thus, the analytical, inductive approach I adopt in this study to create middle-range theory is an appropriate one to answer the research questions of interest and for the purposes of uncovering new independent variables and potential causal mechanisms that have been otherwise overlooked.<sup>30</sup> It is not my aim to contrive a complete theory. Rather, consistent with George and Bennett (2005, 235), I strive to articulate a typological theory

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<sup>29</sup> George and Bennett 2005.

<sup>30</sup> George and Bennett 2005.

of the “...various pathways through which particular types relate to specified outcomes.”

To pursue this line of inquiry, I conducted multi-sited, ethnographic field research in Central America and Mexico, during several waves of data collection across field sites from 2007-2012, as noted above and summarized in Table 1. I gathered data through participant observation and interviews and collected policy documents, news articles, and educational materials, which I use as additional sources of information for the purposes of triangulation. As a method of its own, participant observation includes not merely the act of “observing” and “participating” but a multitude of interactions with individuals and communities alike.<sup>31</sup> Over the course of many field visits, the number of people with whom I spoke and interacted, and from whom I derived important insights, number in the hundreds. For the purposes of this dissertation, however, I am separating out data collected through participant observation (which I cite as field notes) as distinct from formal or informal interviews with key informants (cited as interviews or personal communication). Where possible and permissible, such interviews were recorded, in addition to written field notes. Following conventional ethnographic methods,<sup>32</sup> I created a systematic process for taking notes during

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<sup>31</sup> Bernard 2011.

<sup>32</sup> Bernard 2011.

interviews and participant observation, where possible, in addition to maintaining a notebook for jottings—short bits of information used to later trigger my memory in writing up field notes, which I wrote up daily upon completion of my day’s work.

The bulk of research contributing to the empirical case studies examined in depth in this dissertation rely on data collected in Mexico and Nicaragua. Where appropriate, I also draw on observations and data gathered from related field work during the same period in Guatemala, Honduras, and El Salvador. These additional observations, at the very least, paint a portrait beyond the borders of my limited study—as to a possible universe of cases beyond those explicitly considered here (and ones for future study). They also point to the existence of similar conditions and communities elsewhere that are grappling with parallel questions about how to respond to global markets and transnational regulatory forces in their own communities, countries, and Central America more broadly.

Much of my time was spent embedded within the Mayan village of Diosbotek in Mexico's Yucatán peninsula (Figure 1, 2).

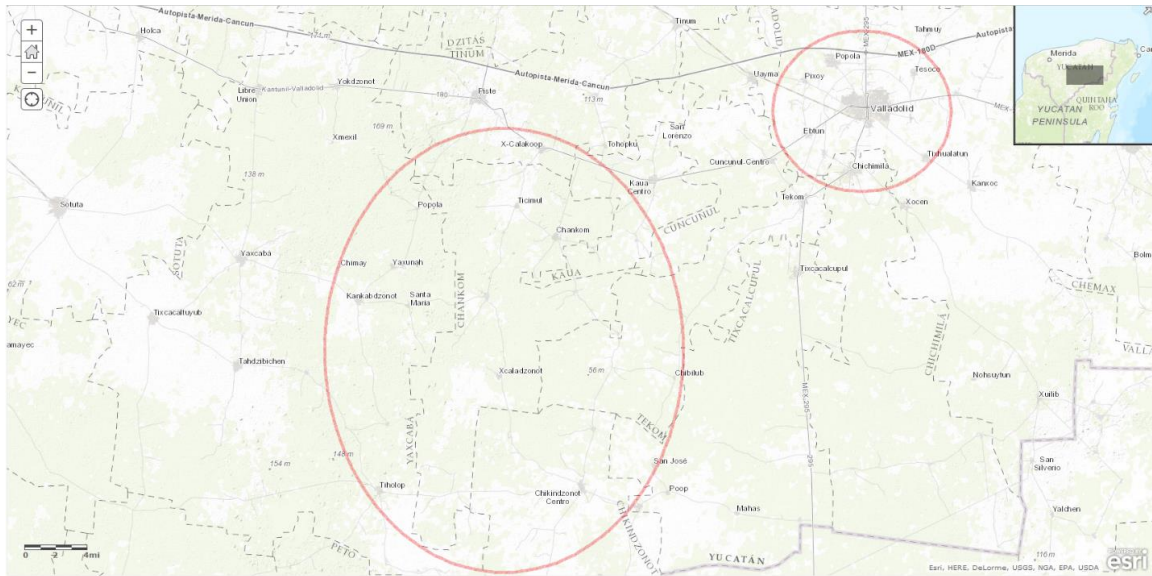


**Figure 1: Map of the Yucatán Peninsula in Mexico**

I lived in a rented house in the village and spent my time getting to know different members of the community, socializing with families where they worked and lived, participating in and visiting community development projects involving both



community members and outside stakeholders.



**Figure 2: Map of Field Sites in the Yucatán Peninsula**

Both interviews and informal conversations shed light on various aspects of community members’ lives and their perceptions of the world. Conversations were conducted where families worked and lived and often while people were busy engaged in some activity, which I often participated in—like making tortillas by hand while seated around the wood fires on which they prepared their family’s food, shucking dried kernels of corn from the season’s harvest in a make-shift micro-shop at the front of someone’s home, which sold few household sundries and treats, like soap and bubble gum; in the wooden shack that doubled as a tailor shop—where a few women embroidered clothes or tailored garments using an old Singer sewing machine. I

followed producers on walks through their kitchen gardens and fields, learning about how they cultivate their subsistence production—*milpa*—over the course of a season, and how they otherwise earn additional income, if at all. More than a few enlightening conversations happened during long car or truck rides to the nearest city of Valladolid, as a private car was generally the only means of transport—public or private—beyond what could be reached easily on foot or by bicycle. My attention was directed as much at the sources of a household’s subsistence livelihood—the crops grown in their *milpa* and kitchen gardens—as it was to the cultivation and marketing of particularly valuable commodities, like honey, and the structure of their engagement with both formal and informal markets (and the Mexico that existed beyond the borders of Diosbotek and the Yucatán).

## ***2.5 Outline of the Dissertation***

The dissertation proceeds as follows: In chapter three, I survey the literature examining drivers of regulatory change in global governance, with particular attention to the role of state and non-state actors in shaping the institutional architecture of transnational regulation. In chapter four, I elaborate the case of honey in Mexico to illuminate the complex socio-ecological, market and regulatory dynamics at play in the cultivation of crops and commodities, like honey, for consumption and sale into local

and global markets. In chapter five, I offer my alternative explanation for regulatory change—elucidating how the physical characteristics of commodities act as constraints to the set of possible institutional alternatives to effectively redress policy problems.

In chapter six, I elucidate another way that that the commodity characteristics of a shadow commodity—fresh produce—interacted with those of the focal commodity—coffee—to provide a strategic missing link for fostering market and regulatory innovation in Nicaragua. My objective here is to test the capacity of producers of shadow commodities in niche markets, who confront a relatively open regulatory playing field, to shape the creation of domestic institutional alternatives to transnational markets and regulation. I demonstrate how niche markets for fresh produce in Nicaragua—and innovative regulatory arrangements for commercializing and certifying these products, all be it in domestic markets—emerged through the shifting of agricultural production away from the dominant commodity—coffee—and towards fresh fruits and vegetables.

Finally in Chapter 7, I conclude by discussing the policy implications of my theoretical approach for the regulation of agricultural commodities in general and in the context of biotechnology in particular. I discuss how the particular characteristics of a given commodity may introduce unanticipated challenges to the institutional design of

governance mechanisms, especially in the management of externalities and spillover effects to non-target commodities and species.

### 3. The Prospects and Limits of Transnational Governance and Development

The growing interdisciplinary fields of international environmental studies and regulation and governance have documented a proliferation of governance initiatives emerging in the wake of globalization—efforts undertaken by both public and private actors to regulate increasingly complex trans-border commodity trades.<sup>1</sup> The literature in these fields has generally highlighted transnational regulatory schemes devised by NGOs, international organizations, and multinational corporations based in the industrialized countries of the global North,<sup>2</sup> such as the Forest Stewardship Council (FSC)<sup>3</sup> and the Rainforest Alliance.<sup>4</sup> As a result, this scholarship largely skirts consideration of the roles played by stakeholders in the global South in regulatory

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<sup>1</sup> Gulbrandsen 2004; Cashore et al 2004; Bartley 2003.

<sup>2</sup> Among schemes initiated by NGOs based in the global North, the Forest Stewardship Council (FSC) and Fair Trade (especially for coffee) have been studied to a greater extent as compared to emerging schemes initiated in the global South. On private forest certifications, see Bartley 2003 and Cashore et al 2004. On Fair Trade and Organic certifications, particularly for coffee, see Bacon et al 2008; Gonzalez and Nigh 2005; Benoit and Ponte 2005, and Bray et al 2002.

<sup>3</sup> The Forest Stewardship Council (FSC) is a transnational private regulatory body which sets standards for the certification of forest and companies. According to the FSC, certification by the membership-based organization “...ensures that products come from responsibly managed forests that provide environmental, social and economic benefits.” See Cashore et al 2004. See <https://us.fsc.org/en-us/certification>, accessed February 24, 2016.

<sup>4</sup> Certification by the Rainforest Alliance “encourages farmers to grow crops and manage ranchlands sustainably,” with a focus on working with farmers to balance the “three pillars of sustainability-- environmental protection, social equity and economic viability.” See <http://www.rainforest-alliance.org/work/agriculture>, accessed February 24, 2016.

innovation, as well as their interactions with other actors and institutions engaged in transnational sustainability governance.

The cultivation practices of farmers in the global South are often the intended targets of economic development and regulatory interventions alike. As a result, North American and European social scientists often portray producers of agricultural commodities in the global South as passive and marginalized “participants” —the sources of problems crying out for action, including tropical deforestation, biodiversity loss, and ecosystem degradation. These producers are at once portrayed as marginalized participants without “agency,” harbingers of apocalyptic environmental degradation, and the individuals whom regulation must nudge or compel to change their evil ways. The tensions and contradictions abound in the various characterizations of subsistence and smallholder farmers and their behavior in pursuit of a living—weak, economically marginalized, and politically disempowered (voiceless) on the one hand, yet still ruinous of globally prized commons (all be it in their own local backyards) on the other. This portrayal is perhaps best encapsulated in a 2014 article, and accompanying photographs, from the environmental science and conservation news and information site, Mongabay. Summarizing a key take-away from a prominent study published in the *Proceedings of the National Academy of Sciences*, Mongabay’s headline lays blame squarely on small-scale producers: “As Amazon deforestation falls, small farmers play

bigger role in forest clearing.” Accompanying their article are quintessential images of “recent deforestation” from the Brazilian Amazon, including one featuring felled trunks and charred stumps and another foregrounding a solitary tree amidst a newly cleared agricultural landscape, with small fires still smoking, whilst stands of intact rainforest loom ominously in the background.

While the news headline hefts culpability on “small farmers,” the fine print under the first image acknowledges that “[d]espite the increasing proportion of deforestation resulting from smallholder properties, the majority of deforestation is still associated with larger properties in the Brazilian Amazon.” Study co-author Pablo Pacheco, who works as a scientist at the Centre for International Forestry Research (CIFOR), notes that in working towards “Preserving remaining rainforests and promoting sustainable rural development...We need to take into account the socioeconomic difficulties facing many smallholder farmers, and work to alleviate rural poverty and foster sustainable development along with reducing deforestation.” Yet, the headline remains, and the message seems readily apparent: small farmers have agency in contributing to social ills but not necessarily in contributing positively to redressing these problems or the creation of other essential public goods.

In similar ways to their portrayals in the context of rural development and conservation, producers—large and small—and regulatory actors in the global South

are, moreover, depicted as the recipients of rules, rather than constructive agents actively challenging and reshaping *de jure* laws and *de facto* norms and institutions if not also innovating alternatives to them. As Hale and Held (2011) note in their comprehensive edited volume on institutions and innovations in transnational governance:

One of the clearest observations to emerge...is the 'governance gap' between North and South. To put the issue starkly, while many of the programmes rely on Southern participation and serve the interests of Southern stakeholders, almost none of the innovations in transnational governance...have been led by Southern actors. Instead, institutional innovation has been led by Northern states, NGOs, corporations and international organizations.

Among other things, this dissertation questions two of Hale and Held's (2011) underlying assumptions: first, that existing transnational governance arrangements indeed serve the interests of Southern stakeholders as compared to their Northern counterparts; second, that the failure of scholars to discuss Southern institutional innovation indicates the real absence of it. This dissertation endeavors to fill an important theoretical and empirical gap in the literature by examining the ways that non-state actors from developing and emerging economies—particularly small-scale producers, farmer associations, and NGOs seeking to enhance rural livelihood security—interact with transnational sustainability governance, engaging as active and innovative policy actors in the regulation and governance of agricultural commodities and natural resources.



Contrary to the prevailing account in the literature, this dissertation illuminates one way that small producers in global supply chains negotiate the demands placed upon them to comply with increasingly uncertain and fluctuating global markets and institutions, that is: by “downscaling” and innovating domestic alternatives to them. In revealing this previously unacknowledged governance adaptation, I endeavor to make several contributions to the scholarly literature on sustainability governance in the global South and regulation and governance more broadly. First, in an effort to illuminate the ways that producers interact with transnational regulatory schemes, I propose a conceptual framework for understanding the paradoxical dilemma of “costly credibility” faced by small producers and firms in global production systems. That is, certification by an independent, private third party is often (but not always) a prerequisite for market access to more premium markets—an assurance to prospective buyers of credible producer compliance with specified quality, safety, labor or environmental standards. Yet such certification is costly—in terms of both the financial costs required to achieve compliance and pay for certification as well as other hidden costs that may represent negative externalities for producers and hinder their involvement, such as additional time and resources required for building prescribed technical knowledge, implementing new systems and documentation.

In addition to challenging conventional wisdom regarding “Southern” innovation in regulation and governance, I demonstrate in this dissertation that small-scale producers are more than mere “targets” of rules and interventions promulgated by state and non-state actors—that they also have agency as both market and regulatory actors. Not the passive “rule-takers” often characterized by both scholars and practitioners, I argue that producers can also be “rule-makers”—challenging existing rules and institutions as well as innovating alternatives to them. Just as *campesinos*—rural peasants—are experimentalist in their fields with the varieties of crops and cultivation methods (within the resource and risk constraints before them),<sup>5</sup> so too they may be experimentalist in their governance and the pursuit of rules and institutions that better conform to their particular circumstances and preferences.

This chapter proceeds as follows. The first section provides key definitions of terms central to this dissertation. The second section provides background on the supply and demand for transnational governance solutions to problems confronting producers in emerging and developing markets. The third section problematizes transnational governance interventions—namely third party certification—as redressing the problems faced by small producers. The fourth section introduces a framework for understanding the credibility dilemma faced by producers engaged, by intent or by

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<sup>5</sup> Holt-Gimenez 2006; Richards 1985.

default, with global markets. The fifth section introduces my conceptual model of “downscaling” in the face of globalization, including brief introduction to the conditions I identify as important to facilitating regulatory innovation and change, which will be further elaborated in a subsequent chapter.

### **3.1 Defining Terms**

Many terms introduced and discussed in this dissertation can have a multiplicity of meanings and interpretations. While I intend to define terms whenever I introduce them throughout, several require clarification upfront, not least because many are named in title of this project: institutions, transnational, sustainability, governance, smallholders, and commodities. I, moreover, define and articulate here terms original to this dissertation, namely my distinction between focal and shadow commodities.

#### **3.1.1 Institutions**

First, following North (1990, 3), I define institutions to be “the rules of the game in a society...the humanly devised constraints that shape human interactions,” including the following: *de jure* treaties, policies, laws, conventions, and regulations as well as *de facto* norms which may be operational in a given society. I further adopt Knight’s (1991, 2-3) view that “...for a shared set of rules to be an institution, knowledge

of these rules must be shared by the members of the relevant community or society."

This notion of institutions as the "rules in use" is valuable in discerning how particular rules and norms—such as regulatory standards—are created, diffused, translated and ultimately interpreted (or not) by rule targets. To the extent that a law or norm is not understood in a given context, it may be as if the rule does not exist at all.

### **3.1.2 Transnational**

Whereas the term "international" pertains to state-to-state interactions, I employ "transnational" to refer to "interactions that cross national boundaries at levels other than sovereign-to-sovereign" (Hale and Held 2011, 4-5). More specifically, following Hale and Held (2011, 15), transnational refers to "...activities, institutions, actors or processes that cross at least one national border, especially when actors other than national governments are involved." These activities may overtly cross borders, as with the actual trade in goods and services; I also include here the market processes and institutions that structure interactions—which may more indirectly transcend borders as local actors draw upon institutions and ideas diffused from international to domestic contexts. In this last respect, I diverge from Hale and Held (2011, 15) in their exclusion from their definition of "purely domestic interactions and institutions." Because of the interactions between domestic and international political processes, what appears at first

as purely domestic may in fact be a reflection of interactions among domestic and international actors,<sup>6</sup> as in the case where the standards of one jurisdiction are adopted and incorporated into those of another country or where private transnational standards are incorporated “by reference” into those laws adopted by governments at various scales. Eberlein et al (2014) elaborated a new research agenda on interactions in transnational business governance (TBG) in a special issue of *Regulation and Governance*, including an examination of interactions amongst transnational initiatives with domestic laws and institutions. Though not specified explicitly in Eberlein et al’s (2014) opening article to the special issue, interactions presumably also include transnational schemes and their interaction with regulatory institutions in developing and emerging economies—including the diffusion of norms, ideas and institutional models.

### **3.1.3 Sustainability**

The concept of “sustainability” has long been shifting and amorphous both in the context of economic development and transnational governance—where we see the intersection of a concept diffused from the top of the international system and interpreted and reapplied in myriad ways by states, businesses, NGOs, and even atomized individuals from local to global scales. The Brundtland report, published by

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<sup>6</sup> This approach is also consistent with that of Weinthal (2002).

the World Commission on Environment and Development in 1987, popularized the notion of “sustainable development” as “development which meets the needs of the present without compromising the ability of future generations to meet their own needs.” Inherent in the notion is a difficult compromise and acknowledgement of trade-offs—the demand to pursue economic and social advancement in the present moment whilst addressing issues of intergenerational equity—not constraining the options of those in the future to pursue perhaps an altogether different trajectory. The term garnered salience with acceptance of the Brundtland report by the General Assembly of the United Nations and became institutionalized in a set of core principles established at the United Nations Conference on Environment and Development in Rio de Janeiro, Brazil in 1992.

Other simplified definitions of “sustainability” have gained traction in the business and policy world, particularly those depicting sustainability in terms of a “triple-bottom-line”—bundling together financial, social and environmental dimensions. Popular variations include the “three-legged stool” of people, planet, and profit—with various alternatives substituted for the word “profit,” including performance and prosperity. Both of these last two notions of sustainability are central to the broad approach of Corporate Social Responsibility (CSR), which is a form of voluntary firm self-regulation around social and environmental issues, broadly defined. One of the

most recent forms of addressing the connected issues of environmental resource protection and development at the international level are the UN's Sustainable Development Goals. Adopted on September 25, 2015, these 17 goals, each with its own targets, explicitly link the concept of sustainability with poverty alleviation—"a set of goals to end poverty, protect the planet, and ensure prosperity for all as part of a new sustainable development agenda."<sup>7</sup> In this dissertation, I use the term "sustainability" generally to refer to efforts towards improved environmental and social conditions in the governance of natural resources and the environment and additionally adopt more specific terms, like agro-ecology, to refer to particular approaches and methods for enhancing socio-ecological systems.

### **3.1.4 Governance**

I employ the term "governance" to refer broadly to the rule-making process, from institutional design to implementation, public education of new norms and techniques of compliance, monitoring, and enforcement—roles at times construed within the exclusive realm of governments alone but which often involve an array of public and private, state and non-state actors.

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<sup>7</sup> See <http://www.un.org/sustainabledevelopment/sustainable-development-goals/>.

### 3.1.5 Smallholder

I employ the term “smallholder” interchangeably with other terms to refer to small farmers of various stripes—“subsistence farmers,” “smallholder producers,” “peasants,” and “*campesinos*.” The Food and Agricultural Organization (FAO) of the United Nations defines smallholders as “...small-scale farmers, pastoralists, forest keepers, fishers who manage areas varying from less than one hectare to 10 hectares. Numbering near 500 million people globally, smallholders are characterized by family-focused motives such as favouring the stability of the farm household system, using mainly family labour for production and using part of the produce for family consumption.”<sup>8</sup>

### 3.1.6 Commodity

I employ the term commodity in a more generalized fashion than conventional definitions linked to investment contexts, which typically circumscribe commodities as those raw materials and primary agricultural products that can be bought and sold (with prices tied to futures markets). I use the term more generally to refer to goods or products that are interchangeable (or possibly so) with other like products, as through

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<sup>8</sup> Food and Agricultural Organization (FAO). 2012. “Smallholders and family farmers.” Accessed on February 14, 2016. [http://www.fao.org/fileadmin/templates/nr/sustainability\\_pathways/docs/Factsheet\\_SMALLHOLDERS.pdf](http://www.fao.org/fileadmin/templates/nr/sustainability_pathways/docs/Factsheet_SMALLHOLDERS.pdf).



global markets. My use of the term is consistent with that of Gereffi's (1994) work on global commodity chains—which refers to goods like automobiles, apparel and toys as commodities though they are not currently exchanged in commodities markets per se. In this respect, my use of the term highlights the quality of goods that make them potentially interchangeable in global markets (even if no futures market currently exists).

### **3.1.7 Shadow vs Focal Commodities**

Finally, I wanted to highlight two terms associated with concepts original to this dissertation, namely my distinction between shadow and focal commodities. I employ the term “shadow commodity” to delineate a subset of traded goods that are produced in the periphery of formal markets—largely unregulated and unregistered by governments. In contrast, I define focal commodities to be those that are not only identified and calculated as part of a country's GDP, but relatedly, ones that are prioritized by political and economic actors because of their significant economic contributions to GDP. As such, focal commodities are often central to global trade negotiations, as they may represent the source of a country's comparative advantage, whereas shadow commodities are not. In chapter 3, I flush out my theory of shadow versus focal commodities—and how their interactions and interdependencies in

ecosystems, markets, and regulation generate new possibilities for producers to pursue change and innovation.

### **3.2 The Supply and Demand of Transnational Governance**

One of the core preoccupations of debates surrounding processes of globalization has been the management of externalities borne out of transnational production.

Scholars continue to deliberate over the extent to which the liberalization of international trade has exacerbated social and environmental damages or alternatively improved conditions in the jurisdictions of relocated international firms. Proponents concerned about the emergence of a regulatory “race to the bottom” have long argued that relocating firms create pollution havens in new jurisdictions with weaker regulations.<sup>9</sup> Others contend that under certain conditions globalization can lead to a “ratcheting up” of standards – a race to the middle or even the top.<sup>10</sup>

Such concerns about the externalities of global trade include not only considerations of the magnitude and distribution of social costs firms impose on society and the environment as a result of their activities, but also critical questions regarding who decides how, where, when, and by whom these externalities will be defined and

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<sup>9</sup> Brunnermeier and Levinson 2004; Beghin and Potier 1997; Daly 1993; Bhagwati 1993.

