



Sweet Like Chocolate? Making the coffee and cocoa trade work for biodiversity and livelihoods

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Abstract

A central challenge for sustainable trade is to reconcile the demand for agricultural commodities with the creation and protection of sustainable livelihoods and environmental protection. Systems of production and trade must meet the needs and aspirations of poor rural populations in the developing world, and produce food in a way that minimizes environmental damage. The RSPB has considered these issues through case studies of two key agricultural commodities: cocoa and coffee.

The production and export of agricultural commodities such as coffee and cocoa provides a vital supply of foreign exchange for developing country governments and a major source of income for millions of farmers in the developing world. The collapse in commodity prices over the last few decades threatens farmer livelihoods and development prospects. It also has a significant impact on the environment. This paper shows that the biodiversity effects of changing prices are highly site-specific, but it is clear that the market is not delivering environmentally or socially sound outcomes.

The paper outlines options to enhance the social and environmental sustainability of the coffee and cocoa trade, stressing the need for policy action at an international level and proposing a global fund to support more sustainable production.

1. Introduction: why coffee and cocoa?

1.1. Social and economic importance

The coffee and cocoa industries have enormous significance both for livelihoods in the developing world and for biodiversity. Both commodities are of crucial importance for the economies of developing countries. Coffee is one of the biggest commodities in legal international trade, and one of the developing world's most important earners of foreign exchange.¹ Before the recent price falls, coffee contributed more than 50% of export earnings in four countries, and up to 79% in Burundi.² Cocoa is one of the world's most important agricultural export commodities, and as such, another vital source of foreign exchange.³ Its contribution to foreign exchange varies with price fluctuations, but has been as high as 54% of export earnings in Ghana, 40% Cote d'Ivoire, and 30% in Cameroon.⁴

Moreover, both coffee and cocoa production are dominated by smallholders. This means the livelihoods of millions of households depend directly upon the international coffee and cocoa markets. An estimated 25 million families in over 60 exporting countries depend on coffee.⁵ Cocoa is the direct source of income for 11 million farmers in West Africa alone.⁶

The central position of coffee and cocoa for developing economies makes recent collapses in market prices a social and development crisis. For some farmers, world prices are now well below the direct cost of production. In Mexico, an estimated 300,000 coffee farmers have left their land in search of work.⁷ Export earnings from coffee for producer countries have been halved since the early 1990s.⁸

1.2 Environmental importance

Running alongside this economic significance, both coffee and cocoa have a critical influence on biodiversity. Coffee production covers nearly 11 million hectares worldwide, and cocoa over 7 million ha.⁹ The main production areas are in tropical rainforest zones. Given the huge value of this habitat for the planet's ecological health, their production is likely to have an environmental impact disproportionate to its area.

Importantly, coffee and cocoa can be a positive tool for biodiversity conservation. As discussed below, the system of low-intensity shade grown coffee and cocoa is often a valuable habitat. However, recent decades have seen a massive increase in the production of both commodities through expansion of the area planted and intensification of production methods. Both strategies have led to environmental degradation and the loss of biodiversity. Many of the Important Bird Areas (IBAs) identified by RSPB and BirdLife as critical for the conservation of the world's birds are now at risk from coffee and cocoa growing. For example, the conversion of forest to coffee plantations in Vietnam is threatening the Kon Ka Kinh IBA, an important area for the conservation of a number of globally near-threatened species including the Siamese Fireback (*Lophura diardi*), Great Hornbill (*Buceros bicornis*) and Brown Hornbill (*Anorrhinus austeni*).¹⁰ Paradoxically, the opposite trend of reducing coffee and cocoa production is also threatening biodiversity in cases where the environmentally valuable shade cocoa and coffee farms are being converted to different, more intensively farmed crops, or abandoned and new forest areas cleared.

The changing impacts of coffee and cocoa production on biodiversity and livelihoods are intimately connected with global trade policies and the push for economic liberalisation. This paper sets out the current state of the coffee and cocoa markets and production chains and some of the underlying policy processes. It then considers the environmental, and related social, impacts of recent changes, before presenting possible options for a more sustainable commodity chain.

2. Cocoa, coffee and international markets

The continuing declines in the price of coffee and cocoa have captured considerable media attention. Between 1980 and 2000, the prices of coffee and cocoa fell by nearly 70%.¹¹ The proximate cause of low prices is structural oversupply. Over the last 40 years, global coffee production has increased by 64%, while cocoa production has risen by 186%,¹² significantly outstripping the growth in demand. The reasons behind these trends are complex and varied. This paper focuses on some of the key issues.

- *Dependence on coffee or cocoa*

Farmers, and countries, sometimes have few economic alternatives to coffee or cocoa growing. In these cases, they may continue to increase production despite falling prices, depressing prices still further.

At national level, this cycle is driven by the need for foreign exchange. Debt repayment and the associated structural adjustment policies often force countries to focus on export-oriented agriculture. Within the export sector, dependence on coffee and cocoa results in part from the agricultural and trade policies of wealthy countries. Large subsidies to northern farmers drive down the world price for crops that might otherwise provide an alternative source of revenue to coffee and cocoa, while high tariffs on market entry (particularly for processed goods) restrict access to Northern markets for other commodities and products and limit opportunities to earn income through value-adding.¹³

At household level, diversification away from coffee and cocoa is constrained in part by a lack of resources - land, skills, or capital - to add value or move into alternative crops. This has been exacerbated by a reduction of agricultural extension support due to deregulation of domestic markets and cutbacks in government services under structural adjustment programmes. Inability to diversify is compounded by the particular nature of coffee and cocoa as tree crops. For most farmers, the trees are a big investment, the main source of income and hard to replace. Even at low prices, continuing financial dependence on the trees therefore remains high. Added to this, alternative cash crops often face similar market problems to coffee and cocoa: domestic markets are small and the export prices of many primary commodities are in long-term decline.¹⁴

