REVIVING BENIN'S SHRIMP EXPORT SECTOR:

The need for an Integrated Approach

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Benin's shrimp sector collapsed following a ban on its exports to the EU. The ban was imposed in July 2003 and resulted from the non-compliance with EU food safety standards. Strikingly, the sector did not revive, despite the lift of the ban in 2005 and considerable Aid for Trade flows. We argue that the sector's dependency on the EU, Benin's poor institutional environment, and inadequate Aid for Trade have played critical roles in explaining the persistent effects of the ban.

Due to the intrinsic product-specific sanitary risk, the fishery sector is profoundly affected by the food safety standards imposed by advanced economies (e.g., the EU, the USA and Japan). In case of noncompliance, the producer faces the risk of expulsion of the product from the market, rejection of exports at the border, destruction of shipments, and, in the worst case scenario, an outright export ban. Despite the risks and costs associated with the increasingly stringent standards, fishery exports from developing countries have increased in the past two decades. This trend is in line with the view that food standards may act as catalysts that stimulate vertical integration, capacity building and innovation, thus increasing the sector's efficiency and competitiveness.

The aggregate figures hide however a great degree of heterogeneity. For instance, the case of Benin's shrimp export sector is a puzzling failure. Figure 1 shows that, upon the 2003 export ban, shrimp exports from Benin to the EU completely collapsed and remained close to zero even after the ban was lifted in 2005. In this policy brief, we discuss three questions: Why have Benin's shrimp exports not revived? What is the role of Aid for Trade? What is the impact of the export regime on the artisanal fishermen and their wives (the fishmongers)?

Why has the sector not revived? Benin exported shrimp almost exclusively to EU markets. As a result, the ban put all three shrimp exporting firms in Benin out of business, which led to their current situation of high unsettled debt. In its turn, the dependency on the EU market is explained by the underdevelopment of the regional market, as well as the size of the sector, which is limited by the capacity of the lakes and poor

regional infrastructure. The latter prevents the firms from cost-effectively sourcing from other lakes in the region, and exporting the additional supply to other advanced economies (e.g. the USA and Japan).¹

The small size of Benin's shrimp sector also played a role in another way. Complying with food standards involves fixed costs (upgrading laboratories, building landing sites and control units, training fishery experts and fishermen, etc.), which, in the case of a small sector, are shared by few actors. The potential total net pay-off from upgrading a small sector is therefore relatively low. This may greatly reduce the incentives for both firms and governments to invest. Donors, for their part, incurred huge sunk costs in an effort to upgrade the sector, building infrastructure for controlling, treating and transporting the shrimp from the lakes to the firms, but the firms and the government were hesitant to take the further steps necessary to revive exports.

Benin's institutional environment has also played a crucial role. It is undisputed that, in addition to investments in "hard" transportation and communication infrastructure, the development of a "soft" infrastructure is at least as important for the integration of countries into value chains (Grossman and Helpman, 2005; Swinnen, Vandeplas, and Maertens, 2011). These may include well-functioning contractual institutions, but also social capital and informal 'rules of the game' which are crucially important for the functioning of a supply chain

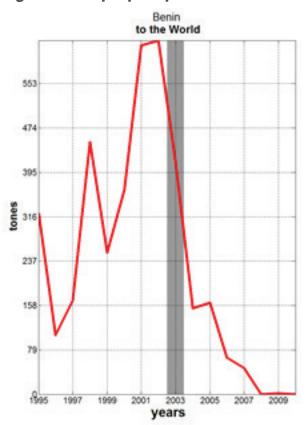
¹ Exporting to non-EU advanced countries was also not an option during the ban, because the ban was self-imposed by Benin, and therefore covered all shrimp export markets, not only the EU. (The ban was self-imposed because not having done so would have increased the risk of an official EU ban on Benin's fishery exports).

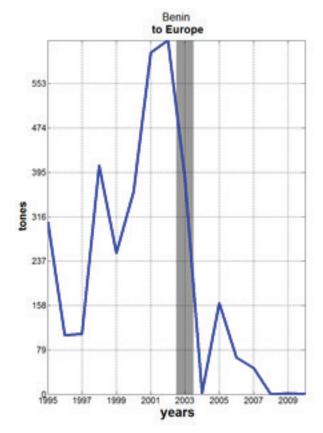
(Martinez and Poole, 2004). After all, all the actors in the chain are inter-dependent managers of the quality of the final product and the success of their combined management depends on the extent of the co-operation, information exchange and trust between them.

These attributes are in short supply in Benin's shrimp sector. For example, the fishing community is fractionalized between different ethnic groups and inter-group trust is very low (some fishermen

reluctant to provide credit to the sector, given the firms' debt, but also because they lack confidence in the capacity of the domestic actors (mainly the firms and government) to face up to the future financial and market challenges (without further extensive donor support). Besides, any changes in Benin's shrimp supply chain also involve intrahousehold bargaining, as fishermen sell to their wives, with whom they keep separate budgets. Overlooking this intra-household aspect may result

Figure 1: Shrimp exports from Benin to the World and to the EU





Sources: Data is taken from BACI database, which present the UN Comtrade database in a consistent way; see http://www.cepii.fr/CEPII/en/bdd_modele/presentation.asp?id=1, November 10, 2013

blamed other ethnic groups for the ban). Also further down in the supply chain, mistrust plays a role: following allegations of misuse of a soft government loan by the firms, the Beninese government was hesitant to continue to support the firms and was waiting for the results of an investigation by the national debt committee. The banks were also

in miscalculations about the impact of interventions in the sector. For instance, it may explain the failure of the policy to stimulate fishermen to sell directly to transfer platforms (where shrimp can be treated according to standards), because this policy effectively sidelines the fishermen's wives, not only undermining their income source, but also altering

their bargaining position in the household.