<sup>10</sup> DeSombre 2006; Vogel and Kagan 2004; Garcia-Johnson 2000; Vogel 1995.

managed (if at all).<sup>11</sup> While issuing laws and monitoring compliance was once a concern primarily of states—with farms and factories located within their sovereign jurisdictions—the globalization of trade and the elongation of supply chains have propelled shifts in regulation upending traditional, state-centric notions of how regulation works.

In particular, global trade has made it ever more difficult for state authorities alone to minimize “harm” as goods cross multiple physical and political jurisdictional boundaries en route from producer to consumer via increasingly complex webs of supply chain and regulatory intermediaries. At the same time, private, non-state actors have emerged as substitutes or complements to public authorities in overseeing these increasingly complex transnational commodity trades. The emergence of new efforts toward “transnational” governance has compelled scholars to reexamine the interactions among state and non-state actors engaged in the design, implementation, and enforcement of institutions to govern the environment and natural resources from global to local scales, raising a core set of questions central to this dissertation, namely: How do transnational rule-makers—both public and private authorities—demand compliance from targets outside of their jurisdictions? How and under what conditions do the

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<sup>11</sup> Abbot and Snidal 2009; Mattli and Woods 2009; Coase 1960.

targets of rules respond—especially small firms and producers from developing and emerging economies?

### **3.3 The Demand for Transnational Governance Solutions**

As global trade has ramped up since the fall of the Soviet Union, a growing number of social scientists have taken up these questions. Bütthe's (2010, 9) analytical framework offers a useful point of departure for this analysis. Bütthe distinguishes three main subsets of stakeholders in private regulation—rule-makers (suppliers), rule-demanders, and targets of rules. For him, the supply and demand of transnational regulation conceived broadly includes both public and private actors. As Levi-Faur and Starobin (2014) point out, we also need to incorporate “regulatory intermediaries,” like private third party certifiers and their contracted agents and auditors, as amongst those also supplying regulation, along with firms, NGOs, and governments.

Advancing human society towards a more “sustainable” planet remains a herculean task, especially in the face of ever more pressing shared global environmental problems, like climate change. Yet who exactly is advancing whom towards such “sustainability” often remains an unaddressed question—a subtext of global dialogues amongst powerful state and non-state actors. For example, at formal treaty negotiations, civil society lacks an official seat at the negotiation table—relegated to “side-events,”

where omitted voices have some chance of reverberating and play a role in shaping the agenda and views of parties to the negotiation. Recent international negotiations towards improved planetary governance have also emphasized a more critical role for emerging market countries and their rights to continued development whilst pursuing a “sustainable” agenda, as evidenced by the UN’s 2015 Sustainable Development Goals.

Within this broader context is also cultivating effective governance for commodities traded between and amongst actors in these countries at various scales. Here, my focus on the demand for transnational governance solutions pertains largely to value chains for agricultural commodities and natural resources sourced from developing and emerging markets—and even more specifically to what I call “shadow commodities” (as compared to focal ones) which remain largely outside explicit consideration of formal bilateral or multilateral negotiations.

The increasing demand for such transnational governance solutions has come from an array of stakeholders around the globe, including consumers in the global North, governments, NGOs, global firms and a subset of producers in the global South, as well. Consumers in the global North seek information and assurances of compliance with increasingly stringent environmental, social and ethical criteria.<sup>12</sup> National

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<sup>12</sup> Bartley et al (2015) identify consumers as part of their model among those key stakeholders demanding governance, though more indirectly and peripheral to other forces driving demand for transnational regulation.

governments respond to demands for increasing homogeneity of standards across jurisdictions. NGOs—operating both transnationally and domestically—have both called for and participated in transnational efforts to improve the efficacy of governance around issue areas left unaddressed by weak states, including labor and human rights abuses and environmental degradation. Global firms have been engaged both as the targets and initiators of transnational efforts to improve standards in jurisdictions where they operate.<sup>13</sup>

### ***3.4 Governance suppliers?***

All of these stakeholders are, for one reason or another, demanding some kind of governance for policy problems that cross jurisdictions in great need of redress. Where does (should?) such governance come from? Here I consider what the literature has to say about potential governance suppliers in turn: international institutions and states, local actors and institutions, private authorities, including transnational businesses and NGOs.

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<sup>13</sup> Starobin 2013; Garcia-Johnson 2000.

### 3.4.1 Weak States: Unwilling or Incapable of Effective Regulation

At its core, part of the demand for transnational solutions—ones that involve interactions between state and non-state actors (or non-state actors altogether outside of the state)—stems from the perceived or actual failure of weak states to provide requisite public goods—either because they are unwilling or incapable of providing key institutions, like assuring credible oversight.<sup>14</sup> In the so called “retreat of the state” as characterized by Susan Strange (1996), states have relinquished their role in providing certain public goods, thereby creating an opening for other actors, including private businesses and NGOs, to step in and provide private governance either as substitutes or complements to that provided by public authorities.<sup>15</sup> In the context of developing countries, Migdal (1988, xiii) takes up the main issue of “state capabilities or their lack: the ability of state leaders to use the agencies of the state to get people in the society to do what they want them to do,” with a view of the state that “...corresponds to Max Weber’s notion of the state as institutional—an organization—enforcing regulations, at

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<sup>14</sup> Migdal 1988.

<sup>15</sup> Green 2013; Cutler et al 1999; Strange 1996. Green (2013) argues in *Rethinking Private Authority* that private governance is not a substitute for public. I adopt the view that temporally, voluntary private governance may be needed as a substitute for public governance, around issue areas as of yet unregulated by states. Policy entrepreneurs initiated educational campaigns raising awareness and demand for seatbelts in cars—which car manufacturers began including as an added feature, which then became accepted as part of the standard safety array—eventually mandated by governments to be included (with heterogeneity of state laws requiring passengers actually use them).

least in part through a monopoly of violence." Many accounts of the regulatory state in emerging markets and the related rise of private regulation often neglect what is certainly true in rural areas where peasant revolutions historically occurred — that the “State” supposed to be providing public goods, like public health and education, and regulatory oversight (agricultural extension services, safety inspections) may also be the same one that historically initiated state-sanctioned violence against the peasantry and indigenous populations a matter of years or decades ago.<sup>16</sup>

Beyond an ability or desire to govern, states may also lack institutions to address problems as of yet defined or perceived as problems in need of redress. This can be true of developed and developing countries alike. For example, until a widespread educational campaign, propelled by American public interest advocate Ralph Nader, the lack of restraint systems for passengers and drivers had not been identified as an important policy problem in need of public attention and government leadership.<sup>17</sup> Few today could imagine riding in cars without seatbelts — which car manufacturers now include in every new vehicle as a core not added feature; furthermore, many states have laws requiring seatbelts at a minimum for front seat occupants (34 states). Similarly, few in the United States can imagine a workweek that did not include a weekend — thanks to

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<sup>16</sup> The linkage between the state with a monopoly of coercive force, as compared to the administrative state, is one also being examined by Levi, Weingast and Cuéllar (unpublished).

<sup>17</sup> Noah 1994.



effective organizing by labor unions and subsequent achievements made through the legislative process.<sup>18</sup>

Yet, what has come to be the norm in developed and industrialized countries in the global North—in terms of environmental, labor or safety standards—may be entirely unknown or understood differently in the global South. It may be the case that weak states under-provide certain public goods as a result of corruption, rent-seeking, or explicit malevolence intended to subvert and coerce its citizenry. At the same time, in the context of regulatory issues, the administrative state may itself be underdeveloped and lacking in capacity, technical or scientific expertise, and resources to identify emerging problems, adapt, and innovate solutions to them. Where market failures arise, as when they fail to be competitive due to problems of asymmetric information, for example<sup>19</sup>—arguably justifying government intervention—the failures may not be identified, and/or there may be no government agency or entities to intervene. This creates a window of opportunity for policy entrepreneurs to identify problems and devise solutions to address them, including challenging status quo policies, proposing

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<sup>18</sup> Bennett and Taylor 2001.

<sup>19</sup> Market failures arise when markets, at least the ideal type, fail to be competitive for one or more reasons, including asymmetric information, barriers to entry and exit, limited number of buyers and sellers.

new ones, or creating parallel institutions to government efforts (which may eventually be replaced by government solutions).<sup>20</sup>

### **3.4.2 Local Actors and Institutions**

One limitation of the literature on domestic, subnational and local level actors—as exemplified by Ostrom’s work on institutions governing common pool resources—is that it often focuses on cases involving local actors almost exclusively—where there is little to no interaction among actors across scales. Ostrom (1990) challenged conventional wisdom by advancing the notion that local actors might in fact be capable of devising their own institutions for managing natural resources shared commonly among them—and do not necessarily require an intervening outside actor like the state to insert itself in order to create order out of chaos—to devise and implement institutions for “governing” the commons.<sup>21</sup> However, Ostrom and other work from the commons literature does not readily extend out to cases beyond the commons, per se—where there might in fact be complex interactions among actors operating in highly local

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<sup>20</sup> Kingdon 1984.

<sup>21</sup> Ostrom (1990) inventories a series of success and failure cases of governance within CPRs and identifies eight key institutional design criteria requisite for communities to effectively govern without an intervening external actor.

environments with ones operating at national or even international scales.<sup>22</sup> Yet global supply chains often interconnect highly localized phenomena, cultures and individuals involved in production of goods and modes of exchange with actors that may be entirely outside of their physical or political jurisdiction.<sup>23</sup>

### **3.4.3 The Rise of Private Authorities and Transnational Actors in Governance**

While a growing regulation and governance literature has tackled core issues related to the rise of private authorities as substitutes or complements to public ones in rectifying transboundary social and environmental problems,<sup>24</sup> important questions remain relatively unexamined by scholars. Namely, there is a “lamp-post problem” in the scholarship on transnational regulation and governance. The literature sheds light on institutional innovation amongst actors in the global North—in part, because that is where attention has long been placed—leaving other possible examples or instances of institutional innovation to remain in the shadows. For example, a multitude of articles

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<sup>22</sup> This is the instance with the cases taken up here, such as with honey where *ejiditarios* in Mexico interact outside their common pool resource regime with other market and commodity chain politics.

<sup>23</sup> Richman (2006) highlights how community institutions amongst Jewish diamond merchants in New York create economic advantage within the global diamond trade, enabling the enforceability of social contracts via reputational mechanisms and sanctioning, even across great distances whilst in possession of valuable cargo. For a related account of how these mechanisms work in Kosher food regulation, Starobin and Weinthal (2010) and Lytton (2013). On enforcement of informal, de facto institutions and norms in trade more broadly, see Greif (2006).

<sup>24</sup> Green 2013; Buthe and Mattli 2011; Abbot and Snidal 2009; Cutler, Haufler, and Porter 1999; Strange 1996.

have been written about cases involving the Forest Stewardship Council, the Marine Stewardship Council and ISO 14001.<sup>25</sup>

Yet in praising transnational solutions, we've often looked away from some of their inherent problems. Most salient are instances of transnational governance failure which call into question its ultimate effectiveness in redressing the problems it purports to solve in meaningful ways. Such shortcomings emerge most powerfully through tragic focusing events like the factory fire in Karachi, Pakistan and the collapse of Rana Plaza in Bangladesh (near identical incidents to the factory fires that plagued U.S. garment manufactures a century earlier, and which led to the advent of stringent labor, building and fire safety codes to prevent future incidents).<sup>26</sup> In the case of the factory fire in Karachi, which killed more than 300 people, culpable actors included not only local firms but also the auditing intermediaries working on behalf of a transnational third party certification scheme that certified the Pakistani factory as safe just days before it burned down.<sup>27</sup>

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<sup>25</sup> Bartley 2003; Cashore et al 2004. Cashore argues that FSC is also inclusive of stakeholders in the global South via various aspects of its institutional design and processes. While I acknowledge the inclusion of the global South, I still argue that their participation is still largely structured by and consistent with norms guided by actors from the global North, rather than the inclusion of stakeholders from the global South on their own terms. On ISO 14001, see Prakash & Potoski 2006; on Fair trade, see Bacon et al 2008; Gonzalez and Nigh 2005; Benoitte and Ponte 2005.

<sup>26</sup> Stein 2010.

<sup>27</sup> Levi-faur and Starobin 2014.

### **3.5 Third party Certification as Transnational Governance Mechanism and Its Limitations**

One of the primary institutional forms that transnational governance takes to remedy the under-provision of supply chain oversight, among other public goods, is third party certification. In this section, I will problematize transnational governance and third party certification as institutions which necessarily solve the “supply” problem with regards to governance in the global South—especially as related to the participation and inclusion of small-scale producers and other marginalized stakeholders.

Opportunities to pursue independent, third-party certification<sup>28</sup> are increasingly demanded by producers from developing and emerging economies in the global South—attracted by proclaimed benefits of enhanced market access and premiums for certified products.<sup>29</sup> Labeling and certification represent key policy efforts in the governance of global production systems to address the problem of relaying credible information along lengthy and complex commodity chains.<sup>30</sup> Eco-labels—the label appearing on end-user products indicating certification—represent one among several

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<sup>28</sup> Gereffi et al 2001.

<sup>29</sup> According to Gereffi et al (2001), third party certification “...involves an external group, often an NGO, imposing its rules and compliance methods onto a particular firm or industry.” A form of voluntary private regulation, independent third party certification allows producers to verify that certain quality, safety, environmental or labor standards were upheld during production.

<sup>30</sup> Starobin and Weinthal 2010; See also Starobin 2012.

types of flexible environmental policy instruments, along with environmental taxes and voluntary agreements.<sup>31</sup> Unlike traditional forms of regulation, often referred to as “command and control,” eco-labels are generally non-binding and rely on the voluntary participation of individual producers and firms to operate.<sup>32</sup> Eco-labels and third party-certification can also be understood as among a broader set of policy instruments within the realm of non-state market-driven (NSMD) governance<sup>33</sup> and information-based governance.

A form of voluntary private regulation, third party certification allows producers to verify that they upheld certain quality, safety, environmental or labor standards during production processes—information often valuable to end consumers seeking to align their values with their actions.<sup>34</sup> As noted by Barham (2002), values often expressed through values-based labeling initiatives tend to be non-market in nature; “...they cannot be monetized or quantified precisely without doing violence to their essential character....They include such values as social justice and equality; norms of moral obligation to others (human and nonhuman, living and unborn); and the desire to defend and increase democratic participation in governance throughout the world.” Relying on “moral suasion,” eco-labels—and their creators—endeavor to convince end-

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<sup>31</sup> Jordan *et al* 2003b.

<sup>32</sup> Jordan *et al* 2003b.

<sup>33</sup> Cashore *et al* 2004.

<sup>34</sup> Barham 2002, 352. See also Jordan *et al* 2003a, 11.

consumers that a given product is consistent with his or her values. The ultimate intention is that consumers will be swayed in their purchase by the claims made on such labels—information regarding unobservable characteristics of the goods in question. Such certification, moreover, poses a remedy to the persistent credibility problems faced by producers in transnational production systems—otherwise reliant on self-declarations about unobservable and un-testable attributes of their products.<sup>35</sup> The logic follows that if a given scheme—like Organic or Fair Trade—is known about and available for participation by rural producers, these producers will seek to opt-in.

Given the persuasive role that certification and labeling appear to play in business to business transactions and end-consumer purchasing decisions, third party certification has become an attractive device for securing market access for producers in global production systems facing persistent credibility problems. Without independent third-party certification, producers are presumably left reliant solely on their own self-declarations about unobservable and un-testable attributes of their products. Moreover, producer self-declarations inherently lack credibility, given their conflict of interest and the information asymmetries between producers and consumers.<sup>36</sup>

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<sup>35</sup> Starobin and Weinthal 2012, Barham 2002, Jordan et al 2003a, Caswell and Mojduszka 1996, Darby and Karni 1973.

<sup>36</sup> See Starobin and Weinthal (2010) and Gourevitch et al (2012).

In principle, third-party certification offers producers an opportunity to voluntarily subject themselves to outside oversight as a means to verify information they seek to convey to other businesses and potential consumers – about the quality or nature of their business, product or production process. Producers may seek certification to add “positive labels” to their products – to indicate the presence of an attribute deemed attractive to end-consumers.<sup>37</sup> For example, the Fair Trade Certified label assures customers that certified agricultural products were produced and traded according to a core set of stringent economic, social and environmental principles, including: a fair price, fair labor conditions, direct trade, democratic and transparent organizations, community development, and environmental sustainability. Alternatively, producers may desire marking products with “negative labels” – to highlight the absence of an undesirable attribute and to further segregate production and processing. Land O’Lakes created a new niche market by creating a negative label on its products – providing information indicating these goods were free from recombinant bovine growth hormone (rBGH) and additionally noting that the scientific research showed no significant difference in impacts to cows or humans.<sup>38</sup> Similarly, the “non-GMO verified” label

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<sup>37</sup> Runge and Jackson 2000.

<sup>38</sup> Runge and Jackson 2000.



attests to the verified absence of genetically modified organisms in raw or processed food products (including those for which no genetically modified version yet exists).<sup>39</sup>

Yet closer inspection suggests that certification schemes may not offer producers the portal to markets and high premiums they so desire,<sup>40</sup> and that certification often privileges the interests of its primary architects and beneficiaries—retailers, organizations and consumers in the global North—over its targets—producers in the global South.<sup>41</sup> Analyses of schemes like Fair Trade and Organic—often perceived to improve producer access to markets, information and enhanced economic benefits—reveal mixed results.<sup>42</sup> In their examination of smallholder participation and certification of organic products in Mexico, Gonzalez and Nigh (2005) note the tendency for certification standards applied to smallholder production to be oriented toward the interests of first-world consumers, imposed in a top-down fashion, and implemented with little or no participation from farmers.

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<sup>39</sup> On the non-GMO project, see <http://www.nongmoproject.org/product-verification/>, accessed August 7, 2016.

<sup>40</sup> Gonzalez and Nigh 2005.

<sup>41</sup> See Fuchs et al (2009) and Fuchs and Kalfagianni (2010) for further discussions of retailers and private regulation in the global food system.

<sup>42</sup> See Bray et al 2002; Gonzalez and Nigh 2005; Bacon 2005; Bacon et al 2008.

### **3.6 The Dilemma of “Costly” Credibility**

The credibility of third party certification rests on its purported independence, given that it relies on an outside and independent party for monitoring and verification.<sup>43</sup> Gereffi *et al* (2001) describe a hierarchy of certifications, implicitly moving from least to most credible, based on the independence of the certification standards and those certifying compliance. Whereas first party and second party certification involve organizations verifying their own compliance with standards, third party certification involves an outside, independent party (such as a private firm or NGO) for monitoring and verification, though typically this third party is still paid for by the entity seeking certification.<sup>44</sup> This payment arrangement presents potential conflicts of interests as well as incentives for capture of the regulator by the regulated. Given the potential for conflicts of interest and the lack of independent, external verification, the credibility of eco-labels involving first and second party certification remains in question.

Regarding fourth party certification, the literature largely underspecifies what exactly fourth party certification is. Scholars and practitioners often include fourth party certification in their descriptive lists of the various types or hierarchies of certification, in

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<sup>43</sup> Gereffi *et al* 2001; Starobin and Weinthal 2010. See also Gourevitch *et al* 2012. Bazerman *et al* (1997) also problematizes the purported independence of third-party audits, focusing on why “good accountants” do such bad audits. According to Bazerman *et al*, “Under current institutional arrangements, it is psychologically impossible for auditors to maintain their objectivity.... Many challenges arise because auditors are hired, paid, and even fired by the organizations that they audit rather than by the people they ostensibly represent.”

<sup>44</sup> Gereffi *et al* 2001.

keeping with the norms established by early scholars in the field.<sup>45</sup> Yet most merely reiterate the list originally articulated by Gereffi *et al* (2001) and emphasize that third party certification remains industry best practice, without further consideration of other modalities of certification and their prevalence. In their explanations regarding aquaculture certification, for example, the Food and Agriculture Organization of the United Nations (FAO), explains the process of certification as a series of classifications “depending largely on the relationship between the entity being certified and the certification body.”<sup>46</sup> The FAO exhibits some uncertainty regarding fourth party certification, noting that while the International Standards Organization (ISO) does not mention it in its documents, some organizations do. Lifting their definition of fourth party certification virtually unchanged from Gereffi *et al* 2001, FAO states that fourth party certification “...involves governmental or multinational agencies. The UN Global Compact, for instance, lists environmental, labour and human rights principles for companies to follow. Corporations submit online updates for others (e.g. NGOs) to scrutinize.”<sup>47</sup>

The FAO notes that fourth party certification is not widespread, and that “because of the alleged lack of conflicts of interest between certified parties and the

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<sup>45</sup> See Gereffi *et al* 2001.

<sup>46</sup> See <http://www.fao.org/docrep/010/ai388e/AI388E03.htm>

<sup>47</sup> See <http://www.fao.org/docrep/010/ai388e/AI388E03.htm>.

certification body, third party certification is generally perceived as the highest form of assurance of compliance to a specific set of standards.” Because of this presumed lack of conflict of interest between the regulator and the regulated, in this case, “third party certification is indeed the form of certification most often sought.”<sup>48</sup> Fourth party certification, thus, seems to remain an ideal type as well as a current anomaly among certifications, as it involves independent external agents whose oversight is not paid for by those seeking certification.<sup>49</sup> Gonzalez and Nigh (2005) include as examples of fourth-party certification “the case of a multi-lateral agency or an association of third-party organizations that creates rules and agree on a verification method, e.g., ISO or the International Federation of Organic.”<sup>50</sup> I contend that fourth party certification can actually have several variants—including but not limited to those articulated above. Two key characteristics appear to be shared by all fourth party certification schemes. First, the targets of certification typically do not pay to be certified. Second, external stakeholders are involved in some manner as participants in oversight (i.e., non-governmental watchdog organizations, NGO networks, citizens or other stakeholders). What constitutes involvement or participation by external stakeholders, however, varies among certifications of this type. Participation could additionally include the direct

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<sup>48</sup> <http://www.fao.org/docrep/010/ai388e/AI388E03.htm>

<sup>49</sup> Gereffi *et al* 2001.

<sup>50</sup> Gonzalez and Nigh 2005, 450.

involvement of citizens, consumers, and even other producers in the verification and monitoring process.

**Table 2: Certification Credibility Hierarchy**

<b>Type of Certification</b>	<b>Who Sets Standards?</b>	<b>Who Verifies Compliance with Standards?</b>	<b>Who Pays?</b>	<b>Example?</b>
First Party	Single firm develops own rules	Firm “self-regulates”—verifies, monitors and reports on own compliance	Firm	Johnson and Johnson publishes own Social Contributions Report (1992)
Second Party	Business or trade association	Firm or a separate unit within the firm	Firm	Chemical industry’s global Responsible Care® program
Third Party	NGO, trade association, or government	“Independent” auditors. Linked to the standard setter or separate organizations	Firm	Social Accountability 8000 Standard (SA8000)
Fourth Party	Government or multilateral agencies	Outside NGOs or governments scrutinize information disclosed by firms.	Party other than firm	UN Global Compact environmental, labor and HR principles for companies to follow.

Sources: Gereffi et al (2001); Starobin and Weinthal (2010).

Thus, despite its limitations, third-party certification has held its ground as current industry best practice. Fourth party, participatory certification—which will be elaborated further in the case of fresh produce in Nicaragua—is an emerging alternative to the industry standards—involves independent external agents as well, though their oversight is not paid for by those seeking certification.

Like other forms of oversight and compliance, third party certification tends to be a costly endeavor for both public and private food regulators.<sup>51</sup> Implementing a comprehensive monitoring system over a vast supply chain replete with complex ingredients or component parts from a multitude of countries inevitably entails costs. Some scholars argue that costs may be at the root of the compliance problem—given that oversight is costly, while many seek to enjoy its benefits, few want to pay for the associated costs.<sup>52</sup> Vogel (2005) argues that the high compliance costs associated with certification and other forms of voluntary regulation necessitate that some of these costs will be transferred to other stakeholders beyond producers or the corporations distributing final products to end consumers. Given the costs associated with oversight, it seems logical that certification would be expensive for producers to pursue.

Some scholars argue that the costliness of third party certification is a requisite ingredient for its credibility.<sup>53</sup> In part, the costliness of third party schemes derives from their “independence” and the need to accredit other third parties to verify compliance with their set of standards. According to this logic, high cost reinforces the information signal of reputational credibility sought by firms and consumers alike.<sup>54</sup> Yet, costliness also represents a fundamental barrier to entry. A profound credibility dilemma, thus,

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<sup>51</sup> See Vogel 2005; Prakash and Potoski 2006.

<sup>52</sup> Vogel 2005.

<sup>53</sup> Prakash and Potoski 2006.

<sup>54</sup> Price is linked to perceptions of quality as much as it may be linked to actual quality.

confronts a subset of producers and firms that are pursuing a given set of "values-based" standards but must determine the business case for pursuing certification to signal this to the market (either other businesses or end consumers).

**Table 3: Dilemma of Costly Credibility**

<i>Certification Status Compliance with Standards</i>	<i>Certified</i>	<i>Uncertified</i>
Compliant	<p><b>TYPE 1: Certified Credible</b></p> <p>Comply with standards. Information signal to market. Pay price premium to attain certification.</p>	<p><b>TYPE 3: Uncertified Credible</b></p> <p>Comply (or willing to comply) with standards (by intent or by default). No information signal to market. Either business is unable or unwilling to pay for certification. Lack of "business case" for additional certification. Other businesses in the market (B2B) and consumers will not know about producer's actual credibility.</p>
Not Compliant	<p><b>TYPE 2: Certified Non-credible</b></p> <p>Do not comply with standards. Information signal to market. Pay price to be labeled and receive reputational brand benefits. Source of increasing confusion/label proliferation.</p>	<p><b>TYPE 4 Uncertified Non-credible</b></p> <p>Do not comply with standards. No information signal to market. Firm is unwilling, unable, or uninterested in investing resources to comply with standards or pursue certification.</p>

Table 3 illustrates a typology of this credibility dilemma. Type 1 firms are, in principle, "Certified Credible." Included among Certified Credible firms are those typically certified by leading third party certification schemes, like the Forest

Stewardship Council, Rainforest Alliance, and Fair Trade. These firms comply with the standards required for them to achieve third party certification, and, moreover, pay a price premium to receive certification and associated labeling. The certified labels provide firms with a signal about their reputation to the marketplace of other firms and end consumers (depending on the sector and product). The credibility dilemma does not generally concern these firms that, for whatever reason, have already decided to pursue certification (and have achieved it). Type 1 corresponds to Prakash and Potoski's (2006, 63) most credible category—Mandarins—in many respects; high barriers to entry (including stringent standards and enforcement rules) entice high performers rather than laggards. Prakash and Potoski, however, focus their credibility typology on the design of voluntary green clubs and exclude, therefore, firms which are not pursuing some form of certification.

Type 2 firms are “Certified Non-Credible.” These firms have received certification in some form—either first, second or third party. Either they paid a price premium to receive the reputational brand benefits associated with having an eco-label, or they manufactured their own label. In either case, these firms send a signal to the market about their product or process via their labeling, yet fail to comply with proclaimed standards. Type 2 firms are a source of increasing label proliferation and confusion in the marketplace; their false claims are often intended to deceive consumers



while capturing a premium market segment. This category would include Prakash and Potoski's (2006, 63) Type 2 and Type 4 certified firms which lack credibility—Country Clubs and Greenwashes.

Of central concern to this dissertation, Type 3 producers are “Uncertified Credible.” These producers comply with a given set of standards; either their additional efforts and actions merit certification or they happen to reside in a jurisdiction where the local conditions, default practices or compliance with existing regulations automatically qualify them as “in compliance” with the substance of another set of public or private standards. For example, given the absence of industrial agriculture in Cuba—since it's disconnect from global trade with industrialized countries like the United State—uncertified producers of fruits, vegetables and other agricultural products in Cuba largely comply with established standards for certified organic products (even if they are technically uncertified or have done nothing beyond residing in Cuba and cultivating crops consistent with traditional methods that inherently lack agro-chemical inputs like fertilizer, pesticides, or potentially genetically modified seeds). At the same time, such producers remain uncertified, and lack the requisite information signal—beyond perhaps Country of Origin labeling—to highlight their credibility to the marketplace. These producers lack the “business case” for certification; either the producer or business is unable or unwilling to pay for certification. As a result, other

businesses in the market (B2B) and consumers will not know about producer's actual credibility.<sup>55</sup> The prevalence and possible magnitude of this problem in the context of producers from emerging economies is further acknowledged by the Food and Agriculture Organization of the United Nations (FAO). On a website intended to provide information to producers from developing countries considering the switch from "conventional" to organic modes of production, FAO acknowledges the phenomenon of "non-certified organic food" and uncertified producers whose farm products may in fact conform to organic standards:

In many developing countries, there are agricultural systems that fully meet the requirements of organic agriculture but which are not certified. Non-certified organic agriculture refers to organic agricultural practices by intent and not by default; this excludes non-sustainable systems which do not use synthetic inputs but which degrade soils due to lack of soil building practices. It is difficult to quantify the extent of these agricultural systems as they exist outside the certification and formal market systems. The produce of these systems is usually consumed by households or sold locally (e.g. urban and village markets) at the same price as their conventional counterparts. Although the uncertified produce does not benefit from price premiums, some cases have been documented where non-certified organic agriculture increases productivity of the total farm agro-ecosystem, and saves on purchasing external inputs. In developed countries, non-certified organic food is often sold directly to consumers through local community support programmes such as box schemes, farmers markets and at the farm gate. These allow the producer to know exactly what the consumer wants, while the consumer knows where the produce comes from and in the case of box schemes, saves on transport costs through delivery of produce to their homes. In developed countries, non-certified organic produce usually carries a

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<sup>55</sup> See <http://www.fao.org/organicag/oa-faq/oa-faq5/en/>.

higher price than its conventional counterpart, in accordance with the specific consumer willingness to pay.<sup>56</sup>

In contrast to my typology, FAO separates out and elevates those producers who comply “by intent” and not “by default.” While I concur that it may be important to delineate the underlying motivations behind the decisions producers make to conform to particular agricultural practices, for the purpose of my analysis, I see it as important to be as inclusive as possible of producers that create commodities that qualify as compliant with a given set of standards—by virtue of their location or conditions if not also their intent.

Type 4 firms are “Uncertified, Non-credible.” These producers do not comply with standards nor do they send an information signal to the marketplace. These firms are problematic to the extent that credible producers complying with a given set of standards (Type 3) have difficulty distinguishing themselves from Type 4 firms.

### ***3.7 The Problem of Uncertified Credible Producers***

Those that either lack access to it or explicitly opt out of pursuing third party certification, despite their compliance with the standards, are credible in their actions yet

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<sup>56</sup> Inter-departmental Working Group on Organic Agriculture, Food and Agricultural Organization of the United Nations (FAO), “Organic Agriculture: FAQ”: <http://www.fao.org/organicag/oa-faq/oa-faq5/en/>.

uncertified. I will elaborate here on two subtypes of these “Uncertified Credible” firms (Type 3), theoretically considering the choice to pursue some form of third-party certification or not. The first, which will not be of primary focus in this dissertation, has the resources, in principle, to pursue certification if it should choose to do so (i.e., a large multi-national corporation). This firm may already have other means to access markets. Hence, certification would serve as an additional credibility device, but not necessarily a primary driver of core business sales. Thus, the addition of the eco-label might lead to non-trivial costs to the firm without tangible additional benefits.

The second subtype consists of small firms—especially resource constrained smallholder producers—which experience third party certification and other costly credibility devices as a high barrier to market entry and, thus, face a paradoxical situation when confronted with the choice of whether or not to pursue certification. Opportunities for pursuing third party certification might be abundant or at least present in a given region, yet these firms opt out of these purported opportunities for potential market access via certification and additional positive reputational branding (See Table 4 on Compliance vs. Credibility Costs). In some cases, as will be seen with honey for producers in Mexico, increasing demands from the global marketplace for additional certification—such as testing and certification to demonstrate the absence of contaminants, like pesticides, heavy metals or even genetically modified organisms—

can pose situations where “uncertified yet credible producers” that already have some access to market (because their jurisdiction, by default, merits regulatory compliance) can find themselves suddenly “downgraded” because they cannot pursue these further certifications.

**Table 4: Compliance vs. Credibility Costs**

	<b>Compliance Costs</b>	<b>Credibility Costs</b>
<b>DISTINCTION</b>	<i>Costs associated with undertaking behavioral changes required to comply with standards</i>	<i>Costs associated with demonstrating credible compliance to outside stakeholders</i>
Example 1	Reforestation hillsides to prevent soil erosion and improve local water quality	Documenting practices undertaken in manner requested by outside auditors (i.e., paperwork)
Example 2	Transitioning away from synthetic pesticides and fertilizers.	“Certification” costs— verification visits by outside auditors, use of trade-marked seals, marketing materials

At first glance, expensive “credibility” appears to be a concern primarily for small firms and resource-stretched producers. Yet, large multi-national corporations also sometimes question whether they can make the “business case” for pursuing certification by external third parties. Some firms have made steps to move beyond

compliance<sup>57</sup> and pursue environmentally progressive behavior without advertising or promoting these actions to their end-consumers.<sup>58</sup> While these firms may have assumed the costs associated with achieving compliance with a given set of standards, they remain either unable or unwilling to pay for the costs associated with conveying an information signal about this behavior to their end consumers (i.e., an eco-label that appears on their final product).

For example, on June 8, 2011, McDonald's pledged to make its Filet-O-Fish in Europe sustainable.<sup>59</sup> As of January 2012, 99% of McDonald's fish globally were sourced from Marine Stewardship Council (MSC) Certified Fisheries. Yet, in the United States, these "sustainable" Filet-O-Fish remained without labels on packaging to end consumers alerting them to this key information until January 2013. Apparently, the business case to pursue further certification for the end products—which would allow for eco-labels on packaging and promotional materials targeting end-consumers in the United States—had yet to be made. Whereas the European public tends to be more aware of environmental and public health issues—linked to more stringent regulations in the EU on food and agriculture—the American public has remained comparatively

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<sup>57</sup> Prakash and Potoski 2006.

<sup>58</sup> For a related point, see Howard-Grenville et al (2008) on the internal license to operate.

<sup>59</sup> Fletcher 2011.

less activist in their demand for higher environmental and health standards.<sup>60</sup> In the case of McDonald's in the US versus Europe, while it might make sense that McDonald's in the US share the sourcing strategy and priorities of McDonald's globally, it might not yet make sense for McDonald's USA to invest in promoting these supply chain successes to consumer audiences—especially if they will not drive sales in either direction (i.e., fewer sales for a less sustainable product versus more fish sales in the presence of this new information).

Hence, even multi-national corporations doing the right thing in certain issue areas might choose not to pursue certification for their efforts, especially if the business case (costs invested in marketing and labeling end products) will not be justified by additional sales. These firms have the resources to do "Both/ And." They can both invest resources in complying with a set of social or environmental standards (and the associated costs with learning and transformation and capacity building) and afford the costs associated with signaling about this behavior to their supply chain and end consumers if they chose to do so. In essence, these firms can afford to pay the costs associated with third party certification or other tools for marketing and validating their efforts.

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<sup>60</sup> Vogel 2012.

Yet, there are fundamental differences between the firm or producer that is unwilling to pay for the eco-label as compared to the one that is unable to pay. Unlike large MNCs that opt out of certification schemes, smaller producers (i.e., sole proprietors, small enterprises, or smallholder producers) often lack the financial resources to pursue third party certification or other costly mechanisms to signal reputational credibility to the market and end consumers. Facing resource constraints (time, capital, labor etc), these smaller firms must make trade-offs and contemplate whether to invest scarce resources in transforming their production processes to meet production standards and guidelines (i.e., at a most basic level, for product quality and safety above all else) or to invest these resources in promoting their efforts/ gaining access to market/ certification. In essence, these firms and producers have the resources to make a binary choice. They can either invest resources in complying with a set of social or environmental standards (and the associated costs) or pay the costs associated with signaling about this behavior.

For example, within the coffee sector, evidence has emerged revealing a disconnect between consumers' declared preferences for certified coffees—like Fair Trade or Bird Friendly<sup>61</sup>—and the actual demand for them.<sup>62</sup> In reality, there may be an

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<sup>61</sup> [http://nationalzoo.si.edu/SCBI/MigratoryBirds/Coffee/certification\\_agencies.cfm](http://nationalzoo.si.edu/SCBI/MigratoryBirds/Coffee/certification_agencies.cfm)

<sup>62</sup> Caffe Ibis Coffee, for example, is “triple certified”—USDA Organic, Fair Trade, and shade-grown Bird Friendly. See <https://caffeibis.com/certifications>.



excess supply of certification-worthy coffee available from producers that meet the requirements for certification as Bird Friendly than there are premiums available to compensate farmers for its elevated production costs.<sup>63</sup> Implicitly, coffee meeting these higher standards reaches store shelves along-side conventional coffee products without the certified label. Producers investing resources in meeting the higher environmental standards associated with certification—like maintaining forest cover as habitat for birds—may not be compensated for the production costs they incur nor the additional costs associated with certification. Without better market access as a result of certification, why pursue it?

In this chapter I began to lay the foundations of my argument. While there are multiple stakeholders demanding transnational governance solutions, I argued that those supplying it, namely transnational regulatory intermediaries, may not actually be resolving the “governance gaps” in weak states that under-provide key public goods, like commodity chain oversight—evident in the underlying persistence of problems, like market access and livelihood insecurity, confronted by rural agricultural producers in emerging markets of the global South. In identifying the problems of costly compliance versus credibility, I distinguished a subset of producers within global production systems—uncertified credible producers—who are often the rhetorical and actual

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<sup>63</sup> See Bray *et al* 2002 and Bacon *et al* 2008.

regulatory targets of transnational certification schemes, like Fair Trade. In principle, such producers are positioned to “upgrade” but may opt not to—because of the additional costs of participating in certification schemes, beyond those actually required to comply with the substance of standards. Taken together, this suggests that we need to look for other explanations for the observed outcome of regulatory change and innovation considered in this dissertation.

In the next chapter, I introduce the empirical case of honey in the Yucatán peninsula— endeavoring to reveal the village-level and socio-ecological dynamics underpinning what eventually became a successful campaign initiated by Mayan beekeepers and their allies to challenge the commercialization of GM-soy in the Yucatán. This case illuminates the role of commodity characteristics in shaping pathways for “uncertified yet credible” small-scale producers to pursue and/or forestall regulatory change.

## **4. From Milpa to Market: Subsistence Crops, Agricultural Commodities, and Alternative Livelihoods in Mexico**

### ***4.1 Traditional Livelihoods and Political-economic Autonomy: A Close Up***

Under the shade of the main *palapa* (palm shelter) the central gathering place for groups at the eco-tourist site in Diosbotek, a group of North American visitors—brought in connection with the international development organization AJWS—listened attentively as Sebastien, a representative from the Mexican NGO *El Hombre Sobre la Tierra* (HST), relayed his version of the village's origin and the modern struggles of Mayan peasants in Mexico. A modest structure, hand built by community members from wood harvested in the surrounding forests with sturdy beams for support and a roof of woven palm branches, the main *palapa* was an enlarged version of a common village house, likely not dissimilar to those once standing in the ancient Mayan metropolis of Chichén Itza, less than an hour's drive away. Sebastien's informal presentation was intended to help foreign visitors understand how historical events have shaped the socio-economic conditions and outlook of rural Mayan communities,

like Diosbotek, today.<sup>1</sup> His jubilant hand gestures and enthusiastic narration offered a counterpoint to the substance of his presentation; he boiled down in simple terms a long embattled relationship between indigenous Mayan communities in the Yucatán with the Mexican government and the industry that once produced the region's dominant export commodity, henequen.

According to Sebastien's rendering (and consistent with scholarly accounts of Mexican colonial history) huge properties once existed across Mexico—thousands of hectares owned by just a small number of *hacendados*—whose plantations grew cash crops, mainly henequen, for export overseas. Henequen, also known as sisal, was the “green gold” of the Yucatán, akin to Nicaragua's “black gold,” coffee. The primary export commodity from the Yucatán peninsula during a boom from the late 19<sup>th</sup> to early 20<sup>th</sup> century, henequen was a coveted fiber for making twine and important for military purposes. This woody plant dominated the economy of the Yucatán until competition from countries like Brazil and the subsequent availability of artificial substitutes like nylon propelled the industry towards collapse.

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<sup>1</sup> Field notes, Mexico, May 2012.

Then Emiliano Zapata<sup>2</sup> “made a revolution” from 1910 until 1920—fighting so that people in the countryside could have a piece of land to work for their own families, so that every village and family would have their own.<sup>3</sup> The servitude of the Mayan people to the Yucatán henequen industry up until the Mexican revolution has been well documented. One account suggests that Spanish colonists arriving in the Yucatán to manage large henequen haciendas merely assumed the indigenous people already living on and working the land to be part of the new plantations under their control.<sup>4</sup> *Ancianos* (village elders) from Diosbotek confirmed accounts of their *abuelos*’ (grandparents) slavery and survival—subsisting on food they cultivated following the methods learned from their own *abuelos* to provide for their daily needs.<sup>5</sup>

The movement of Mayan people after the earlier caste war and the Mexican revolution eventually landed families in Diosbotek and surrounding villages. In the 1930s, the Mexican government started to distribute land “municipality by municipality,

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<sup>2</sup> Emiliano Zapata was renowned as a revolutionary and champion of peasants and agrarian reform in Mexico—advancing the interests of indigenous people to regain rights to land given to *hacendados* that peasants had historically used. His followers in Mexico—then and now—are known as Zapatistas.

<sup>3</sup> Some scholars argue that the caste war was very much about liberation from taxation by a distant Mexican government—based in Mexico City—which would tax people to “lease land” back from the government at rates that subsistence farmers could not afford, thereby establishing a culture of coercion and debt contracts between Mayan indigenous people and the henequen industry in the Yucatán. See Alston et al (2008).

<sup>4</sup> Ibid.

<sup>5</sup> Author’s interview with Rubén Ek, Diosbotek, July 21, 2012.

family by family.” The government gave Diosbotek 7,005 hectares (23,505 acres). This land was shared as a commons—*tierra ejidital* (*ejido* land)—and “everyone” living in Diosbotek—grandfathers, sons, grandsons—had the right to a small piece of land to work. Sebastien drew a rudimentary picture of the *ejido* on a large piece of flipchart paper. His illustration portrayed the *ejido* as a square—with 3 circles of varying sizes distributed in the square representing the 12 families in Kuyoc, 73 families in Diosbotek, and 12 families in Pacab (together totaling more than 500 people).

A distinct Mexican legal institution, an *ejido* is defined by shared ownership of common property—or common pool resources (CPRs)<sup>6</sup>—which is autonomously and collectively self-governed by its members, often via consensus-based decision-making processes.<sup>7</sup> Each of the 106 municipalities in the Yucatán state has, on average, between 5-10 *ejidos* within it (there are some 2,438 municipalities in Mexico). Among the internal rules contrived by members of this *ejido*—self-described as *ejiditarios* to distinguish themselves from those who do not possess this entitlement—were rules regarding

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<sup>6</sup> Common pool resources—a sub-class of public goods—are by nature both rival in consumption (use by one member removes that thing from use by others) and often non-excludable (difficult to exclude or prevent others from using). On the unique facets of common pool resources and institutions, like *ejidos*, intended to allow for self governance by user communities, see Ostrom (1990), Agrawal (2001), Baland and Platteau (1996). Ostrom et al 1999, Ostrom 2008.

<sup>7</sup> *Ejididos* are one type of CPR-institution devised to allow for collective governance of commons—in lieu of allocating private property rights or other conventional institutional solutions to mitigate tragedy of the commons scenarios (overharvesting, overgrazing, pollution, etc). On tragedy of the commons, see Hardin 1968, Feeny et al 1990.

membership, representation, governance, and transfer of property, as well as land use planning—which parts of the *ejido* would be dedicated for residential and community purpose (for homes, a school, a health clinic and several small churches around a town center) and which for individual household food production, forestry, protected areas and the like.

Everyone born in one of these three villages had a right to work the land but not to sell it.<sup>8</sup> Families could choose the locations within the *ejido* where to do their agriculture, and *ejiditarios* each agreed to respect the places that others chose to cultivate (that is, if the land was already in use by one *ejiditario*, another person could not usurp their right to cultivate). Each *ejiditario* could work up to 12 hectares (roughly 30 acres) of land and had the right to put up fences, graze cattle, and plant fruit trees. Every three years, members elected the leadership commission of the *ejido*—*el comisario ejidal*.

Sebastien emphasized the importance of the decision made by Diosbotek and other villages in the *ejido* to prohibit the sale of *ejido* land. *Ejiditarios* and others from the area often emigrated to Cancún to work for several years in construction or the tourism industry, but the land would still be available to them, according to *ejido* rules, if and

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<sup>8</sup> Other *ejidos* in Mexico have permitted their members to transfer property and even sell it to outsiders, most notably in the coastal Yucatán areas of Quintana Roo—where many large resorts catering to foreign tourists are located and built on what was once *ejido* land.

when they came back, preserving the option for community members to return to cultivating the land—especially if other economic prospects proved untenable. In Sebastien’s words: “But every country makes its own laws. The president that signed NAFTA changed the law. He said to the rural people—you have your own piece of land. We’ll give you a certificate. Do what you like.” Many villages then divided up their *ejido* land into smaller properties—granting titles to the ejiditarios, who in turn sold their small pieces. But “the day after, they realized they had nothing left to defend themselves.” Sebastien distinguished Diosbotek and the surrounding villages within the Yucatán as different from elsewhere in the peninsula and Mexico more broadly; as a majority Mayan indigenous area, “people with a strong identity” asserted “we will not divide our ejido.”

Despite shifting government policy permitting the sale of ejido land, ejiditarios in Diosbotek—like villages in 15 other Yucatán municipalities—opted not to divide their ejido and, instead, preserved their practice of collectively managing their land. About 100 years ago in the Yucatán, the revolution against the Mexican government represented an effort by indigenous people to gain independence from the state. During the decades’ long fight against the Mexican State, some 400,000 indigenous people were killed. Sebastien surmised that the war and its consequences for the Mayan people



continues to play into their lives today; “for people...it’s still in mind. Land remains important.”