Is there a future for Benin's shrimp sector? Provided that the cold chain is respected by all the actors, the control units and transfer platforms operate, and the firms' financial situation is sorted out, Benin possesses a very well-appreciated product that, in principle, satisfies the highest food and safety norms. However, the question remains whether, given its weak institutional environment, the country will be able to keep up with rapidly evolving EU food safety norms and be able to (re)conquer the market and compete with the expanding Asian shrimp exporters of standard quality but for a very low price. Benin could seek a niche in the international market and stress the quality of its shrimp. Aiming at a high-value product would also fit well with the small size of the sector as the price premium received would justify the higher unit costs of operation and compliance. Similarly, the sector could seek added value by aiming at labels for artisanal and/or environmentally sustainable fishing (private standards). However, the demanding administrative requirements and procedures to obtain special labels require skill and expertise that are far beyond the current capacity of actors in the sector. As such, one solution could be to open up the market to international firms and design these issues at the regional level, allowing to mobilize the required (financial and human) resources, and at the same time overcome Benin's limited supply of shrimp.

Can Aid for Trade resolve these constraints? Whereas more resource mobilization would be needed to effectively address the deficiencies that triggered the ban, international initiatives can by no means be a substitute for appropriate national actions and private sector involvement. A firm political commitment at a high level is crucial to coordinate donor efforts but also to obtain trust of private investors.

But, what then is the role of Aid for Trade? While the Aid for Trade flows in the aftermath of the ban helped reducing the compliance gap, they failed to credibly upgrade the sector and facilitate private sector initiatives. Aid could have been more effective if (1) it had been more focused on capacity building of the local institutions involved so to assure the maintenance and operation of the donor-funded

infrastructure, (2) if aid had been less fragmented, and more in line with private sector initiatives. To achieve this, a central coordinator, appointed by the aid receiving country could bring the private and public actors and the various interested donors around the table and discuss the actions required and their interdependencies. This central coordinator should take as a metric for success not only the export performance but also the welfare of the small-scale actors involved in the supply chain, because these small-scale actors are fragmented, ill-organized and ill-informed, and therefore lack agency.

How were artisanal fishermen and their wives (the fishmongers) affected by the ban, and what does their future look like? A household survey conducted in 2009 points out that the stringent EU standards had a large and persistent negative impact on the income of these small-scale actors. The access to world markets, which translated into a perfectly elastic demand of exporting firms, assured daily market clearance for the fishermen. Being small, much poorer, and plagued by high transport and transaction costs, the domestic and regional markets could not take over this role. In addition. fishermen were constrained in their access to the non-fishery sector. As such, switching activities proved an effective coping strategy for only a handful of fishers and was insufficient to compensate for the loss in producer surplus. Instead, shrimp fishers engaged in competition with fish fishers, thereby compromising the future fishery stock.

While a revival of shrimp exports would therefore benefit small-scale actors, it would also raise two concerns. First, a revival of exports brings with it the risk of a renewed negative export shock, and thus the need to make households more resilient to such shocks by strengthening effective household coping strategies that are viable in the longer run and do not inflict negative externalities on the ecosystem or other households in the same community. In the case of the fishing communities, this means supporting income diversification outside the fishery sector, e.g. through micro-credit schemes and training programs that can increase the range of profitable activities that households can engage in. The second concern relates to the environmental impact of a change in the trade regime. Currently,

Benin's artisanal fishery sector is plagued by overfishing and severe environmental degradation that threatens to permanently affect the lakes' ecosystem. Partly as a response to the ban, partly as a reaction to the degradation of the lakes' resources, fishers increased their fishing effort, by fishing during more hours a day and using more damaging fishing gears. Because the artisanal fishing activity is largely unregulated, it is unclear whether a revival of shrimp exports would curb the degradation trend. After all, if renewed export market access leads to an increase in the value of shrimp, fishing effort may increase instead of decrease. There is, therefore, an urgent need for effective institutions to regulate Benin's fisheries and preserve the fishery stock for future generations. At present, such institutions are lacking and the pressure on the lake is mounting.

In sum, to revive a lucrative export sector and guarantee sustainable livelihoods, there is an urgent need for an integrated approach, that brings together public and private sector initiatives, small and large-scale actors, and short and long-term perspectives.

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TO FIND OUT MORE

- The export ban and its impact are discussed at length in the paper "The unintended consequence of an export ban: Evidence from Benin's shrimp sector", which is available as an IOB working paper 2013-11 https://www.uantwerp.be/en/faculties/iob/publications/working-papers/
- Two related studies titled "To fish or not to fish? Resource degradation and income diversification in Benin", and "Voodoo versus fishing committees: the role of traditional and modern community institutions in fisheries management" are available as LICOS discussion papers:

http://www.econ.kuleuven.be/licos/publications/discussion-papers