When faced with economic troubles, many ejiditarios that left in search of jobs indeed came back from Cancún, to find that, at least, they could work the land and produce what to eat for a year’s season. The pursuit of work to earn a cash income is a daily task of pounding the pavement to find odd jobs in the informal and formal economies alike, rarely ending in stable employment, even in the touristic areas of Cancún, Valladolid and Merida. Pursuing employment outside the village largely means abandonment, at least temporarily, of agriculture, meaning that households rely on cash to purchase food rather than their own subsistence harvest, which can be plenty for a family that grows enough in a good year.<sup>9</sup> Luis García worked for several years in Cancún until he survived a gunpoint encounter with a stranger in the city’s slums—where rural peasants immigrating to the city for work often found themselves, alone without the support system of their extended families and neighbors. Luis García soon returned to the “peaceful” life of his village, where both the anonymous street violence and waves of organized crime rumored to plague Mexico’s major cities were unheard

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<sup>9</sup> Author’s interview with Rubén Ek, Diosbotek, July 21, 2012.

of.<sup>10</sup> A leader of one of the cooperatives active in promoting ecotourism in Diosbotek—and a son of the esteemed and highly sought after village *curandero* (native healer/shaman)—Luis García reflected on a renewed appreciation for the uncertainties of village life and the autonomy it afforded him as compared to the lures of employment in the city: “I can plant my *milpa* and, if it’s a good harvest, I can rest in my hammock for two weeks if I feel like it and not worry.”<sup>11</sup>

## **4.2 Shifting Cultivation**

Seated in a faded, worn hammock, slung wall to wall across the cement block house that doubles as a make-shift micro-shop vending a few household sundries and treats, like soap and bubble gum, Rubén Ek sits across from me—shucking dried multi-colored kernels of corn from last season, which he pulled from the *palapa* (palm shelter) where he stores the family’s corn just next to the house. He’s selling the corn to another family in the village, who does not have any—so hopefully they can use the seeds to start planting their own. Asked if he sells his corn at a profit, he says he sells it for less than the price charged elsewhere. “*Diez pesos, no mas. Somos campesinos pobres. No vamos*

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<sup>10</sup> Author’s interview with Luis García, Diosbotek, Mexico, July 20, 2012.

<sup>11</sup> *Ibid.*

*a explotar uno.*" (Ten pesos. No more. We're poor farmers. We should not exploit one another). He further expressed the importance of supporting others who were struggling and trying to learn how to become active once again in agricultural production—as the younger generation was less engaged in planting their *milpa*.

Wiry and strong, Rubén Ek is nearing seventy years of age, yet he still plants his *milpa* (200 *mecates*) and a diverse array of vegetables and fruits between his *milpa* and kitchen gardens. He cultivates more *milpa* than practically anyone else in the village besides his brother—who, about the same age, I found one cool morning behind HST's house, barefoot some 20 feet up in an exotic Rambutan tree collecting the spiny fruit, a small bag draped across his chest to hold the cut branches. Like his siblings, Rubén Ek learned to cultivate his *milpa* from his "*padres y abuelos*" (parents and grand parents). His *abuelos* secretly arose by moonlight when they were enslaved to Mexican *hacendados* (plantation owners) to sow their seeds.

Though *ejiditarios*, like Rubén Ek's grandparents, succeeded in securing land from the government on which to contrive their subsistence livelihoods, the process of growing food for household consumption, if not also market ends, was another story. "How do people cultivate the land?" Sebastien further enquired of the audience of North Americans—perhaps anticipating that group questions might betray our

ignorance to the local realities of “shifting cultivation” on rocky and unlevel surfaces (a stark contrast to American or European pastoral images of the small family farm, with evenly spaced, uniform rows spread out across flat and verdant fields). “No tractor, cow, horse on land....Stone all over. Impossible to use a tractor. Can use only with soft soil. All the work is done by hand. Rain is important. Rain makes the soil soft. People go to the field with sticks. Make holes. Put seeds in the ground, and the seeds will grow. Leave the stones.”

As for the staple crop central to household nutrition, Sebastien rhetorically asks, “How do people grow corn?” He goes on to describe the fundamentals of “shifting cultivation” — also known as “nomadic agriculture” and, more infamously by the terms “slash and burn.” A family in August or September will select 4 hectares (about 10 acres) in the *ejido* to cultivate for their *milpa*.<sup>12</sup> They then “...cut down all the trees. With an axe. One after the other. It may take one month to cut down all of the vegetation. All the trees—by April—are totally dry. Light a fire and burn the whole surface.” The fire clears the surface of the land, and the rains start in the beginning of the month of May. After 3-4 days of rain, the soil becomes soft enough for someone to make holes in the ground—where corn and seeds for other staple crops are then planted. Come

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<sup>12</sup> On the practice of milpa, see Perez Toro (1945) and Re Cruz (1996).

harvest time, the corn is picked by hand and put in baskets for storage and use through the rest of the year.

While each *ejiditario* is permitted to cultivate 12 hectares, no one cuts and clears that amount in a single year. In the first year, a family cuts down 4 hectares—the amount of land needed to produce enough corn, squash, and beans to sustain the family for one season. The following year, they fell another 4 hectares. Burned trees represent one of the best fertilizers. Typically one area suffices for 2-3 years of use if the ground is fertile, which depends on the size of the trees growing in the land about to be cleared (if the trees are small, there's less ash). In the next year, the family moves on to clear and cultivate another plot. After some 8-10 years, the family returns to the first plot cultivated—which has grown back to a dense thicket of tropical forest—and they begin the process once again.

This practice of swidden agriculture—in a densely forested area on uneven terrain otherwise ill-suited for agriculture—is one of the only ways to grow food in this landscape, according to Sebastien. And the local people engage in agriculture in this way because they are "...not in a condition to take chances with land in other ways." On average, families spend eight months of each year to guarantee sufficient food for the household. "Eight months! If to change their way of life—plant a garden, take a chance

with wood. Here, it takes 15-20 years.” “People do agriculture because it is all they can do. No politics can help them.”

The image of cleared forest and charred land after *ejiditarios* have prepared their land to cultivate their *milpa* is commonplace—both in rural development and critiques of smallholders as agents of deforestation and degradation. Known variably as “slash-and-burn” and “nomadic agriculture,” shifting cultivation has been practiced by Mayan indigenous people for thousands of years, long before the Spanish arrived or the modern state of Mexico came into existence. As a method of agricultural production common among farmers worldwide, it has been long derided for its negative environmental consequences, ranging from increased GHG emissions (from burning) to loss of biodiversity. Recent scientific scholarship has, however, questioned whether this practice may in fact, under certain conditions, have environmental benefits as well (depending on the scope and scale), including enhancing overall forest biodiversity (and whether government bans of the practice of forest burning might need to be reconsidered).

All other things being equal, Sebastien still sees the Mayan traditional practices of shifting cultivation in the Yucatán as better than conventional alternative economic options—immigrating to Mexico’s dangerous cities or the U.S.—which upend family

and community life in addition to increasing vulnerability to poverty and food insecurity. Sebastien contextualizes his ambivalence to nomadic agriculture as particular to the Yucatán context; in contrast to Amazonas, where slash and burn leads to changing use of forests—where forests become fields, first for agriculture then for cattle grazing. “In the Yucatán, there are 100,000 *campesinos*. Here, no one cuts down 50 hectares. Maximum—4,5,6 hectares in a year. In the Amazon, big companies push the local people out.” He adds, “Even here, I’m against slash and burn. But better to do slash and burn here than go to the U.S., or move to Cancun or another dangerous city. People do not have a profession. So they offer their labor—cheap.”

### ***4.3 Beyond Shifting Cultivation: The Pursuit of Alternative Livelihoods***

In an effort to promote reforestation as well as improve household nutrition and potentiality for commercialization of select crops, NGOs like HST have incorporated training in agroecological methods and permaculture as alternative agricultural approaches to naturally bolster soil nutrients in a single location, without requiring producers to either move to new plots and clear forest year after year or purchase additional fertilizer as an external input. Moreover, from the vantage point of Sebastien and El Hombre Sobre la Tierra (HST), the abundance of trees growing everywhere

around ejiditarios' subsistence plots represented not just obstacles for removal en route to subsistence cultivation but rather plausible opportunities for alternative livelihoods and sustainable economic development. "The area is not meant for agriculture. But if we can get people to grow wood..." there might be avenues for community members to earn an income through the production and export of artisanal furniture and wood crafts. Wood grows all year round in this part of Mexico; in contrast, the winter season represents a pause in the growing cycle in the U.S.

HST's observation about the plausibility of developing a local industry involving wood products was not original—especially given the abundance and diversity of tropical hardwood species (72-73 different tree species) that could be exploited for a range of purposes—though HST has been one of the only organizations to undertake serious efforts toward realizing this vision. Yet HST quickly learned of the obstacles confronting the NGO and local producers should they try to pursue that route. Historically, there had been no program to "help people to change the economy." Sebastien attributes the lack of economic development in the sector to "bad politics" and a lack of information. "People don't know about the market for wood." Despite the abundance of high quality wood in Mexico, the country imports pine from the U.S.,



Argentina and New Zealand. “The trees grow by themselves. Who gives the money? Local and international politicians never know the real potential of the region.”

While wood products could readily be exported, interested producers would need “to wait 20-22 years for trees,” leaving the question of how to support households in the meantime. Moreover, carpentry and machinery were required, as well as training, in order that value-added products might be produced (as opposed to simply exporting the raw timber and receiving a lower price). HST embarked on the wood products venture—and helped to contrive a carpentry shop in Diosbotek, the only one of its kind within a 50 mile area. As of 2012, carpentry in Diosbotek involved 5 people. For producers that chose to develop their carpentry skills, it was the first time most had engaged in this type of creative enterprise and could see the possible economic opportunities it might provide—especially after becoming aware of “how many plastic chairs there were around...at times, more expensive than wood chairs.”

Ultimately, the question raised by Sebastien to the group of visitors was how can an organization like HST bring about change? As a small NGO, HST was working in 2012 with about 1,000 families in the Yucatán with a budget of only a few thousand dollars per year. If HST wanted to advance its idea of nurturing a high-value wood industry, for example, it would need to find a way to help involved villagers during a 20

year period—to “prepare, help with infrastructure, train them.” All of HST’s money is raised through foundation grants or through earned income—by running programs, like its eco-tourism project, which generates revenue for the NGO and the community members involved in it. In contrast, Sebastien pointed out, the political parties within Mexico receive money from the UN, World Bank and the IMF, but the money is “never used in a way that one day, poverty can disappear.”

Implicitly and explicitly, Sebastien suggested that the disappearance of poverty was what “development” was supposed to be about—as the central concept advanced by these major development agencies and governments. Yet the major players with their abundant resources failed to deliver this outcome. HST’s approach was to invest deeply in communities and work towards incremental change—first gaining legitimacy and credibility as a partner that would not disappear at the end of the project cycle. The organization’s view of “alternative” livelihoods was, thus, not about replacing but complementing existing subsistence activities and leveraging the unique strengths and interests of individuals and communities. HST’s efforts to advance alternatives to shifting cultivation included not only the idea of the carpentry shop but also sustainable tourism, shifting agricultural practices towards permaculture and the creation of diversified kitchen gardens, and supporting producers seeking to commercialize select

handicrafts (hammocks) and agricultural products (honey) which villagers were already adept at creating or growing but lacked viable markets for.

#### **4.4 Honey as an “Alternative Livelihood”**

Part of HST’s rationale for encouraging families to engage in honey production was that it had proved to be a viable economic activity for those in Diosbotek and surrounding villages already adept at beekeeping. Cultivating bees and producing honey—even in small quantities—has become a significant source of income for nearly 30 *apiculturas* (apiculturists/ bee keepers) in Diosbotek and thousands of subsistence farmers elsewhere across the Yucatán peninsula, who otherwise rely on their traditional agricultural activities—the production of their milpa harvest of corn, pumpkin, and beans (among other things) and maintaining kitchen gardens—to secure the family’s food supply and livelihood. On any given year, Mexico exports roughly 25,000 metric tons (MT) of honey, primarily to the European Union (EU). Mexico, and the Yucatán region in particular, represents a supplier of importance to the EU due to not only the distinct qualities of its multi-floral honey but also as a country where honey is produced apart from most large scale industrial production (viewed as potential sources of

contamination due to the presence of carcinogenic pesticides, heavy metals, and antibiotics, as well as genetically modified organisms.

As the bee keepers and subsistence producers I interviewed further made clear, honey indeed matters for local livelihoods. A self-taught keeper of bees for some 25 years, one farmer identifying as an apiculturist recoiled at the suggestion that he might have received government assistance to support the financing of his sturdily constructed cement block house. “I made this house from bees. For me, it is incredibly important. I sell my honey, and I buy what I need. My car is from honey. Everything that I have is from honey.”<sup>13</sup> Don Horacio spoke about honey as the key source of cash income for sustaining his family and making improvements to his home—despite the fact that he may, at times, receive below market prices for his product, as a result of many factors including complex webs of intermediaries that influence prices producers receive and the actual market dynamics operating within commodity chains and in global markets.

Many producers in Diosbotek, like Horacio , grow crops and cultivate honey in their milpa and kitchen gardens at once for household consumption and for market, and their agricultural products feed into global commodity chains in myriad and complex ways, often unbeknownst to them. Following the honey from the bee hive and bucket,

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<sup>13</sup> Author’s interview with Horacio, Yucatán, July 19, 2012.

we can more readily view some of the core issues in play that shape and structure the market—as these subsistence crops become commodities, and the bottom of the production pyramid merges with top-down value chains and regulatory architectures contrived by actors operating at great distances from the villages where crops are grown and raw products made. Like the tropical hardwood trees that “grow by themselves” in Diosbotek absent human interference, the basic work of creating honey from the abundant nectars of the region’s intact tropical forests is done by both wild and domesticated bees. If left to their own devices, bees will create hives of their own accord in myriad locations that seem suitable for their needs—a hollow tree trunk, for example—and in proximity to ample sources of food.

For humans to successfully coral bees and harvest their honey, however, some up-front investments are required. For their keepers, bees bring benefits but also uncertain costs—which fluctuate with natural cycles, seasons and ambient environmental changes as well as the vagaries of the marketplace. HST supported community members in purchasing or constructing boxes as well as providing assistance—like sugar to feed the bees when natural sources were unavailable.<sup>14</sup> During the 2012 season, there was “*mas o menos una buena cosecha*” (more or less a good harvest),

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<sup>14</sup> Field notes, car ride with Sebastien and Eduardo from Merida to Valladolid and Diosbotek, Yucatán, July 17, 2012.

according to Horacio and his wife Estefania. But there are bad seasons as well. “*Cuando no hay comida, se van. Vienen temporadas cuando no hay.*” (When there is no food, they leave. There are seasons when there is none). In essence, if the rains don’t come when they are expected or the flowering cycles are off, the bees—without a consistent source of food—will leave.<sup>15</sup>

Those just starting out and learning the practice must first acquire hives—with or without the bees. This itself can be an onerous task, especially if a producer hopes to cultivate the native, stingless bees (*Apis Melipona*), whose honey garners a high market price—due to its purported medicinal properties and relative scarcity. These stingless bees, if agitated, release a chemical smelling of coconut—compelling the hive to swarm around the source of intrusion (including flying into an animal or person’s nose, ears and mouth). The introduction of European bees (*Apis Mellifera*) to Mexico, while a boon for those seeking to enter the sector, also propelled some producers to exit. Historically, Mayans have been cultivating the native stingless bees since recorded history in the Yucatán. Some of those accustomed to the behavior of the stingless bees found the new variety to be an aggressive invasive species, which soon outcompeted native bees.

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<sup>15</sup> Author’s interview with Horacio, Yucatán, July 19, 2012.

Those who remained engaged with bee keeping involving the European bees had to adapt their methods. As another bee keeper, Javier Uicab, noted, some people found that the European bees were agitated when hives were located in close proximity to noisy community roads with trucks and cars passing by. So Javier would carry his hives into the more isolated and hilly parts of the *ejido*, where the bees would not be disturbed. Bee keepers also move their hives around to take advantage of plant flowering cycles—and relocate the hives so they would be in proximity with flowers from which the bees could forage.<sup>16</sup>

The production of honey from *Apis Melipona* dwindled with the introduction of European honey bees into Mexico, and those producers who retain hives are reticent to sell them to other would be producers.<sup>17</sup> In 2011, one community of 6 families working cooperatively on shared land sought to incorporate apiculture into their ever expanding biodynamic farm. Even with the help of HST's agronomists and others, it was incredibly difficult for Andrea María Cab, a woman in this community who led the effort to jumpstart honey production, to convince anyone to sell her a hive. They eventually

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<sup>16</sup> Authors interview with Javier Uicab, Diosbotek, July 20, 2012.

<sup>17</sup> Ibid.

acquired three hives—enclosed, log-like structures—but within one year, all the bees had either escaped and relocated or died.<sup>18</sup>

In contrast to keeping the native stingless variety of bees, the practice of keeping Europeanized bees—the most common honeybee employed in commercial honey cultivation—requires first acquiring the *cajas* (boxes). Most producers purchase boxes—at a price of 280 pesos per box in the closest city of Valladolid. A few experienced in the community wood shop opted to construct their own boxes, including Angel—a young man new to bee-keeping as a result of HST’s efforts to promote capacity building opportunities for those interested in exploring honey production. Angel built one box and hoped to create more in the future, once he had additional income to invest in other aspects of bee keeping.

Horacio possesses between 30-50 colonies of bees, which he has been maintaining for over 25 years. His investments in keeping bees begin with purchasing the basic equipment and supplies for preparing and maintaining the hives and the bees themselves. For each box, Horacio requires 9 *ojas* (leaves)—the beeswax or paraffin sheets where the bees build the hive infrastructure and encapsulate the honey. If you buy the beeswax *ojas* pre-made, they cost 15 pesos each. But, according to Horacio, if he

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<sup>18</sup> Authors interview, Andrea María Cab, Yucatán, July 9, 2012



goes to Valladolid to purchase the leaves for his hives—the *ojas* they sell are made of paraffin, not beeswax. Unlike natural beeswax, “when [the paraffin sheets] get hard, the bees stop working it as much.”<sup>19</sup> Horacio discovered a way to reduce his costs and retain the high quality beeswax leaves for his hives—by finding someone that would convert the beeswax he collects from his own hives after processing the honey into new *ojas* for his hive—for just 2 pesos per *oja*. (He eagerly displayed the dense flat disk of yellow beeswax he saved to process into new leaves). So, before even acquiring the bees for his hives, procuring needed medicine or extra food for them, Horacio made significant upfront investments to cover the fixed costs for each of his hives and for purchasing new materials required from one season to the next.

Once the hives become populated with bees and a queen has settled in to her role (of reproducing), bees begin their work of manufacturing honey from nectar—which they store along with pollen grains collected during long foraging visits to flowers within 10 km of their hives.<sup>20</sup> Apiculturists harvest the honey and store it in whatever vessels are on hand, before selling it. Beekeepers either sell directly to middle-men passing through the village looking to buy honey or transport it on their own to Valladolid and then sell it to one of the vendors on the main road advertising with a

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<sup>19</sup> Author’s interview with Horacio, Diosbotek, July 19, 2012.

<sup>20</sup> Beekman and Ratnieks 2000.

giant hand-painted sign—*COMPRAMOS MIEL* (We buy honey). While selling to the intermediary passing through the village may result in producers receiving a lower price, they save money on the costs of private transport to the city to sell their honey (there is no public transportation passing through Diosbotek). A few producers, like Horacio and Francisco, have their own vehicles and can take their honey themselves when they're ready to sell—or to merely check on current honey prices (they do share that information with other bee keepers in Diosbotek). Some producers store their honey for some time after the harvest, waiting until the right moment, when honey prices are high, to sell. Others cannot wait for another day and a better price. On average, Horacio receives 22 pesos/ kilo for his honey—with a maximum price of 35 pesos/ kilo and the lowest prices less than half that at 15-18 pesos/ kilo.

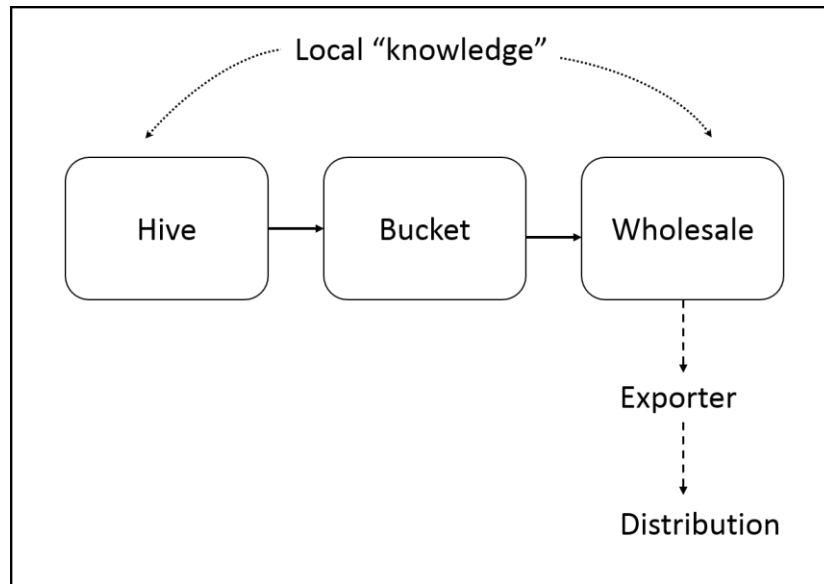
In Valladolid, the “Compramos Miel” buyers have primitive set-ups. Bee keepers typically show their credentials—a piece of paper documenting, among other things, their name and their status as an approved producer (a minimum certification assuring that government inspectors have, at some point, verified the health of their hives).<sup>21</sup> The honey from each producer is dumped from their individual buckets into

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<sup>21</sup> Author's interview with Francisco, July 2012.

larger storage barrels, where it is eventually transported on trucks to nearby port cities and then transferred to shipping containers for passage overseas.

While experienced apiculturists like Horacio and Francisco have mastered their trade and possess an intricate knowledge of the science and art of bee-keeping, the detailed knowledge of these producers breaks when their vessels of honey are transferred and sold to middlemen—transformed from an artisanal product with distinct local attributes into a commodity bound for global markets. Positioned at the margins of mainstream markets and modern society, few small scale producers could ultimately articulate the steps in the honey supply chain beyond his personal encounters with the local or regional marketplace—the person who comes to inspect and certify their hives as acceptable (and gives them the certificate), the intermediary buyer to whom they sell it (either in their village or in the nearest city or town away). Figure 3 offers a graphic illustration of the honey supply chain and the parts that locals can readily envisage, namely their hives, buckets for storage and transport, and the point of sale to an intermediary or wholesaler.



**Figure 3: Honey Commodity Chain from Local producers' Perspective**

Yet despite their lack of knowledge about the other end of global supply chains, the individual actions and knowledge of one producer (or lack thereof) contribute to the collective capabilities of similar small producers—in Mexico and elsewhere around the globe—in assuring the safety and viability of an entire global honey supply chain beyond them. Contaminated buckets used by one bee keeper—who might lack the awareness of the need or ability to pay for an appropriate sanitary vessel—can mean broader contamination of entire batches of product, as small quantities of honey from individual producers are mixed together in barrels and eventual metric ton containers

for shipping.<sup>22</sup> Similarly, other potential sources of contamination or adulteration—resulting from the actions of a bee keeper or from other factors in his surrounding environment—cannot be readily detected once the honey has been collected from the hive, transported to market and combined with the honey of others in Valladolid or another transit point en route to export markets. In essence, it has become spatially and geographically disconnected from its point of origin—a classic problem associated with the transition to distant markets for agricultural goods.<sup>23</sup> Some assurances of quality and safety have been put in place more recently in Mexico and elsewhere around the globe where problems of either contamination or adulteration have rendered honey unviable for sale. In Mexico, these include certification by government agents—to ensure hives are healthy, treated with appropriate medical interventions when necessary, and that appropriate storage vessels are possessed to store and transport product to market.

Yet, when asked what happens to the honey he sells to intermediary buyers in the closest city of Valladolid, Horacio remarked that he has heard that honey from the Yucatán eventually winds up somewhere in Europe—where they mix it with their own lower grade and tasteless honey and sell it for a lot of money.<sup>24</sup> His predictions about

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<sup>22</sup> Author's interview with HST agronomist, July 2012.

<sup>23</sup> Cronon (2009) discusses this problem in his discussion on the invention of wheat grading.

<sup>24</sup> Author's interview with Horacio, July 2012.

the journey of honey from his hives to distant markets were not far from reality. And once comingled with the honey of other producers—either in the local marketplace or overseas—a bucket of honey cannot readily be traced back to an individual bee keeper, in the Yucatán or anywhere else.

#### **4.4 Analysis**

The challenge that bee-keepers and their allies raised against Monsanto in 2012 was one made on the basis that the large scale planting of genetically-modified soy would undermine the livelihoods of Mayan subsistence producers that relied upon bee-keeping and the export of high-value honey to international markets like the EU—to earn a cash income, beyond their traditional subsistence production.

Central to interpreting this policy-outcome, as illuminated in this chapter and in the chapter that follows, is an understanding of the complexity and interdependence across ecological and economic systems and scales—the agricultural practices and perspectives of agrarian change from the vantage point of Mayan *campesinos* and their allies—at the very bottom of the global economic pyramid. The *campesinos* I came to know were not ideologues out campaigning against particular approaches to agrarian change, like biotechnology, for political or moral ends (as Green Peace Mexico’s aerial

photos of Mayans protesting GMOs at Chichen Itza might suggest).<sup>25</sup> Rather, they've continued to prefer what is tested, tried and true over new and unproven methods—such as hybridized or genetically modified seeds that don't replicate themselves (requiring a producer to buy new ones again each season)—solutions that may advertise great benefits but mask hidden costs and unintended consequences. Risk aversion to the unknown and untested is just one part of the story, as some *campesinos* take a long view of agrarian change and subsistence survival—understanding deeply the links between their families across generations—and the risks of trading their collective inheritance (land, most notably) for short-run gain. I suggest there is a potent internal rationale within indigenous communities for upholding traditional modes of agriculture—and favoring incremental change when it aligns with local values—rather than acquiescing to development, regulatory, or technological interventions (and “innovations”) initiated by external actors. At the same time, I argue that despite a natural orientation towards risk aversion—farming is risky business, especially if your life depends on doing it well—adaptation, experimentation, and innovation are likewise part of the subsistence repertoire.

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<sup>25</sup> <http://www.greenpeace.org/mexico/es/Blog/Blog-de-Greenpeace-Verde/ma-ogm-no-a-los-transgnicos/blog/40427/>

Moreover, unlike many challenges to the introduction of GM agriculture in Mexico and elsewhere around the globe—which rested on general concerns about the introduction of all genetically modified crops on the basis of their potential risks to the health of consumers or other uncertain health or environmental effects, the challenges brought by Mayan bee keepers against Monsanto centered, rather, on the impacts to producers and on the interrelated impacts of the GMO production of one crop—soy—with an entirely different product/ crop—honey. The economic consequences of the possible down-grading of honey as an export commodity would be profound for producers in the Yucatán, including bee keepers in the village of Diosbotek (why, Sebastien, came running towards me leaping for joy in hearing about the first of several victorious rulings to keep GM-soy out of the Yucatán). By default producers of high-value honey—by virtue of the environmental conditions and biodiversity of flowers from abundant tropical forest remaining in their ejidos, as well as the general absence of large-scale industrial agriculture—would lose access to the European market so long as it demanded certification and testing of honey for proof of its GM-free status. In addition, beyond the GM “contamination” of soy pollen itself, other spillover effects from large-scale industrial production also were a concern to bee-keepers—such as the increasing use of industrial fertilizers and pesticides that accompany the production of



many GM crops, some of which have been identified as deleterious to bees and other beneficial insects and pollinators. These problems may be further exacerbated by the additional over-use of fertilizers and pesticides beyond the recommended amounts — introducing further environmental effects for local water supplies and human health.

Even with testing and certification, still, bee-keepers would be unlikely to prove (or prevent) the absence of GMOs in their honey — given not only the local ecological complexities and interconnectedness across agricultural activities intended for both subsistence and market production but also the ways that honey, once produced, meanders into local and global markets (all mixed up in barrels and shipping containers headed overseas). What the courts demanded of the Mayan bee keepers — and which they subsequently proved through scientific tests a group of beekeepers in one region independently conducted<sup>26</sup> — was to prove what Monsanto contended about the fundamentals of honey bee biology and foraging behavior. According to Monsanto's account, because soy-flowers self-pollinate — that is, they do not require the active pollination by bees or other insects to assure their fruitful production — the bees did not

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<sup>26</sup> These tests were conducted by Mayan beekeepers in villages that were located adjacent to experimental plots of GM-soy, which were permitted in that region (to be distinguished from large-scale commercial planting, which was not permitted). To test for the presence of soy pollen in the honey, there would need to be a natural experiment like this one — where bees given proximity, would have the opportunity in principle to forage on pollen and nectar from the soy plants, in addition to other wild flowers they usually forage on.

visit the soy flowers. In essence, Monsanto proposed that the introduction of pollen grains from GM soy in the honey of nearby bee-keepers could not happen—as if bees somehow read the signs posted outside the soy-fields declaring their labor was not needed. On the grounds that bees visit the soy plants—which in turn introduces GM-soy pollen into the honey of Mayan bee keepers—judges ruled to uphold the ban on the commercial production of GM soy in the Yucatán.

## 5. Shadow Commodities and Interdependence

This chapter further reflects on the honey case to develop an alternative theory for regulatory change and innovation—one which may offer greater analytical leverage in understanding otherwise difficult to explain dimensions of transnational governance. I contend that the characteristics of the commodities themselves and their interactions with other commodities represent important new variables for consideration in the context of regulatory change and innovation, especially as related to stakeholders located in emerging economies of the global South.

The chapter proceeds as follows. In the first section, I discuss a plausible missing mechanism at work as a means to achieve regulatory change, that is: “downscaling” rather than “upgrading” in the face of globalization. In the second section, I discuss the role of governance gaps as an important antecedent condition. In the third section, I elucidate how commodity characteristics further contribute to understanding regulatory change. In the final section, I elucidate the concepts of shadow and focal commodities—variables central to my explanation.

## **5.1 Downscaling in the Face of Globalization**

As we have seen, the vagaries of global markets and transnational governance efforts, like third party certification, may actually constrain rather than enhance producer access to markets, leaving small-scale producers in a precarious situation, seemingly with few alternatives. As noted by Lee, Gereffi and Beauvais (2009), "...the presence of multiple governance structures and stringent private food standards shape the strategic options available to smallholders, who confront three basic choices: upgrading, downgrading, or exit."

Yet, as seen in the village of Diosbotek and the Yucatán more broadly, producers can also have varying degrees of capacity for voice and agency.<sup>27</sup> Certainly, one expression of such agency in the face of systematic oppression by repressive political regimes and livelihood loss has been armed conflict and revolution—including conflicts waged by Latin American states directly against indigenous and rural *campesino* populations. Barring revolution, James Scott elaborates voice displayed in everyday modes of resistance, which he characterizes as "weapons" wielded by the weak to demonstrate their discontent with the status quo.<sup>28</sup> But those marginalized in Scott's account still ultimately face a high likelihood of getting bowled over by elites who

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<sup>27</sup> Hirschman 1970.

<sup>28</sup> Scott 2008.

exploit the poor for further economic gain and the forces of globalization—including the large scale industrialization and mechanization of agriculture, which displace peasants as an essential agrarian labor supply. If there is no beneficent government to intervene—when markets fail, natural disaster strikes, or exogenous economic shocks upend prices for important traded commodities (and leave producer communities food insecure)—how do producers in emerging and developing countries respond?

One way seemingly localized social and environmental problems—and the communities affected by them—have garnered attention and galvanized support has been through transnational advocacy networks (TANs). Scholarship has shown how transnational actors can leverage local problems to catalyze global response—by pressuring transnational corporations to behave better in the jurisdictions where they operate and additionally push for changes in international policy. For example, as illustrated by Keck and Sikkink (1998), TANs were instrumental in launching a widespread and visible boycott of Nestle corporation's products, after it had been demonstrated that Nestle's advertising campaigns had influenced women in developing countries to abandon the traditional practice of breast-feeding in favor of infant formula, leading to higher infant mortality rates (due to malnutrition and contaminated water-borne illnesses). This boycott in turn pressured international institutions like the World

Health Organization (WHO) to take action to regulate Nestle's behavior (through the passage of the 1981 WHO Code of Marketing for Breast-Milk Substitutes).

However, in the cases examined by Keck and Sikkink (1998)—unlike those central to this study—while the policy problems emerged within domestic jurisdictions in relation to transnational markets and actors, like multinational corporations, the venues for challenging those targets were global, not domestic. Moreover, the dominant actors leading the charge were generally not those directly affected by corporate transgressions but networks of international non-governmental organizations and experts, challenging corporate and state power from without (in the so-called “boomerang effect”). In the absence of TANs intervening and operating with the interests of marginalized stakeholders in mind, local actors have had to devise other strategies to push forward their grievances, promote policy change, and innovate new institutions for tackling intractable problems. Paradoxically, even when confronted with global challenges, the solutions may not be global at all, but rather quite local in nature.

These conventional explanations offer some value in understanding the case of honey in Mexico (to the extent that highly organized interests groups achieved collective action and leveraged policy windows and focusing events to their advantage, like the salient regulatory event of an EU “honey crisis”). Yet these theories remain largely

insufficient for explaining unexpected instances where regulatory change and innovation actually favor the position and interests of ostensibly less powerful actors, like small farmers linked explicitly or indirectly to global markets.

Rather, what I suggest we observe in the case of honey in Mexico is small-scale producers and their allies “downscaling”<sup>29</sup> in the face of globalization. I employ the term “downscaling” to refer to the process by which actors—by intent or default—relocate the forums for responding to problems manifesting from interactions with transnational markets, institutions, and actors—shifting from a focus on “top-down” institutional approaches to those that are “bottom-up.” The case of climate change in the United States may provide one useful illustrative example of how the mechanism of downscaling can work. In the aftermath following the fifteenth Conference of the Parties (COP15) in Copenhagen to ratify a global treaty to address climate change, governors, mayors and civil society organizations across the U.S. took it upon themselves to advance policies towards achieving reductions in greenhouse gas emissions, in the absence of federal action on climate change or ratification of international treaties, like the Kyoto protocol. While the problem of global climate

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<sup>29</sup> The term “downscaling” has been employed elsewhere to refer to the process of taking information known at large scales to make predictions at local scales as, for example, for the statistical modeling of climate change.

change is decidedly global in nature, sub-national jurisdictions, local municipalities and NGOs often operating at various scales have “downscaled” their efforts to get traction and advance policy progress at the grassroots level.

## ***5.2 “Governance gaps” in the Transnational Regulation of Agricultural Commodities***

As mentioned in Chapter 3, the governance of trans-border trade is no longer exclusively of interest to states—negotiating amongst themselves their preferred set of rules. Rather it is now a matter of transnational interactions—amongst states with other states, global firms with countries and sub-national jurisdictions, firms and states with private rule-makers and even small, seemingly isolated groups of producers endeavoring to comply with the standards advanced by other countries or private third parties. What was once a conversation about the harmonization of rules and convergence toward a single set of uniform standards to govern trade within a particular issue area has exploded into a multi-stakeholder affair, with state and non-state actors weighing in on everything from standard design to implementation and enforcement. A multitude of standards have proliferated as a result, creating a world of often overlapping if not also competing sets of rules, that take account of and seek to balance multiple regulatory aspirations, as well as multiple interests . On the surface,



differences among these rules present themselves as “gaps” to be rectified in order to allow for trade amongst interested parties.

Hence, the problem of governance gaps is one increasingly relevant in the context of emerging and expanding transnational governance endeavors in the wake of globalization. Tectonic shifts have occurred in arenas conventionally understood as the exclusive realm of states—upending traditional notions of how, when, where and by whom public goods like regulatory oversight are provided. Both conceptual and real, these shifts can be seen in the move away from “government” to “governance”—from oversight as an activity wholly undertaken by states within their sovereign jurisdictions to regulation as an increasingly global activity happening across geographical and political boundaries and involving a multiplicity of actors operating at various levels and scales around the globe.<sup>30</sup> We have moreover witnessed terminological shifts—from public to private regulation, from international relations to transnational ones.<sup>31</sup> Among and within these shifting conversations and evolving governance architectures, gaps have emerged—manifestations of both conceptual and actual shifts in the construction of governance institutions.

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<sup>30</sup> Abbott and Snidal 2009; Cutler, Haufler, and Porter 1999; Mattli and Woods 2009; Strange 1996.

<sup>31</sup> Hale and Held 2011.

There is a growing literature in environmental politics and regulation and governance examining the problem of “governance gaps” across a multitude of issue areas and, moreover, about a range of policy tools, including certification, as possible “remedies” to “fill” these gaps.<sup>32</sup> Yet the scholarly literature in global environmental politics and regulation and governance often under specifies what precisely these so-called “gaps” actually are—implicitly assuming a shared understanding of the term and, moreover, the notion all gaps may be created equal. While many scholars refer to “gaps,” it is not always clear as to the reason a particular governance gap has emerged—such as the absence of a hegemon, lack of regime formation, state omissions, or governance failures—and, thus, whether and under what conditions certification or another policy intervention via public or private rule makers or rule intermediaries would likely prove an effective remedy. Thus, the existence and persistence of “governance gaps” is an antecedent condition of my conceptual model that likewise needs disentangling.

John Ruggie (2002, 297), for instance, discusses two kinds of “global governance gaps.” “One consists of the gaps between the scope and complexity of the challenges we face, including environmental threats, and the institutional means through which we

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<sup>32</sup> Hale and Held 2011, Gulbrandsen 2004.

strive to deal with them." "The other concerns a growing imbalance in global rulemaking. Those rules that favor global market expansion have become more robust and enforceable in the last decade or two—intellectual property rights being a prime example. But rules intended to promote equally valid social objectives, be they poverty reduction, labor standards, human rights or environmental quality, lag behind and in some instances have actually been weakened."<sup>33</sup>

At the most basic level, firms and small producers—and even nation states seeking to open up trade with other countries—may be thwarted by governance gaps that emerge from an absence of regulatory harmonization amongst formal, *de jure* rules at various levels of government. Standards advanced by any authority in the interest of protecting the environment or consumer health, for example, could be advanced for legitimate, substantive reasons—though they might be critiqued as veiled protectionism (strategies to protect local producers over the principle of free and open trade). Even if standards are legitimate, they still pose barriers for producers to enable trade—either advanced by public entities like the EU or private authorities like third party certification schemes. In essence, the existence of global trade standards which diverge from those *de jure* or *de facto* standards operational in other jurisdictions represent a

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<sup>33</sup> Ruggie 2002, 298.

source of “governance gaps” – for countries, regions, firms and even individual producers engaged or aspiring to engage in cross-border trade.

The emergence and proliferation of governance initiatives undertaken by non-state actors, like third-party certification, has promulgated fruitful research examining private regulation as distinct from its public predecessor and counterpart.<sup>34</sup> However, in an effort to distinguish the sources of authority and legitimacy undergirding private versus public governance – unbundling regulations along the public-private dimension – we may have missed other key dimensions that can only be understood when we think about them in concert.<sup>35</sup> The question may not be about whether or not a single private certification scheme remedies a single governance gap for a single issue area with a single commodity. Rather we need to think about labeling and certification as policy tools engaging public and private, state and non-state, local and global in particular complex arrangements – that themselves might create governance interaction effects more broadly. In essence, this is not simply about a retreat of the state fully supplanted by private governance architectures, as similar tools of governance – like certification and labeling – are being employed by both kinds of actors across a range of issue areas, for various purposes and with varying success. The question then is

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<sup>34</sup> Auld and Green 2012; Bartley 2003; Büthe and Mattli 2011; Cashore, Auld, and Newsom 2004.

<sup>35</sup> Bartley 2011.

understanding how and under what conditions labeling and certification operates as a policy tool in transnational governance and the ways that they “fill” governance gaps—or possibly generate new kinds of “gaps” as a result.<sup>36</sup> As seen in the case of the EU’s ruling requiring testing and certification for honey, GM-certification offered one kind of policy remedy to an emerging gap in the governance of GMOs across two intersecting agri-food commodities (honey and soy), yet, at the same time, introduced a new governance gap for producers seeking to participate in the EU honey market.

To understand the likely effectiveness of regulatory interventions promulgated by rule-makers, it is key to understand the purpose of their intervention—the goals that they intend to fulfill, and the gap that they intend to remedy, if in fact, it is their intention to provide effective oversight. Indeed, the term “governance gap” is often employed as a catch-all term for a wide range of problems—the use of singular term to cover a broad array of “holes” in existing and imagined architectures of governance—implying a singular meaning for a wide array of contexts. Hence, it is important to gain conceptual clarity. Though the term is used interchangeably, its use implies different things and its multiple meanings likewise pertain to its use in the context of governance.

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<sup>36</sup> Issues of redundancy can emerge, though Haas (2004) suggests that redundancy may not necessarily a problem.

Implicit in the term “governance gap” is the notion that “gaps” are inherently problematic, presupposing a world in which “closing” such gaps in an effort towards rules harmonization is an apolitical process and that convergence serves all interests equally. While harmonization—drives towards centralization of rules—may be desirable to some, it may be contested by others.<sup>37</sup> Moreover, holes in oversight can be exploited by certain actor groups over others and “filling” governance gaps may not always be desirable (or even possible). By proposing to “fill” the gaps, one implicitly suggests that a given problem can readily be overcome and should be solvable if only parties could come to a commonsense agreement (i.e., lack of questioning the legitimacy of reasons why certain stakeholders would not want convergence). Here I distinguish several varying types or manifestations of governance gaps. Not mutually exclusive, nor an exhaustive list, the gaps I describe here are of particular relevance to the transnational regulation of agricultural commodities and the interaction between shadow and focal commodities—which are central to my explanation for regulatory change (discussed later on in this chapter).

First, some governance gaps might represent governance deficits—that is “missing institutions” or a lack of appropriate rules to address a particular problem.

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<sup>37</sup> As noted by Mutersbaugh (2005), harmonization does not necessarily result in the “homogenization” of rules; variety within and among governing rules can still persist.

There may be a lack of laws, policies and associated institutions simply because a particular social, safety or environmental problem has yet to become salient in the public consciousness as a problem in need of remedy. For some classes of social and environmental problems—like preventing acid rain or curbing ozone depleting substances—the problems themselves and their causes are well understood and policy efforts have proven effective for rectifying large portions of those problems. For others, there may not yet have been a key focusing event to galvanize civil society and public rule-makers to advance the issue as a problem in need of regulation.<sup>38</sup> Alternatively, the public may assume an issue to be regulated which no regulatory authority has attempted to regulate, or for which the scope of regulatory authority is limited.

Moreover, a “governance gap” could also be the lack of a hegemon; this does not necessarily indicate that anarchy prevails or that the absence of rules is unintentional. Disagreements among involved stakeholders may have perpetuated a stalemate in rule-making—resulting in de facto “non-governance” of a given issue area. Competing visions of the world and the active agency and power of vested interests can manifest in situations of apparent “non-governance,” fragmented governance or multiple competing and overlapping regimes which, from a normative perspective, make the task

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<sup>38</sup> Birkland 1997, Kingdon 1984.

of effective regulation very difficult. Not only “overt decisions” are important to examine but also “covert” ones — as exemplified when some stakeholders actively prevent certain grievances from ever becoming issues within the political process. In essence, just as the configuration of rules may serve certain sets of interests over others, so too may the absence of rules. Governance gaps, thus, do not always manifest because of a genuine commitment but failure to achieve rules desirable to involved parties.

Next, gaps could be omissions in the design of institutions intended to constitute a holistic or more complete set of governance mechanisms or the manifestation of overlapping and/or competing rules for the management of a given problem. There could be a lack of coherence or comprehensiveness among existing rules. Viewing “gaps” as “omissions” in an existing—if fragmented—environmental regime, Gulbrandsen (2004, p. 77) adopts the view that certification represents a supplement rather than substitute to state governance in the case of forests; filling the “gaps” in this case is understood as the “...ability of forest certification to rectify the omissions of the forest regime.” Gaps could also emerge where there is a lack of coverage between two schemes endeavoring to tackle related problems, as Auld (2014) suggests in his examination of policy and problem interaction effects among certification schemes targeting overlapping or intersecting issue areas. In addition, rules may appear to offer



similar coverage with differences in stringency along a spectrum; for example, both require testing for the same contaminant in water, like arsenic, but to different thresholds.

Furthermore, in considering the role of intermediaries, there may be gaps in implementation and enforcement. In this case, formal rules may exist on paper for regulation and oversight, yet there is an absence of monitoring and enforcement; rule-making authorities may lack the willingness or capacity to implement rules in an effective manner. Or the task of ensuring compliance has been delegated to rule intermediaries lacking the resources, appropriate expertise, organizational capacity or, in some cases, the professionalism to provide credible monitoring and oversight. In this last respect, these actors may encounter incentives to subvert credible oversight in favor of fraud or the making of false claims. A notable example of this includes the recent fire safety codes developed by governments, NGOs and multinational retailers in the wake of factory fires in Bangladesh. These efforts reflect a response to the apparent failure of transnational governance to redress governance gaps in the regulation of labor and fire safety in garment factories, which even private third party certifications as well as other government efforts have failed to remedy. Similarly, in Karachi, Pakistan, one fire occurred in a factory that had just been certified for compliance with the elevated safety

and labor standards of the transnational regulatory intermediary Social Accountability International.<sup>39</sup>

Lastly and importantly, in addition to gaps or regulatory failures emanating from three-way interactions among rule-makers, rule-takers and rule-intermediaries, factors beyond the actors engaged in regulatory oversight might also contribute as sources of complex causality underlying transnational governance failures. As will be discussed in the next section, these factors can include the structure of particular global commodity chains as well as the characteristics of the commodities themselves—which by their nature may present regulatory actors with a range of oversight challenges (and possible windows of opportunity).

### ***5.3 Commodity Characteristics and Lengthening Chains of Interdependence***

Where “downscaling” may prove most relevant in contemplating the case of honey in Mexico pertains to the smallest units of analysis—the genetically modified grains of soy pollen (DNA), adventitiously present in honey, and the bees themselves

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<sup>39</sup> See Levi-Faur and Starobin (2014) for a discussion of the three-way interactions between rule-makers, rule-takers, and rule-intermediaries in transnational governance, using the factory fire in Karachi, Pakistan as an illustrative example.

(the micro-producers of honey). Unique among commodities in many respects, honey illuminates how regulatory issues of even a transnational scale can emanate from the intricate complexities associated with the smallest unit in the production process—the grains of pollen and nectar that bees collect from one plant, deposit in another (the basis of pollination, agricultural production, and primary ecosystem services) and eventually also contribute to the production of an intermediate good—honey.

At a micro-level seemingly beyond even the bottom of the human economic pyramid, bees extend and “lengthen chains of interdependence” —linking together ecological and human systems, agricultural producers, intermediary buyers, regulators and consumers at multiple scale. Here I extend and build upon the “notion lengthening chains of interdependence.”<sup>40</sup> According to Elias and Jephcott (1982) and De Swann (1988), unobservable socio-economic conditions prevailing outside a local community— “...in another part of town, in a distant region of the nation or even far away in the periphery of the modern world...”<sup>41</sup>— may be linked to effects immediately observable to a given individual and vice versa.

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<sup>40</sup> Elias and Jephcott 1982, De Swann 1988. See also van Krieken 1998. Linkater 2010.

<sup>41</sup> De Swaan 1988, 253. “With the lengthening and strengthening of the chains of interdependence went an increasing awareness of these interdependencies among the people who were so linked together.”

Honey exhibits a high level of interdependence with whatever else is physically within its proximity—including other commodities. In quite literal terms, the quality of honey along several parameters can be affected by the quality of the “forage” that bees use for food—where they gather nectar and collect pollen to bring back to their hives. Unlike other commodities, honey challenges us to account for the underlying characteristics of the socio-ecological system in which a given commodity may be embedded. A moving and migrating species, honey bees provide essential and often “free” ecosystem services—pollination for wild plants as well as agricultural crops—while manufacturing an intermediate product (honey) destined for trade in local and global markets. By nature, honey bees interact with human-designed agricultural systems and establish interdependencies with them—introducing new issues of space, scale and complexity that challenge overlaying structures of governance. These ecological factors related to honey’s production—as well as other characteristics of honey as a traded intermediate good—exacerbate challenges associated with its regulation.

Going beyond the unique case of honey, I extend the notion of interdependence to include not only social and economic conditions but also the socio-ecological systems which foster interdependence among people with their environment from local to global

scales. In essence, it is the interaction between commodities in ecosystems, markets, and regulatory systems—and the characteristics of the goods themselves—that is crucial for understanding why producers pursue certain avenues for complying with the demands of transnational rule-making authorities or, alternatively, pursue other modes of market and regulatory change. This creates an impetus to re-examine policies designed without attention to specific commodity characteristics, the actors involved in their production, and potential unintended consequences and spillover effects related to their production and distribution (i.e., issues of complex externalities, negative unintended consequences and spillover effects to non-target species).

#### ***5.4 Shadow and Focal Commodities: Characteristics and Interactions***

The case of honey further points to the need for a typology of commodities—to disentangle not only the particular characteristics of traded goods that coningle to produce interaction and spillover effects in the realm of governance, namely—the interaction among the characteristics of what I define to be shadow and focal commodities. I offer here the concepts of shadow and focal commodities as conceptual frames to further facilitate an understanding of how the characteristics of the goods themselves constrain the possible set of effective institutional alternatives for redressing

regulatory problems, like the problem of GM-contaminated honey in transnational trade.

But what are commodities, at a most basic level? Economists define commodities as those goods that have a “price and demand function.”<sup>42</sup> Fundamental to the idea of commodities is that they are interchangeable—one for one. But price differentiation along quality, grades, and even values-based labeling and the like—including country of origin—challenge the notion that all products are created equal—that honey cultivated adjacent to tropical forests in the Yucatán is qualitatively similar—a viable substitute—to that produced by bees foraging on sugar water (or even the sweet effluent from a maraschino cherry factory in New York City). Or, more directly, that honey containing residual pollen-grains from genetically-modified soy is or is not substantially equivalent to honey without it?

Advocates of *terroir*<sup>43</sup>—and related labeling for geographic indicators—share the view that not all potentially “like products” are in fact alike—not all bubbly wines are

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<sup>42</sup> Radin 1996, 13.

<sup>43</sup> A French word and concept, derived from the word for land—*terre*—*terroir* refers to the group of environmental factors that contribute to the “epigenetic” characteristics of a given crop that are related to it being grown in a particular habitat. *Terroir* refers to both the contributing factors and the distinct character that results from this unique set of environmental qualities.

akin to Champagne, nor soft cheeses Brie, nor crumbly white sheep's cheese, Feta, nor fermented blue agave tequila.<sup>44</sup>

But these differences rest on precarious terrain underpinning the logic of global trade—that tomatoes are interchangeable with other tomatoes regardless of whether one is organically grown and the other a modified tomato “improved” with fish genes, whether tuna is harvested in the presence of dolphins or not, or shrimp trawled in ocean waters, catching endangered sea turtles along the way. Voluntary-labeling, as through third-party certification, has offered one way to circumvent underlying conflicts that emerge as transnational debates where different policy preferences may be critiqued as “veiled protectionism” on the one hand, and legitimate, substantive or values-driven policy on the other. Moreover, some of these attributes of goods related to their production process or point of origins, like labor standards in factories, are, in principle, observable if not readily subject to monitoring. Other attributes may be testable, such as whether or not GMO pollen is present in honey at a given threshold. Yet, even if such commodity attributes are possibly observable or testable does not mean that they are

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<sup>44</sup> Bowen and Zapata 2009. Beginning with its registration for “Appellation of Origin Tequila” with the World Industrial Property Organization in 1978, tequila remains protected as a regionally specific name, to be used only in association with the alcoholic beverage produced from blue agave in the region surrounding the city of Tequila in the state of Jalisco, Mexico as well as select municipalities in Guanajuato, Michoacán, Nayarit, and Tamaulipas.

easy or cheap to observe (or that the process of obtaining credible information—likely a costly one—will be worth the effort relative to other alternative options).

To understand regulatory change in the cases considered here, we actually need to altogether reframe our view of commodities. Often viewed singularly—sector by sector, one issue area at a time—different agricultural commodities actually interact in the real world—in ecological, market, and regulatory systems alike—creating an uncertain array of complex spillover effects. Regulations contrived with “focal” commodities in mind, like soy and corn, may create externalities for “shadow” commodities, like honey, as demonstrated in the case of honey in the EU and Mexico.

I employ the term “shadow commodity” to distinguish a subset of traded commodities that are produced in the periphery of formal markets. Often manufactured or grown by producers engaged more directly with informal over formal markets, these commodities are largely unregulated and unregistered by governments, especially at the early stages of their production, such as when crops or other divisible products can be sourced from a multitude of producers and subsequently aggregated in larger bulk quantities and distributed for export. I chose to employ a term that highlights the good itself—rather than the “market” or the “economy,” as the goods themselves—their characteristics and the environmental conditions from whence they came—are of central



interest to this study. In elucidating this concept, I draw on research in economics and transnational trade related to shadow economies—which are often associated not only with unregistered activity but also activity that can be illicit, highly exploitative, and extremely difficult to regulate. Schneider and Enste (2000, 78) offer as a working definition of the "shadow economy" the following "...all economic activities that contribute to the officially calculated (or observed) gross national product but are currently unregistered." It can alternatively be defined as the "market-based production of goods and services, whether legal or illegal, that escapes detection in the official estimates of GDP."<sup>45</sup> Implicit in these definitions of shadow markets is the opposite notion of "non-shadow" or legal, registered markets for commodities which are captured and detected in official estimates of GDP, what I call "focal" commodities.

However, distinct from the definitions offered here, I delineate focal commodities to be those that are not only identified and calculated as part of GDP, but relatedly, ones that are prioritized by political and economic actors because of their significant economic contributions to GDP. As such, focal commodities are often central to global trade negotiations, as they may represent the source of a country's comparative advantage. They may have more or less substantive regulations associated with them—

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<sup>45</sup> Smith 1994, 18.

given that vested actors likely have a stake in not only “how much” regulation exists but “what kind” of specific substantive rules get created. Importantly, if status quo regulations for focal commodities clearly benefit the preferences of powerful actors—like multinational corporations and political and economic elites—we would expect to see a great deal of contestation surrounding efforts to shift substantive regulations related to focal commodities.

Moreover, I use the term “focal,” rather than “formal,” to denote where the focus of attention is, as well as the general prioritization of focal commodities within the economic and regulatory space of a given jurisdiction. Hence, there is fluidity in this notion. A commodity once deemed in the shadows could become a focal commodity—subject to greater taxation and regulation. Indeed, many policy makers and scholars have argued that moving shadow activities into formal regulation can potentially both enhance opportunities for states to collect taxes (or extract rents) associated with those activities, as well as regulate them in a way that can, at a minimum, remove some of the exploitative or socially problematic dimensions of them.<sup>46</sup> Related to this last point, shadow commodities may sometimes be weighted with a set of values—that preserve their status in the shadows—like trade in addictive substances, like marijuana. But as

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<sup>46</sup> Schneider and Enste 2000.

States in the U.S. have recently shown by making moves to create legal, registered markets for marijuana, for example, they have potentially reduced the size of the shadow or "black" market as well as created new opportunities to generate state revenue. Contestation may also factor in to these discussions due to competing values, as when legalization or registration of certain activities in turn provides them with legitimacy that, normatively, some members of society do not accept. I use these examples of social ills to denote another possible variety of "shadow commodity"—and how regulation actually might shift its categorization. In in this dissertation, however, I deal with agricultural products which are associated with a different kind of social and cultural values—which still represent shadow commodities because of the nature of their production process and their relative economic prioritization in trade within their jurisdiction.

In the context of agriculture, focal and shadow commodities may grow in the same fields or in close proximity to one another—embedded in one local socio-ecological system where naturally occurring physical and biological processes interact with the economic and cultural activities of people, including their interventions to alter ecosystems to suit their purposes. The interactions involved in the cultivation of both shadow and focal commodities are important—as their particular characteristics can

result in spillover effects—both positive and negative externalities for producers, communities and the environment. Beyond the characteristics of the commodities themselves, the institutions designed to govern focal commodities can also generate unexpected spillovers for shadow commodities—where missing institutions permit practices that might otherwise not occur.

In summary, by shifting attention from upgrading focal commodities to “downscaling” shadow ones, actors can exploit governance gaps that emerge where focal and shadow commodities interact—in ecosystems, markets, and regulatory systems. This may be especially true in the case where there is a nexus amongst the institutions designed to govern global commons (i.e., genetic stock/ biodiversity) and those contrived to govern local ones. As will be further illustrated in the following empirical chapter, to succeed in challenging status quo regulations, small-scale producers may find greater success in tackling regulatory issues related to shadow commodities rather than focal ones—given the likelihood of fewer concentrated and entrenched interests centering on smaller, niche markets, like honey, as compared to other majorly traded commodities, like corn and coffee.

## **6. Homegrown Institutional Innovations: Participatory Certification for Fresh Fruits and Vegetables in Nicaragua**

In this chapter on Nicaragua, I illuminate how a shadow commodity—fresh produce—provided a missing link for fostering market and regulatory innovation—namely, by nurturing new opportunities to test their viability in niche markets for “sustainable,” locally sourced produce whilst the regulatory playing field was still open to the creation of domestic institutional alternatives to transnational markets and regulation. The specific regulatory outcome I seek to explain in this case is the emergence of an innovative regulatory arrangement for commercializing and certifying fresh produce destined for new niche markets in Nicaragua—the Group for the Promotion of Agroecology (GPAE) participatory certification scheme.

I suggest that this institutional innovation emerged through the gradual shift of agricultural production away from the focal commodity, coffee, and its overlaid transnational market and regulatory arrangements towards the cultivation of fresh fruits and vegetables, in a move to both improve household food security and generate cash income. Viewed through a single-commodity lens, transnational regulations for coffee

might at first glance seem unrelated to new domestic institutions for commercializing and certifying produce grown according to agro-ecological methods.

However, this market and institutional emergence can be explained as evidence of the linkage between the high production, compliance and credibility costs for coffee producers associated with global export-oriented production, as compared with possible opportunities to cultivate and sell other crops locally in a novel institutional arrangement that promised to reduce such costs over time. Local contextual and ecological factors were also key in this case, as smallholders already producing on limited quantities of land of variable quality, much of which is already devoted to the production of a single crop—coffee—needed to consider how the characteristics of the focal commodity interact with those of potential alternative shadow ones—in space and in time. In contrast to honey in Mexico, where honey producers stood to be the beneficiaries, not the cost-bearers, of regulatory change (once a regional ban on GM-soy cultivation was established), coffee producers are both the cost-bearers and beneficiaries of transnational certifications for coffee; they cannot readily shift the burdens associated with production, compliance and credibility costs unless they shift to producing new crops altogether and institutions which lower these costs.

For the regulatory changes under consideration, namely decades of political instability and related conflict, I first discuss a global economic crisis related to the focal commodity, coffee, and a natural disaster that augmented the vulnerability of Nicaragua's peasant producer communities. Next, I discuss how transnational regulatory arrangements—like certifications for “Shade Grown” and Fair Trade coffee—failed to fully address the squeeze on coffee producers in the aftermath of the coffee crisis. In the last part of the chapter, I describe the alternative approaches and institutions introduced to help shift smallholders from exclusive production of the focal commodity to shadow commodities, including agroecological methods and participatory certification.

### ***6.1 Enabling Conditions: Conflict, Disaster, and the Coffee Crisis***

Any discussion of the shift away coffee production in Nicaragua requires a preliminary discussion of historical context. Nicaragua's tumultuous political and economic history has provided the background conditions that structure decision-making by government officials and small-holders alike. The emerging institutions I discuss here are overlaid atop this rich and complicated history. In addition to Nicaragua's history of political instability and violent conflict, exogenous market and

regulatory events and unforeseen natural disasters likely also played a role in creating an opportunity for local community organizations concerned about malnutrition and the vulnerability of rural producer communities. Of particular significance were Nicaragua's coffee crisis<sup>47</sup> in the 1990s and later Hurricane Mitch in 1998<sup>48</sup> as "focusing events" that propelled Nicaragua and its coffee producers to re-examine the sustainability of singular dedication to a high value export focal commodity — coffee.<sup>49</sup>

Political factors immediately shaping the Nicaraguan context include the oppressive rule of the Somoza family, beginning with Nicaragua's first elected president in 1937—Anastasio Somoza Garcia—and lasting until the revolution that ended the Somoza era of government control in 1979. The Somoza family's long hold on power lasted some 43 years, including periods in which no family member served in office, as their grip on Nicaraguan political power was wielded through their control of Nicaragua's National Guard. The material and political gains of Nicaragua's peasants were relatively few in the aftermath of the revolution. But, according to 2006

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<sup>47</sup> For more on the Nicaraguan coffee crisis and Fair Trade coffee, see Bray 2005, Bacon et al 2008, Benoit and Ponte 2005, and Nicholls and Opal 2005.

<sup>48</sup> See Pielke et al 2002; Holt-Giménez 2002.

<sup>49</sup> On the Contra war, see Brown 2001.



Nicaraguan presidential candidate Eden Pastora,<sup>50</sup> there was one positive, lasting outcome of the revolution in his view—aside from ending Somoza rule: “...it gave the *campesinos* (peasant farmers) dignity. Before ’79, to be a *campesino* was like being a criminal.”<sup>51</sup>

The revolution, however, was the beginning, not end, of a continued period of instability and conflict in Nicaragua, and especially for its *campesinos*, as the country soon became embroiled in the controversial Contra war between Nicaragua’s new leaders—the Sandinista National Liberation Front, who led the coup—and the U.S. backed Contras, many of whom were trained former military of the old Somoza regime.<sup>52</sup> While the revolution involved a violent coup to oust Somoza, its toll on the country’s citizens paled in comparison to the Contra War. Beginning in the 1980s and lasting until the signing of the Tela Accord in 1989 (and the break-up of both Sandinista and Contra Armies), the Contra war took the lives of tens of thousands of Nicaraguans, many of them rural peasants. The Contra war was, moreover, viewed in the international community as yet another stage in the Cold War battle between the Soviet

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<sup>50</sup> Eden Pastora lost the 2006 election to Daniel Ortega. Ortega was a guerilla leader and member of the junta that overthrew Somoza in 1979—*Frente Sandinista de Liberación Nacional* (FSLN), the Sandinista National Liberation Front. Ortega was elected president and served from 1984-90, in addition to serving another extended term which began in 2007 and still continues as of 2016.

<sup>51</sup> Anthony 2006.

<sup>52</sup> Spalding 1994.

Union and the United States, which each channeled large amounts of aid to the armies they respectively supported.

While the war officially ended in 1989, the memory of it lives on in the people that fought in or were bystanders to the conflict. In my first visit to Nicaragua in March of 2007, I accompanied a group of American visitors to learn about sustainable agriculture projects under way in the Matagalpa region. During one day of community field visits, we were joined by a local grandmother, Doña María, en route to visit her son, Rafael, who lived “*mas o menos*” (more or less) a half-hour walk into the mountains. During what was nearly a two-hour long trek that involved wading knee deep through rushing streams and ducking under low lying branches and barbed wire fences, Doña María recounted her experience of the war—pointing out along the way her brother’s special hiding spots—where he would stay to avoid passing armies that might attempt to recruit him as a fighter or target him as an enemy combatant. Doña María remained loyal to the Sandinistas, wearing on our walk the pink baseball cap popularized during Daniel Ortega’s 2006 re-election campaign; her best friend, Doña Andrea, remained a Contra. Though I met both Doña Andrea and Doña María for the first time nearly 20 years since the end of the Contra war, the subject of party affiliations during the war and

beyond remained a subtext of many conversations. Past loyalties certainly were remembered even if they did not play explicitly into current events.<sup>53</sup>

Similar sentiments were shared with me elsewhere in the northern parts of Nicaragua outside of Matagalpa. While residing in the semi-autonomous eastern region of the country, I was invited to visit the rural family of a microloan recipient for an extended stay in the mountains—half a day’s journey away from main towns and thoroughfares via a “chicken” bus,<sup>54</sup> the back of a pick-up truck, and horseback. The family similarly indicated that historic war-time affiliations were remembered and lingered on, though this family lived far from any visible human neighbors. When asked how they lived out the nearly decade long war, they said they survived by switching their loyalties depending on whomever passed by; they pledged allegiance to whichever army the fighters at their doorsteps represented. They fed, sheltered and provisioned everyone.<sup>55</sup>

The topography of Nicaragua’s conflict was also the topography of its coffee. Nicaragua’s peasants were on the frontlines of the war between the Contras and the

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<sup>53</sup> Field notes, Matagalpa, March 2007.

<sup>54</sup> “Chicken bus” is the affectionate name colloquially used to refer to the colorfully painted retired American school buses that function as the major means of public transportation in Nicaragua, because they transport riders as well as farm animals.

<sup>55</sup> Author’s interview, RAAS, Nicaragua, July 2007.

Sandinistas in the country's northern mountainous regions—south of the Honduras border—including its prime coffee growing areas in Matagalpa. The collapse of global coffee prices further upended Nicaraguan producers highly dependent upon on it. Accounting for approximately 30% of all foreign currency generated from Nicaragua's agricultural exports, coffee prices crashed from 1999 to 2003—from around US\$ 120 for 100 pounds to only US\$ 40.<sup>56</sup> High levels of coffee debt were cited as justification for the subsequent closure of six of Nicaragua's largest national banks. Because of the ensuing financial collapse, only some 10% of coffee growers could still obtain financing in the aftermath of the coffee price collapse—resulting in massive declines in the coffee labor force. For the 2001-2002 harvest, the coffee sector was predicted to employ only 50,000 pickers, as compared to the usual 200,000.<sup>57</sup>

Hurricane Mitch further exacerbated poor conditions for those already vulnerable. Proclaimed as the deadliest hurricane in the Western Hemisphere in over 200 years, Hurricane Mitch struck in late October of 1998. Varying estimates attribute more than 10,000 fatalities and some 8.5 billion dollars in damage to hundreds of thousands of homes and properties in its path in Central America (Honduras and Nicaragua), Mexico (Yucatán Peninsula), and the U.S. (Florida). Within Nicaragua,

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<sup>56</sup> Nicaragua Monitor (Newsletter of the Nicaragua Network), October-November 2003.

<sup>57</sup> Ibid.

Hurricane Mitch was credited with some 3,000 deaths and untold damage—especially to Nicaraguan infrastructure—and was perceived by many as having left the poor and vulnerable even more so. Several scholars and development practitioners have suggested that Mitch revealed the systemic State neglect of Nicaragua’s poorest—particularly rural peasants relegated to marginal land, including less productive and difficult to cultivate hillsides, which then subjected them to increased risks of landslides in the aftermath of major storms.<sup>58</sup>

Yet while all of these crises and exogenous shock events likely exacerbated and made more salient the enabling conditions for regulatory change, taken alone they did not constitute sufficient causes of regulatory innovation; policy entrepreneurs had to harness these crises as a windows of opportunity. In Nicaragua, the coffee crisis—like the EU “honey crisis” in Mexico—was a key focusing event that may have been among the necessary enabling contextual conditions for institutional emergence, but without actors actively proposing and pursuing alternatives—like the cultivation of alternative commodities and approaches to commercialization, as I emphasize here, the crisis may have been just a crisis—with no prospects for any shift in the status quo.

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<sup>58</sup> Rocha and Christoplos 2001.

## **6.2 Failure to Upgrade: Smallholders and Transnational Governance in the Coffee Sector**

Transnational actors were already actively engaged in Nicaragua's economy and politics in the aftermath of revolution, civil war, and subsequently, the coffee crisis and natural disasters, which attracted intervention from an array of external actors. In addition to international development agencies and NGOs, transnational private regulators also became increasingly involved in Nicaragua, beginning around 1989—particularly centering on improving the “sustainability” of the coffee sector—in promoting improvements to the conditions of small scale producers and wage laborers, as through Fair Trade, as well as environmental sustainability—to protect remaining stands of cloud forest as habitat for birds and shade for coffee plants.

The World Bank characterizes Nicaragua as a high-cost producer—largely resulting from its expensive credit industry and input provision networks deemed highly inefficient.<sup>59</sup> Transnational efforts to improve equity and fairness in the global coffee sector have aimed at both increasing the minimum floor price producers receive as well as providing alternative financing options for producers, contrasted against limited loan options, typically at annual interest rates of 18% or more.

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<sup>59</sup> Varangis et al 2003, Kruger 2000.

Despite its central reliance on coffee exports to GDP, the Nicaraguan government has neglected to contrive a financial infrastructure to support the growth of the industry and the many small-scale producers that rely upon it as a source of livelihood; moreover, the country has not otherwise established a robust and competitive financial sector. While there may appear to be a number of firms offering business or agricultural loans, in reality, lenders are often highly specialized. It would be highly unlikely for a prospective borrower to obtain a loan for an activity with which he or she has little experience—especially in higher risk sectors like agriculture and livestock. In these sectors, the majority of lenders have relevant technical experience such that they can evaluate the risks accordingly and a given producer’s capability to succeed at repayment, though microlenders in the country toyed with the notion of also offering competing loan products directly targeting rural producers in some respect.<sup>60</sup> Assets also play a crucial role in this context—as they may represent the only means through which a producer can secure a loan. For example, to obtain a small microloan of a few hundred dollars from most lenders in Nicaragua, a prospective borrower would need to possess some asset for collateral, such as household electronics or an appliance (refrigerator,

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<sup>60</sup> Author’s interview with representatives from multiple entities offering loans, including banks, microcredit organizations, and rural development NGOs in El Rama, Matagalpa, and Managua, Nicaragua July 2007.

DVD player, television). In rural areas with limited to no electricity, problems are further exacerbated, as a family's only asset, if any, is a productive one like their land or livestock, from which they grow food for household consumption or to sell to the market. I have observed instances of rural *campesinos* being compelled to "liquidate" a core productive asset—an entire cow—one whose value exceeded the amount of cash required in the moment, in order to pay for a visit to a doctor to treat an infection, for example. I have also witnessed instances of rural homes with no electricity possessing electronics as a means of collateral, despite the absence of reliable electricity, so they have a viable asset with which to secure a loan<sup>61</sup>

Lenders specializing in providing capital to cash-strapped coffee producers are known for practices that can entrench producers in cycles of perpetual indebtedness and extremely low prices for an otherwise high quality coffee product—including locking in purchasing contracts with producers in need of financing, which obligate producers in advance to sell their end-product for below market prices.<sup>62</sup> One 16-member cooperative in Matagalpa whose members I interviewed shared with me the financial picture from one season's production. At first glance, their numbers indicated a reasonable profit at the end of the harvest season, which runs from December through January. That is,

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<sup>61</sup> Personal observation, El Rama, Nicaragua, July 2007.

<sup>62</sup> Author's interview with members of coffee cooperative Matagalpa, Nicaragua, July 2007.



until they paid the pickers who harvested the coffee cherries and then paid back their pre-season loan with interest.<sup>63</sup> For each *manzana* of land (0.7044 hectares) they planted with coffee, cooperative members needed to borrow 14,084 *cordobas* (\$500 USD), to be paid back at an 18% annual rate of interest once the coffee was harvested. The loan paid for the costs associated with preparing the land and purchasing inputs, like fertilizer, to ready coffee plants at the start of the season; it did not pay for the pickers. On average, the cooperative collectively produced 50,000 pounds of coffee. But they sold this coffee for only around 7 *cordobas* per pound (roughly USD \$.25)—generating a net revenue of 350,000 *cordobas* for the season (approximately \$12,500). Then the pickers needed to be paid. The cooperative employed some 40 pickers each season to help with the harvest; each was to be paid 15 *cordobas* (roughly \$.53 USD) for every 20 pounds they picked. On average, pickers gathered 80 pounds each day. So, by the end of the season, the cooperative would pay out nearly 37,500 *cordobas* (\$1320 USD) to its pickers. Left with some 312,500 *cordobas*, the coffee cooperative still had to repay its loans—with interest now totaling 16,619 *cordobas* (\$590 USD) for each *manzana* of land under cultivation. If each cooperative member put roughly one *manzana* under coffee cultivation, this amounted to a loan repayment total of 265,904 *cordobas* (\$9440). All totaled, the

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<sup>63</sup> Author's interview, members of coffee cooperative in Matagalpa, Nicaragua, July 2007.

cooperative would take home as a season's profit 46,596 *cordobas* (\$1654 USD) to divide amongst its 16 member households—about 2192 *cordobas* (\$103 USD) per family. Just enough to keep producers engaged in production, but just barely covering inputs.

The promise of Fair Trade—unlike transnational efforts that seek to improve local environmental quality or protect highly biodiverse ecosystems from degradation—is to improve the economic and social well-being of producers via a “fair” price for the products they produce—in contrast to below market prices and labor conditions deemed untenable or exploitative to varying degrees. Benoit and Ponte (2005) refer to this as part of the “coffee paradox” and its “elusive promise of development.” Wilson (2010), relatedly, raises the question as to why Nicaraguan Fair Trade coffee farmers remained so burdened by debt, even some five years from the purported end to the country's coffee crisis. He presents evidence that even *campesino* households dedicated to the standards of Fair Trade continue “to struggle with a legacy of indebtedness caused by years of low farm-gate prices and declining productivity between 2000 and 2004.” While he contends that efforts in 2008 to raise the minimum price associated with Fair Trade and the premium for coffee through the Fair Trade Labelling Organizations International (FLO) represented a “good first step” in efforts to improve farm-gate prices, “these gains must be understood in the context of long-term indebtedness as well

as rising production costs and household consumption costs;" the "simple reproduction squeeze" that farmers experience as a manifestation of long-term indebtedness coupled with rising production costs and household consumption costs hinders producers from " 'bootstrapping' their own economic development."

While Fair Trade may represent a better alternative to a status quo in which producers are continually squeezed by market pressures and downgraded opportunities, it may fail to fundamentally address the underlying problem —of the demand for livelihood alternatives, including other crops that producers can produce to remedy both the problems of food insecurity and instability. In essence, Fair trade of a focal commodity whose broader trade is largely unfair represents only a partial solution; better trade of shadow commodities in a market contrived with justice at its core might be a better option.<sup>64</sup>

### ***6.3 Beyond Certification for Focal Commodities: Fresh Produce and Participatory Oversight***

While Fair Trade brought some level of optimism and better conditions for a subset of producers, eventually it became known that there was more "certification-worthy" coffee available than there were premiums to go around. The particular

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<sup>64</sup> Wilson 2010.

environmental conditions of Nicaragua's highland temperate forests by default grant some 95% of its coffee to be considered "shade grown"<sup>65</sup>—facilitating the cultivation of coffees highly valued for their taste. Yet, while more than 80% of the country's coffee production is classified in a superior category as "strictly high grown"—only some 15-20% is sold under premium conditions and granting producers a higher market price.<sup>66</sup> Whether producers had to be organized into cooperatives (a requirement for Fair Trade) or growing their coffee plants whilst protecting tropical forest canopy (requirements of Smithsonian's "Shade Grown" certification) or pursuing sustainable management practices as for Rainforest Alliance Certification, producers had begun to undertake actions to demonstrate their compliance with a range of environmental or social sustainability standards.

Though some producers indeed benefited from private standards, others were not compensated for their ongoing contributions to collective public environmental and social goods, which is especially relevant where producers experienced elevated costs associated with compliance. For example, learning to produce with organic fertilizers like compost may initially result in lower productivity than chemical fertilizers, thereby

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<sup>65</sup> Moguel and Toledo 1996.

<sup>66</sup> Ruben and Zuniga 2011, 101.

compelling producers to make a possibly unanticipated trade-off between the costs of inputs and possibly lower harvest amounts at the end of the season.

As described in Chapter 3, the producers I refer to are largely “uncertified, credible producers” — certification-worthy producers who are compliant in their actions yet remain uncertified — because they are either unwilling or unable to pay the costs required to upgrade — to access markets that offer premiums, like Organic, shade-grown coffee. As can be understood simply by walking through the balance sheet of one average coffee cooperative, there is little at the margins to pay for anything extra — like certification — especially if it adds yet another cost without guaranteeing a beneficial outcome in return — better market access, higher minimum prices, price premiums for high quality and/or sustainable products, or loans with better interest rates (without binding obligations). In the aftermath of the coffee crisis, the conditions of market access which were already difficult for smallholder coffee producers became even more so, as many who made their living as pickers for smallholders or larger growers found themselves entirely without a source of cash income with which to pay for daily expenses, and who otherwise lacked land on which to even grow some portion of their *canasta basica* — basic household necessities. As described in the Newsletter of the Nicaraguan Network, the coffee crisis set off a shock wave of events that destabilized

Nicaragua's small coffee growers and others that relied on the industry for a meager income:

Small growers in Nicaragua and elsewhere were in danger of losing their land; large growers were laying off permanent workers and not hiring the thousands of pickers they usually hired at harvest time each year. Coffee workers came into the city of Matagalpa where adults begged for work and the children for food. They set up camp in the parks where they fainted from hunger and several died. Nicaragua Network staff called or emailed several large non-governmental organizations in Managua and were not convinced that this work would be their highest priority.<sup>67</sup>

Immediately after the coffee crisis, local self-help groups and NGOs were among the first to respond, especially as the severity of the crisis' impact on household conditions became apparent—five families of migrant coffee pickers in San Ramon lost children to malnutrition and disease. One of these local organizations, Fundacion Denis Ernesto Gonzalez Lopez (FDGEL) immersed itself in the plight of some of the hardest hit families. They helped to stage a hunger march in the streets of the main regional city of Matagalpa as well as initiated the process of figuring out with afflicted families

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<sup>67</sup> Nicaragua Monitor (Newsletter of the Nicaragua Network), October-November 2003.

strategies for mitigating their food insecurity and livelihood situation.<sup>68</sup> At the time, FDGEL had already been working in some of the poorest communities of Matagalpa—working largely with at-risk local youth and engaging in some agricultural sustainability programs. The founders of FDGEL started the organization to honor the memory of their teenage son, Ernesto, whom they lost in an accidental shooting death; the organization readily expanded beyond its initial areas of activity centering on engaging rural youth after the coffee crisis, as its founders were already enmeshed in affected communities and responding to needs identified by *campesinos* themselves. It was one of FDGEL’s leaders who ardently voiced a profound disconnect between actual local conditions and the transnational certification schemes that Northern consumers relied upon to make more ethical and environmentally sustainable purchasing decisions. Asked about the role of certification standards in improving the livelihoods of smallholders in the region, she succinctly replied: “*El comercio justo’ no es justo*” (Fair trade is not fair). “*La certificación orgánica es para los privilegiados.*” (Organic certification is for the privileged).<sup>69</sup> From her perspective looking from the bottom of coffee supply chains up and knowing well how *campesinos* fared as coffee pickers and growers, FDGEL’s representative hinted that there might be better alternatives to transnational

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<sup>68</sup> Personal communication with FDEGL staff, Matagalpa, Nicaragua, March 2007.

<sup>69</sup> Author’s interview with FDEGL representative, Matagalpa, Nicaragua, March 2011.

private standards in remedying the underlying conditions in Nicaragua that perpetuated conditions of livelihood insecurity among its *campesinos*.

### **6.3.1 Agro-ecology and the GPAE Participatory Approach to Certification**

While the coffee crisis undermined the livelihoods of thousands, it also instantaneously reduced the costs of the next best alternative to current agricultural practices and outward, global market orientation for those engaged in coffee production. This was particularly the case for the most vulnerable groups, especially migrant coffee pickers, who were instantly without any source of cash income and often did not also have any land to produce their own food on—making them the most dependent on meager cash wages for purchasing rather than growing food. At the same time, evidence began to emerge in Nicaragua and in Central America more broadly, that the pursuit of more sustainable modes of agricultural production might be part of the path forward. Research by Holt-Giménez (2002), for example, suggested that producers engaged in agro-ecological modes of production prior to Hurricane Mitch tended to experience greater resilience and potential for productivity after it.

Following an emerging trend across Central America—bolstered by the *Campesino a Campesino* (Farmer to Farmer) movement of peasant popular education and



engagement—NGOs like FDGEL came together in the aftermath of the coffee crisis to identify alternative approaches to improving the food security of Nicaragua’s most vulnerable producers. The approaches they embraced included creating opportunities for *campesino a campesino* (farmer to farmer) knowledge sharing and empowerment across the region, centering on agro-ecological cultivation methods as well as articulating possible commercialization strategies to channel commodities other than coffee into viable markets within Nicaragua, including the formation of the GPAE network and participatory certification.

### **6.3.2 Agroecology and Smallholders as Agents of Agrarian Change?**

While the term agroecology is not common in the discourse of transnational commodity regulation, the term has garnered momentum as one that is “...providing the methodological and scientific basis for a new ‘agrarian revolution’ worldwide.”<sup>70</sup> Studies of agroecology-based production systems have demonstrated them to be “biodiverse, resilient, energetically efficient, socially just and comprise the basis of an energy, productive and food sovereignty strategy.”<sup>71</sup> As such, agroecology has been

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<sup>70</sup> Altieri and Toledo 2011.

<sup>71</sup> Altieri and Toledo 2011. See also Altieri 1995, Gliessman 1998.

increasingly popularized as an approach to agricultural development that is sensitive to both the livelihood demands of smaller producers as well as natural ecosystems—in addition to revealing the potential contributions small-scale producers around the world can make as positive agents of their own “development” and restorers of environmental systems.

Even the Food and Agricultural Organization of the United Nations has been making steps toward debunking myths about the productivity and potential of smallholder producers globally in contributing to sustainable agrarian change and a reduction in hunger and poverty globally, with agroecological methods at the core. Highlighting research findings from Pretty et al (2008), FAO declares in its promotional factsheet on sustainable pathways for smallholders and family farmers, “unlike widespread perceptions, sustainable smallholders can be really productive.”<sup>72</sup> In a large study of smallholder agriculture, Pretty et al (2008) conducted research “involving 286 projects, over 37 million hectares in 57 developing countries.” They found “that when sustainable agriculture was adopted, average crop yields increased by 79 percent. Also, sustainable systems were found more diversified, with yields often composed of more than a dozen crops and various animal products, generating higher yields per hectare.

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<sup>72</sup> Food and Agricultural Organization (FAO). 2012. Accessed on February 14, 2016. [http://www.fao.org/fileadmin/templates/nr/sustainability\\_pathways/docs/Factsheet\\_SMALLHOLDERS.pdf](http://www.fao.org/fileadmin/templates/nr/sustainability_pathways/docs/Factsheet_SMALLHOLDERS.pdf)

Higher yields mean increased household food security and higher household income, especially when money was saved through less fertilizer and pesticide use.”<sup>73</sup>

The methods proponents of agroecology employ may be humble in appearance but are profoundly informed by knowledge of how *campesinos* actually learn and adjust their own production strategies over time. As a means to encourage farmers to consider experimenting with growing fresh produce, one strategy involves building model gardens in highly visible places—along the side of major roads in rural villages where *campesinos* regularly travelled (see Figure 4).



**Figure 4: Passive Education – Building Model Vegetable Gardens, Visible from Rural Roads in Matagalpa, Nicaragua (July 2007)**

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<sup>73</sup> Pretty et al, 2008

In this respect, the producers themselves could observe with their own eyes the changes over time—and the successes of a neighboring farmer who had allocated a small amount of his land to sow with experimental crops.<sup>74</sup> Gardens often adopted the shape of symbols tracing back to indigenous ancestral populations—in Central America and Mexico—emphasizing that while this approach might be “new” to a given locality, it was in fact a “traditional” and time-tested way of doing things that derived from their own collective histories. As seen in Figure 5, Gardens of this type were often constructed through voluntary labor contributed from community members—who likewise understood the purpose of the experimental gardens and had a chance to learn about their construction in the event they too chose to construct one.

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<sup>74</sup> Personal observation and communication with FDGEL agronomists Matagalpa, Nicaragua, July 2007. As a participant-observer, I assisted with the construction of several different types of these gardens, along with international and local volunteers and community members.



**Figure 5: Model Agroecological Garden for Diversified Production in Matagalpa, Nicaragua (July 2007)**

The capital costs were low, as the rocks used for creating the boundary walls for the structures came either from elsewhere on the property where they were visible or were dug up from below the dirt on a rocky hillside. Likewise the dirt and sources for compost usually came from the same location, like chopped banana tree trunks from weak or dead plants. Adopting different structures, each of these model gardens created some form of “raised bed” for planting—which would allow for the growing of fruits and vegetables that might not otherwise succeed if sown directly in the ground without tilling or soil amendments—like carrots, other root vegetables, and tomatoes. Introducing and encouraging the active practices of composting fruits and vegetable

scraps and plant matter—so as to create a high nutrient soil amendment—also introduced *campesinos* to new sources of fertilizer to enrich and build soil microbes to improve soil quality over time (which would, in turn, improve productivity over time as well). By learning how to produce rich compost on site, *campesinos* were introduced to an agroecological method that, if adopted, could reduce the input costs associated with purchasing fertilizer, which often necessitated loans. Relatedly, the creation of local seed banks was a further addition to the repertoire of NGOs promoting agroecology; by reintroducing *campesinos* to traditional practices of saving seeds from one harvest to the next—and collectively banking them—producer communities both reduced another input cost (seeds) as well as insulated themselves through diversification from potential blights and diseases that more often affect homogenous seed sources.

### **6.3.3 Institutional Emergence: GPAE Certification**

Beginning in 2006, a large network of 44 member organizations from 11 departments across Nicaragua—*Grupo de Promocion de Agricultura Ecologica*<sup>75</sup> (GPAE), Group for the Promotion of Agroecology— began slowly advancing its own scheme to certify vegetables grown predominantly by rural smallholder producers according to

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<sup>75</sup> GPAE translates as Group for the Promotion of Agro-Ecology.

agroecological standards.<sup>76</sup> The recent proliferation of certification schemes of all stripes might create reason for pause when considering which “new” schemes are ultimately worthy of critical analytical attention. The institutional design of GPAE suggests not an outright rejection of Northern markets or modalities of regulation; instead its design reflects the translation and institutional interpretation of conventional transnational certification schemes to a particular Southern context. Rather than institutional or norm diffusion, the existence of GPAE suggests that a renegotiation of producers with markets is taking place—what I call “institutional interpretation.” Ostensibly “neoliberal” institutions, the top-down, Northern certification schemes—and the markets they promise access to—are not being rejected outright on ideological terms. Instead, producer communities and their supporters are modifying the dimensions of those institutional forms which impede their participation to create alternatives to commercialization that better meet their particular needs. In this respect, this case helps us to understand the ways that certification standards and their associated implementation mechanisms can represent tools for increasing equity and serving otherwise marginalized producers, if not also shifting the balance of power in commodity chains.

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<sup>76</sup> GPAE consists of 44 member organizations in 11 Departments of Nicaragua, as follows: Boaco, Carazo, Esteli, Granada, Jinotega, Leon, Madriz, Managua, Matagalpa, Nueva Segovia and Rivas.

### 6.3.4 The Collective Mark of GPAE

As discussed in Chapter 2, the costliness of credibility represents a major opportunity cost associated with third party certifications; with scarce resources available, producers often must choose between competing efforts to improve their chances of economic success. I suggested in Chapter 2 that *campesinos* are experimentalist in their fields with not only the varieties of crops and cultivation methods that they use but also with their institutions—in pursuit of ones that better accommodate their localized circumstances—within their resource and risk constraints.

Transnational regulatory efforts in Nicaragua helped improve the lot for some—by improving participation in governance and market access opportunities for a core focal commodity itself. But, others, like the NGOs involved in the GPAE network here, understood that the dependency on a single export crop, subject to the vagaries of global market forces, competition, and the government's related focus on these commodities for GDP has increased not relieved pressure on smallholders and other vulnerable sectors of society involved in coffee production. But shifting producers to the production of other crops is not easy or without its own risks. Firstly, smallholders and tenant farmers are already working with small parcels of land for production. Much of this land is already invested in cultivation of commodity crops or household staples of beans



and corn—leaving little room for experimentation with alternatives, especially ones that might prove key to improving household nutrition, if not also playing a key role in creating new products for production in domestic markets and international ones. As I mentioned earlier, *campesinos* can be very experimentalist—and their survival against odds and the forces, in some cases, that even sought to eliminate them, demonstrate how clever and strategic they can be to survive against tremendous hardship and in the face of uncertainty. But, the conditions to experiment need to be ripe—and things to mitigate risk put into place (among the suite of strategies for advancing engagement with alternative shadow crops is the creation of demonstration plots and centers for education where *campesinos* can together share ideas and conduct their own experiments to examine the viability of crops and how they perform, before dedicating significant areas of their own land for cultivation.

As in Nicaragua, other local and regional NGOs have tried to answer the incredibly difficult question of how to work with producers to improve their livelihoods whilst not destabilizing them at the same time. One of the profound failures of large-scale external development interventions and the related efforts by the national government to improve the position of Nicaragua in global markets has been to focus narrowly on a limited number of high-value focal commodities—like coffee and sugar.

The conditions for experimentation—including the willingness to explore alternative crops, methods and even institutions—must be contextualized within the risk profile of producers—who are often highly risk adverse because they have much to lose in the event of a failure.<sup>77</sup> But, if the conditions are right—and they can acquire information on their own terms, while perhaps passing off the costs of those experiments to others—as through watching what a neighbor does on his land first to see how it goes—or joining a collaborative effort, as on communal land, to test out different varieties and methods and see which does better, they are more willing to engage. Highly localized variables and conditions factor into what producers are willing to do—especially with regards to experimentation. Moreover, the characteristics of the particular commodities—and the ways they interact in ecological systems are core to producer’s willingness to experiment with them—not just what “price” they can get in the market, but whether they can grow these other crops intensively in a small amount of space without at once relinquishing the amount of land they have already under coffee cultivation. Moreover, crops need to be chosen for whether they can be grown adjacent to coffee or if they need high sun clearings or different soil (i.e., less acidic) to flourish. In essence, the success of a small holder in switching from coffee to another

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<sup>77</sup> Holt-Gimenez 2002.

crop—and possibly later other markets to sell that crop—is constrained by the characteristics of the interacting commodities themselves as well as other highly context specific conditions (in addition to any socio-political-economic factors that might also weigh in). As Holt-Gimenez (2006) similarly notes:

Farmer-driven experimentation is itself driven by necessity and by farmers' insatiable curiosity about the agroecological cycles, processes, and phenomena they see at work on their farm. Contrary to what many people think, traditional *campesino* agriculture is not a static set of ageless practices, but rather a dynamic, socially and ecologically interactive process made up of many small changes and adjustments as farmers respond to the vagaries of climate, variation in land quality, changes in the environment (pests, weeds, etc.), changes in labor availability, and changes in the market. Farmers, cautious yet innovative, have always worked to improve agriculture. Smallholder agriculture in particular is knowledge intensive rather than capital intensive, and relies heavily on cautious but constant tinkering....

The innovative market and regulatory institutions I discuss next—GPAE—endeavor to be highly attuned to localized circumstances and the particular risk and resource constraints of producers. In contrast to imported certification schemes and private rules seemingly devised to benefit retailers, organizations and consumers in the global North, GPAE participatory certification purports to be better aligned with the interests, needs, capabilities and resource constraints of small-scale producers. The coffee crisis lowered the costs of experimentation with new crops and alternatives—producers who had been subsisting at or near zero profitability at the end of the harvest

season were finding themselves with costs exceeding benefits. The risks of considering other possible crops to grow—both to improve household food security, as well as possible alternative crops to sell to the market—had become decidedly less. Still, *campesinos* remain risk averse, so those NGOs and community members seeking to reduce the vulnerability of the most at-risk needed to develop alternative strategies for enhancing the knowledge base of producers and opportunities to learn about new crops and evaluate on their own the possible benefits.

A low-cost certification alternative, GPAE's certification incorporates means to lower the input, compliance, and credibility costs often associated with transnational private regulations—by relying on interconnected networks of rural producer organizations and other small farmers to lower the costs typically associated with monitoring and enforcement. An approach to facilitate access to the market for farm families and producers who grow under the principles of sustainable agriculture (akin to organic standards), GPAE certification includes the following dimensions: improving soil biological conditions, preserving the environment through agro-ecological practices, protecting the flora and fauna, allowing the existence and continuity of life, using renewable local energy, guaranteeing healthy products for health and the economy; promoting equity and social justice. Under the GPAE label, producers may seek

certification for a range of goods including basic grains, fruit, vegetables, medicinal plants, processed products, live animals, meat, milk and milk products, flowers, honey, and organic fertilizers.<sup>78</sup>

According to the organization's "Regulations for Use of the GPAE Collective Mark," the creation of a collective trademark meets the need of providing the individuals or organizations affiliated with GPAE a mark to distinguish in the marketplace those agricultural products of its members produced naturally, with respect for the environment, and without the use of agrochemical products from those produced conventionally, thereby providing consumers an effective way to distinguish those goods. A national certification that signifies that the food production process is "environmentally friendly," certified products are accompanied by a colorful figurative eco-label—described as a "collective brand" by GPAE members—intending to inform the public and distinguish products with this label marketed in the domestic market.<sup>79</sup>

The GPAE collective trademark is a circular label colored yellow, orange, green and

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<sup>78</sup> See <http://www.gpae.net/>.

<sup>79</sup> The collective mark is owned by Information Services Mesoamerican Sustainable Agriculture (SIMAS), a civil partnership organized under the laws of the Republic of Nicaragua on February 1, 2003 and recorded due to its name in the Property Registry Nicaragua's intellectual response to the provisions of Law No. 380 of Trademarks and Other Distinctive Signs. However, the administration of this collective mark is done by the Commission on local markets marketing and Promotion Group of Agro-Ecological Farming (GPAE).

white—featuring a hilltop with two green leaves sprouting from the top, behind which an orange sun (or grapefruit) rises in the distance (see Figure 6).



Figure 6: “Trademark of Trust” Associated with GPAE.

In essence, the GPAE label offers a key, missing informational device for producers to signal the credibility of their actions to the marketplace—all be it a local, regional or national one. As described above, outwardly the GPAE label and certification scheme carries similar “window-dressing” characteristic of many transnational third party certifications, especially certain aspects of its branding and organizational façade. However, in contrast to most third party certification schemes, the internal, institutional architecture of GPAE reflects more the values of participating communities and the principles of a social movement advancing justice for marginalized producers and their families. Rather than concentrating on meeting standards created

by and for external audiences, GPAE's principle agenda exhibits devotion to protecting and improving the basic livelihoods of rural producer families—with emphasis on enabling rural families to gain access to the local market. GPAE emphasizes the role of the producers themselves in creating, sharing, and harnessing knowledge in service of producer communities and their interests. Specifically, GPAE envisions itself as an organization that “rescues the ancestral knowledge” of farming families to produce and consume healthy foods, ensuring sovereignty, food security and nutrition. Unlike many imported certification schemes—which might highlight producers' lack of familiarity with international markets, quality and production standards—GPAE places the focus on “ancestral knowledge,” recognizing and legitimizing producer communities as possessors and creators of valuable knowledge themselves.

Moreover, contrary to more technocratic, science and expert driven schemes—which deem as legitimate only that which has been proven by science and according to prescribed methods which have been institutionalized conforming to Western standards, the GPAE scheme draws on indigenous identity and traditional methods of production which have been learned and shared from one generation to the next as legitimate sources of knowledge and practice. This is further emphasized through related educational and political campaigns such as “*Semillas de Identidad*” (which

literally translated to Seeds of Identity)— one national, civil society led campaign taking hold in rural areas against the intrusion of genetically modified seeds and the preservation of traditional varieties through seed saving.<sup>80</sup>

GPAE's manual of procedures for participating organizations asserts that the GPAE collective trademark is not a label that certifies a standard defined, controlled and guaranteed by an external legal authority. Rather it is a "Trademark of Trust" between GPAE, their groups and affiliates and consumers. According to GPAE, the collective trademark is a national brand born of a shared vision to create links and friendship ties between peasant producer families and consumers in the construction of a society characterized by equity, consciousness, and solidarity. The goods sold under GPAE collective trademark are produced under conditions of sustainability and social equity.

As a "Trademark of Trust" member organizations are relied upon to assure the viability and reputation of the trademark when used on agricultural goods and value-added products created by producers affiliated with their organization. Verification of compliance with the GPAE standards is conducted by member organizations in various regions of the country, at a minimum of once each year. Upon fulfilling application requirements to participate in GPAE, member organizations are authorized to grant

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<sup>80</sup> Personal observation, March 2011, La Garita, Nicaragua.



GPAE certification to qualifying producers and products in their region for a period of two years. Organizations and users of the GPAE Brand have collective responsibility for assessing the progress of organizations certifying producers at least once a year — involving all or a sample of participating families receiving GPAE certification. An array of sanctions may be imposed on member organizations and producers that fail to comply with the GPAE standards while using the mark. Minor to moderate infractions are punishable with a written reprimand from the marketing commission; serious offenses will be punished with the suspension of the organizations privilege to authorize use of the mark for at least one year. Given that these organizations, moreover, operate within linked networks, reputational sanctions—including shaming—can be levied on member organizations by one another. Given the GPAE mark is national in scope, there are incentives across the network to maintain high standards and reputational credibility—and to sanction violators that fail to comply.

Finally, participation in GPAE is not only about the achievement of a viable economic livelihood for producer families; it is also political and focused on advancing the fundamental rights of its stakeholders (including the right to food security).<sup>81</sup> For

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<sup>81</sup>. See [http://www.fao.org/spfs/about-spfs/latest-news-spfs/news-detail/en/item/21686/icode/4/?no\\_cache=1/](http://www.fao.org/spfs/about-spfs/latest-news-spfs/news-detail/en/item/21686/icode/4/?no_cache=1/). See also [http://www.pronicaragua.org/index.php?option=com\\_content&view=article&id=435%3Anicaragua-](http://www.pronicaragua.org/index.php?option=com_content&view=article&id=435%3Anicaragua-)

example, in 2009, Nicaragua's National Assembly adopted a new Law on Sovereignty and Food Security, making Nicaragua one of the few developing countries to comply with the Millennium Development Goals (MDGs) associated with the UN development agenda. The grassroots political efforts of organizations like GPAE have, moreover, pressured President Daniel Ortega's government to demand further protections for Nicaraguan producers in the event of economic shocks threatening national food insecurity. Specifically, new rules require the World Bank and other international donors to contribute aid to Nicaragua in financial—not in-kind—resources, to enable the procurement of food stuffs in local markets, produced by farmers within the country. This contrasts dramatically to earlier forms of food aid, which were harshly critiqued as surplus dumping that undermined local farmers and exacerbated food and economic insecurity. One of the key strategies employed by GPAE member organizations is citizen participation; GPAE believes that developing local stakeholders in their capacity for political and economic engagement is vital to the sustainability and growth of truly democratic processes that contribute to the promotion of rural agro-ecology and viable livelihoods for citizens into the future.

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[will-be-one-of-the-few-countries-to-comply-with-the-millennium-development-goals&catid=9%3Anews&Itemid=143&lang=en](#)

Linking this chapter back to the broader framework and contributions of the dissertation, the case of Nicaragua elaborates how alternatives to commercialization—including the adoption of agroecological methods of production and participatory certification—can reduce the costs of compliance with standards over time, as producers become more adept, then reduces costs of inputs otherwise purchased with cash or credit. In addition, these approaches reduce the additional costs associated with documentation and marketing—sending a credible signal about this compliance to outside markets—by offering a low to no cost means to participate, if they commit to undertaking the various practices required.

As a solution to the credibility dilemma faced by many producers—most especially smallholder producers in developing countries—alternative institutions, like participatory certification, have emerged to redress both the high costs of participation in the coffee commodity market, especially the costs of external inputs as well as the credibility costs (certification) that can persist as a high barrier to market entry. Such institutions target the subset of problems consistently faced by small producers seeking market entry—who lack, among other things, the credibility signals and credentials to participate in markets—especially but not exclusively global supply chains that require a minimum level of validation of compliance with certain export standards.

By design, GPAE leverages the assets that *campesinos* actually have—like time, sweat equity, and materials already on hand—rather than ones they do not, like assets that can readily be liquidated into cash (i.e., land or other material goods). GPAE and its associated agro-ecological standards emerged in part as a response to the uncertain demands of global commodity markets—particularly for Nicaragua’s major export commodity, coffee—and to the transnational regulatory standards and associated certifying agents, present in the market since 1989, which some viewed as serving stakeholders other than small farmers confronting livelihood insecurity, as discussed earlier.

The design of the GPAE scheme as a form of “participatory certification” represents one remedy to this credibility dilemma faced by small producers. The caveat for producer involvement—and a key dimension that would distinguishes this form of certification from either third party certification or second party certification (more like “self-regulation)—is that producers, in principle, can only be involved in the auditing of producers with whom they have no direct connection or relationship. Producers from one community can verify producers from another community, but not other producers in their own locale. In this respect, there is a clear parallel between this form of certification and schemes like those for certifying Kosher food, for example, which rely

on the notion that others who share the same particular knowledge and expertise might, in fact, be the best people to discern whether another person in a similar situation is actually in compliance.<sup>82</sup> In this respect, the participatory institutional design leverages the capabilities of existing rural development organizations and producer networks while at the same time mediating possible opportunities for regulatory capture. In this manner, participatory certification leverages existing community assets—including increasingly linked networks of producer organizations and the *campesinos* themselves—to decrease compliance costs, monitoring and enforcement.

Unlike the dominant modes of third party certification—often imposed from the top-down by international organizations with first-world consumers in mind,<sup>83</sup> this variant of certification prioritizes the education of producers and community stakeholders regarding the substance of standards and how to meet them (including providing capacity building and technical assistance). Participatory oversight in this case purports to offer the potential of going beyond standards articulated for global market compliance for focal commodities to shift practices of producers to improve social, environmental and economic outcomes more broadly.

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<sup>82</sup> Starobin and Weinthal 2010.

<sup>83</sup> Gonzalez and Nigh 2005.

Beyond the initiative of local NGOs, like FDGEL, to foster opportunities for producers to learn agroecological methods, “missing institutions” were also key for allowing actors to innovate new regulatory alternatives in the aftermath of the coffee crisis. In this respect, the viability of the network of Nicaraguan NGOs and producer groups advancing a certification scheme for participatory certification—GPAE—were advantaged by the general absence of legal institutions for defining regulations for fresh produce grown according to “organic” standards or variants thereof, like agro-ecological standards within Nicaragua. The GPAE network and its related SIMAS network were not the only groups within Nicaragua seeking to commercialize fresh fruits and vegetables according to agroecological and sustainable criteria within Nicaragua. In southwestern Nicaragua, the NGO COPAAD similarly launched a participatory certification scheme in 2009, though their version involved not only educating and involving producers but also local citizens and likely more urban consumers about the meaning and content of organic standards. Community members learn and augment their knowledge in order to accurately validate farmers compliance; moreover, they acquire new information regarding the broader environmental and health benefits accrued to their community by organic production methods.<sup>84</sup>

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<sup>84</sup> Personal observation and communication with COOPAD staff, Diriamba, Nicaragua, March 2009 and

COOPAD is one of multiple organizational members of RENICC—a Nicaraguan alliance working towards advancing commercialization alternatives, largely based in the Southern and western parts of Nicaragua as compared to the SIMAS network—working with communities largely in the Northern, coffee growing regions of the country, and other regions with rural producers struggling with food and livelihood security. Both COOPAD and members of the SIMAS network have advanced commercialization alternatives involving standards for more environmentally sustainable agricultural development in Nicaragua. Those centrally discussed in this chapter have focused on using participatory certification of producers according to agro-ecological standards, whereas some groups in the South, including members of COOPAD, have joined a “competing” domestic movement to develop standards akin to “organic”—working towards the passage of a national organic law.<sup>85</sup> In both cases, these two competing and, at times, complementary efforts highlight the absence of regulatory institutions for governing environmental and social externalities associated with food production (and social and economic position of Nicaraguan producers within both the domestic and global marketplace).

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March 2011.

<sup>85</sup> Authors interview with leader of the Nicaraguan Organic Movement, Diriamba, Nicaragua, March 2011.

We should give careful thought to considering the extent to which GPAE's participatory certification constitutes a type of "fourth-party" certification that can serve as a substitute for government oversight. Much government commodity chain regulation could arguably constitute a form of "fourth party" regulation (as summarized in my certification typology in Chapter 2)—with oversight paid for by citizens via taxes (not the producers seeking certification) and performed by government agents, or possibly contracted third-parties as well. In sum, it is not paid for by the producers seeking oversight. This would be the case, for example, in the United States where food quality and safety assurances for the beef processing industry are overseen by government representatives of the US Department of Agriculture (USDA). In this respect, the prospect of governance substitution by GPAE certification, in lieu of public alternatives like "Organic," may only be temporal—the emergence of one institution that might later be replaced with another as administrative agencies within the Nicaraguan regulatory state evolve in their capacities for providing commodity chain oversight according to environmentally sustainable, organic or agroecological criteria. Moreover, future legislative processes may result in the passage of laws and the creation of institutions that make competing private regulators obsolete.



## 7. Conclusion and Implications

In this dissertation, I have set out to investigate how small-scale agricultural producers from the global South respond to increasing demands for compliance with transnational regulations emanating from public and private rule-makers in the global North. How and why do producers comply with the rules of other jurisdictions? And when do they challenge existing rules and innovate their own alternative solutions?

Scholars and policy-makers alike often contend that such regulations represent a viable option for regulating commodities produced in emerging economies—where incapable or unwilling states may undersupply institutions requisite for overseeing supply chains consistent with the quality, safety, environmental, or social standards demanded by the global marketplace. At the same time, advocates of schemes like Fair Trade have made the case that transnational regulation administered by private third party certifiers may be a step in the right direction—providing producers with potential opportunities to upgrade, access better markets and earn premium prices for certified products. Yet small-scale producers, unlike their large-scale business or multinational corporate counterparts, often encounter a dilemma of “costly credibility,” requiring they make a binary choice between investing in efforts requisite for achieving compliance

with the substance of standards or signaling about that behavior to the marketplace (as through third-party certification). Thus, uncertified yet potentially credible producers of a range of commodities—from coffee and honey to fresh fruits and vegetables—may be compliant by intent or by default with standards and still never receive compensation for their efforts and the positive spillover effects they contribute to local communities and the environment (i.e., protecting biodiversity by cultivating shade-grown coffee or replanting trees to minimize soil run-off and impairment to and local water quality).

As I contend in this dissertation, transnational regulation is not a panacea for the missing institutions and public goods typically provided by public authorities—the State and its bureaucracies, a functioning court system, or a dynamic local civil society. As illustrated in the case of honey, small scale producers in Mexico responded to new transnational regulations emanating out of the European Union—demands for certification of honey as free of GMOs—not by mere compliance, but by leveraging “governance gaps” among complex, overlapping rules from local to global scales—to rectify omissions in the design of institutions in a manner more aligned with local interests and preferences.

Such exogenous market and regulatory events—like the “EU Honey Crisis” and Nicaragua’s “coffee crisis”—as well as unforeseen natural disasters exacerbated and

made more salient the enabling conditions for regulatory change. Taken alone they are less likely to foster regulatory innovation and change, especially if actors are not positioned to harness these focusing events as windows of opportunities, or the crisis events themselves, such as ones propelled by global market dynamics, have complex causes that may be intertwined with other background conditions.

The EU “honey crisis” in Mexico—like the coffee crisis in Nicaragua—was a key focusing event that may have been among the necessary enabling contextual conditions for institutional emergence, but without actors actively pursuing alternative strategies related to shadow commodities, as I emphasize, these crises may have just been crises—failure cases with no prospects for shift in the status quo. As Kingdon (1984, 2003) points out, “Crises, disasters, symbols, and focusing events only rarely carry a subject to policy agenda prominence by themselves. They need to be accompanied by something else.”<sup>1</sup> In essence, crisis or focusing events “need accompaniment” to become actual windows of opportunity; such events “...reinforce some preexisting perception of a problem that was already ‘in the back of people’s minds” or serve as an early warning by calling “attention to something that could be considered a problem if subsequent consideration really establishes that there was a widespread condition that needs

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<sup>1</sup> Kingdon 2003, 98.

attention.”<sup>2</sup> In combination with other similar events, focusing events can also affect problem definition. However they might be defined, focusing events must be harnessed as windows of opportunity when they become available to advance the policy agenda forward; otherwise, the window of opportunity may close and the policy problem will fade and drop from prominence.<sup>3</sup>

In addition, the analysis offered in this dissertation has raised both positive and normative questions as to how government, business and global civil society regulate the messiness that represents the origins of many agricultural and animal products that eventually find their way into global markets—by intention or by default. As shown in the case of Mayan small-scale producers in the Yucatán, honey and other subsistence crops produced for consumption (often with uncertain surpluses that make their way to market) are consumed regionally and exported, with or without the knowledge of their producers.

Commodities, like honey and coffee, often highly prized for particular characteristics—ones that garner elevated prices in the global marketplace—are valued, among other reasons, for their origins, artisanal production, or their *terroir*—unique qualities that challenge the core notion of an interchangeable commodity. Other

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<sup>2</sup> Kingdon 2003, 98.

<sup>3</sup> Kingdon 2003, 103.

commodities—diamonds, chocolate, ivory—may, quite the opposite—become flagged for concerns related to human rights, labor or environmental abuses. Without transparency or the ability to disentangle credible information related to product origins and attributes and to assure supply segregation (a herculean if not altogether impossible task), all diamonds could be “blood diamonds,” chocolate a manifestation of forced labor, ivory necessarily bringing elephants and rhinos closer to the brink of extinction.

A range of health, safety, ethical and other concerns for consumers stem not from the whole commodities or even composed "end-products" sold to final consumers but rather to particular elements/ingredients—and their characteristics—that ultimately comprise those goods. In the case of processed foods, for example, the question may not even be about whether the product contains a minute (possibly undetectable) quantity of a given substance but whether it was even processed in a facility that at one point processed such a thing. Those allergic to tree nuts or peanuts can have adverse--possibly deadly—health reactions to even trace quantities. Likewise, those with gluten intolerance can find themselves sickened by products claiming to be gluten-free or otherwise not declaring to possess ingredients with wheat gluten. Consumers of Kosher food seek assurances that end products are, likewise, free of ingredients not considered Kosher.

To oversee complex commodity chains for the presence (or absence) of these attributes requires a suite of both public and private regulations—and further constellations of monitoring and enforcement arrangements—to assure even a minimum of compliance. Yet depending on which issue areas or values are of greatest concern to involved actors, the choice of policy instrument will vary, and even in the best cases, some issue areas and problems may be so difficult to regulate—because they are not readily observable or testable—that achieving effectiveness nears impossible.

Genetically modified organisms represent one issue area that exemplifies a multitude of complex and intersecting challenges that complicate governance—where the characteristics of the commodities (though testable) are extremely difficult to track and trace back to their point of origins, creating perpetual challenges for regulators that seek effective regulation.

Yet, it remains a values-based, normative question to determine policy priorities—those goods that demand multiple layers of transnational regulatory oversight and those that do not, or, at the very least, could be subject to alternative forms of governance or lowest common denominator solutions (country, sub-national jurisdiction point of origin) that, despite their own limitations and downsides, may foster greater inclusion of producers at the bottom of the pyramid. The rapid growth of

“locally-sourced” vegetables and products from “uncertified” farmers and producers—including most farmers markets internationally and in the U.S.—hints at a growing demand for artisanal goods produced at a smaller scale by people whose names and faces are personally familiar. This trend further hints at a willingness on the part of consumers, in some contexts, to rely on the credible threat of reputational sanctions (word of mouth) as an alternative to (or integrated with) government or private oversight. A consequence of relying exclusively on top-down institutions, like private third party certification, may risk that small scale producers—long participants in the market via complex interactions and intermediaries—be pushed out in favor of large industrial producers—who may be easier to regulate, but may also introduce other sets of externalities along the way.

In addition, this analysis has further implications for discerning possible factors upon which the effectiveness of transnational or local governance depend. Measuring institutional or policy effectiveness represents a hurdle on its own, all the more so, measuring the effectiveness of institutions promulgated by transnational actors (and for which no compulsory requirements to disclose information may exist). The efficacy of efforts undertaken by intermediaries, like third party certification, is often presumed to be independent of those efforts undertaken by rule-makers and rule-takers. Indeed, one

of the goals of “independent” certification is to create a distance from the potentially deleterious interests of rule-makers and rule-takers. Rule-makers (governments, NGOs, and business) may be incentivized to highlight their oversight successes rather than failures, rule-takers (producers) to demonstrate compliance with standards even in its absence. For some issue areas and commodities, as with promoting fire safety in garment factories, effective transnational governance appears attainable if rule-makers could just “get the intermediaries” right—the design of the intervening institutional mechanisms and selection of credible agents for monitoring and compliance.

Yet in some cases, factors beyond the control of the actors involved in governance may render an interdependence among institutional approaches and the ultimate efficacy of governance efforts. As the case of honey and GM-soy, in particular, demonstrates, governance may be as much about regulating the presence of GM materials as it is about governing the absence of GMOs. There are governance gaps and missing institutions for myriad reasons. While intermediaries—including private certifiers like the Non-GMO Verified Project—may fill holes in oversight, there are limits to what even these intermediaries can achieve without action from states or other regional actors (rooted in the commodities being regulated).



One implication of this analysis is that one cannot assume arrangements of intermediaries would work for all issue areas and all goods. The characteristics of certain products—and their supply chains—may render the effectiveness of rule-intermediaries dependent upon the existence and effectiveness of other institutions. These commodities, like honey and grains combined and sourced from multiple producers and exporters, make it difficult—if not impossible—for rule intermediaries to independently provide “effective” governance, absent other institutions or policy action. Moreover, the particular complexities of the issue area dictate the types of oversight and systems of traceability and certification and testing needed to guarantee oversight (though nothing is 100%). Though costly, complex and at times impractical, regulators can ultimately test for the presence of GMOs, whereas no test can reveal the absence of forced labor or the presence of happy chickens. In essence, governing the presence of desirable attributes in a given supply chain may be as much about governing the absence of undesirable ones.

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## **Biography**

Shana Starobin was born in Worcester, Massachusetts on January 8, 1978. She attended Harvard College, where she pursued an AB in History and Science, with an interdisciplinary focus on ecology and environmental history. At Harvard, Shana embarked on independent field research for her senior honors thesis on the politics of governing Southeast Alaska's temperate rainforests, supported by grants from the Mark Dewolfe Howe Fund of the Harvard Law School and the Harvard College Research Program, graduating *magna cum laude* in 2000. Shana moved on to pursue a career in environmental policy and sustainable development. As a scholar, practitioner and educator, she has worked with organizations in the U.S. and internationally, including American Jewish World Service, Ashoka Innovators for the Public, BRAC in Bangladesh, and FINCA Nicaragua. Shana completed joint Masters degrees in Environmental Management and Public Policy at Duke in 2008 before going on to pursue her PhD at the Nicholas School of the Environment. As a Duke graduate student, Shana received numerous competitive grants and fellowships to support her independent research and teaching, including: Research Grant from the Whitney Chamberlin Internship Endowment Fund (2007), Travel Grant from the David R. Brower Endowment Fund (2007), the Lazar Scholarship for International Environmental Leadership (2009), Kenan Graduate Instructorship in Ethics (2011), Graduate Award in Regulatory Governance from Rethinking Regulation at the Kenan Institute for Ethics (2011), Dissertation

Research Travel Award from the Duke Graduate School (2012), Graduate Summer Research Fellowship from the Duke Graduate School (2012), Social Science Research Council Dissertation Proposal Development Fellowship (2012), Center for Latin American Studies Travel Award (2012), Kenan Institute for Ethics Graduate Fellowship (2012-2014), the Ottis Green Fellowship (2013-2014), the Anne T. and Robert M. Bass Instructional Fellowship (2014-2015), and the Regulation Fellowship at the University of Pennsylvania Law School (2015-2017). Her published articles and book chapters include: "The Search for Credible Information in Global Environmental and Social Governance: The Kosher Label" (2010), "Tackling Information Problems in Agrifood Governance" (2012), "Global Companies as Agents of Globalization" (2013), and "Transnational Politics and Policy: From Two-Way to Three-Way Interactions" (2014). Upon graduation, Shana will continue as a Regulation Fellow at the Penn Program on Regulation at the University of Pennsylvania Law School before joining the faculty at Bowdoin College as an Assistant Professor of Government and Environmental Studies in Fall 2017.