- *Export promotion*

Production has been increased by new countries entering the coffee and cocoa markets in response to donor promotion of export earning activities. The IMF, World Bank and bilateral donors have encouraged diversification into new export crops, without taking sufficient account of the impact of increased global production in depressing world prices. This is particularly noticeable in the case of Vietnam, now the world's second largest coffee exporter.¹⁵

The same focus on export-led growth has characterised donor approaches to existing producer countries, with the same consequences. For example, structural adjustment under a World Bank and IMF package in Ghana included reform of the exchange rate and currency devaluation to promote exports, and led to a massive increase in cocoa production. However, because Ghana is responsible for a large share of world cocoa production, this increase flooded the world market and the price of cocoa sank. As a result, Ghana doubled its cocoa exports but earned less foreign currency for that cocoa.¹⁶

Supply has been further boosted by technical changes in production methods, resulting in higher productivity. Coffee yields have been raised in Brazil, for example, by increased mechanization, intense production methods and a shift in production away from the traditional frost-prone growing areas.¹⁷

- *Collapse of international agreements*

Between 1962 and 1989, the coffee market was regulated by the International Coffee Organization (ICO) through export quotas and a price corset. In 1989, the International Coffee Agreement (ICA) broke down due to disagreements among members, with the United States particularly reluctant to continue involvement.¹⁸ In the cocoa sector, the International Cocoa Organisation (ICCO) sought to

stabilise the market from its establishment in 1973 until the suspension of import and export levies in 1993. Although these commodity agreements were subject to many valid criticisms, they did help to control supply, keeping prices relatively stable and offering a viable return to growers. Their loss is a key contributor to oversupply. Without regulation and international coordination, producers and producer countries are more likely to seek methods for *increasing* production as a response to declining prices. In the absence of guarantees that other producing nations will restrict output, increasing output is the 'rational', albeit sub-optimal, strategy.¹⁹

- *Deregulation of domestic markets.*

The IMF and World Bank structural adjustment regimes demand liberalisation of internal markets, frequently including the abolition of commodity marketing boards. Although these boards had many problems, they did provide important services for farmers and helped to regulate the market through guaranteed minimum prices and credit. The loss of these services limits the ability of producers to withhold production from the market and reduces their power to negotiate for higher prices. Without credit, it becomes more difficult for farmers to avoid selling immediately after the harvest, when prices are usually lowest, and the absence of a government guaranteed minimum further reinforces the control of corporate buyers over prices.²⁰

- *Corporate concentration and buyer power*

Major coffee roasters and chocolate makers exercise huge market power. Both the coffee and cocoa supply chains are dominated by a few large multinationals. Trading in coffee is quite concentrated, with four large companies accounting for about 39% of the global market. However, partly because of oversupply, the coffee chain is roaster-driven, and at this stage three companies account for an estimated 45% of the market. The structure of the cocoa chain is similar. Four companies cover 40% of cocoa grindings, and a different four have a 50% share of the confectionery manufacture market.²¹

The power of these companies to influence prices has risen with the collapse of the respective international agreements, and the liberalisation of the international and national markets. As collective control of exports and stocks was lost, so the market power of the producing countries weakened, and the advantage shifted to transnational corporations. Reflecting this, the ten years after the collapse of the ICA's economic clauses in 1989 saw a surge of international mergers among roaster companies, leading to a much more concentrated industry and increased buyer power.

Processing companies have also increased their power through backward integration to trading, a process facilitated by liberalisation of national markets. This gives the multinationals more control of the supply chain and allows them to capture a greater share of the profits. The process is evident in Côte d'Ivoire, where the share of the cocoa export market taken by local exporters declined from 43% in 1997-1998 to less than 10% in 1999-2000 after liberalisation of the sector.²²

Technical changes have also played a role in increasing buyer power. New blending and processing techniques that allow the roasters to use cheaper and lower-grade coffees that would not have been traded ten years ago increase buyers' room for manoeuvre, and aggravate the problem of excess supply.²³

This market power has allowed the dominant companies to continue to increase profits while the prices paid to farmers have plummeted. In the early 1990s, earnings by coffee producing countries were some US\$10-12 billion and the value of retail sales of coffee, largely in industrialised countries, about US\$30 billion. In recent years, the value of retail sales exceeds US\$70 billion but coffee producing countries receive only US\$5.5 billion.²⁴

- *Market Volatility*

The problems caused by the overall price decrease are aggravated by the volatility of commodity prices. Coffee and cocoa prices are notoriously unstable. This is partly the result of weather variations (and so may increase with climate change and less predictable weather patterns). For example, frosts

in Brazil in 1975, 1985 and the mid-1990s exerted upward pressure on coffee prices.²⁵ However, there is evidence of increasing volatility since the 1980s due largely to deregulation in national markets and reduced cooperation at international level (discussed above). Increased financial speculation in the commodity futures markets has also contributed to greater price uncertainty.²⁶

Volatility is exacerbated by structural rigidity in both supply and demand. Both coffee and cocoa are tree crops, so unlike oil or many manufactured goods, production cannot be quickly adjusted to meet shortfalls in supply or changes in demand. The time lag in the adjustment of supply to changed demand conditions aggravates the problem of a slump, as supply becomes pro-cyclical (that is, it is increased just at the time when demand decreases).

To expand on this, if there is a coffee or cocoa shortage and the price rises, farmers may decide to plant new trees, but they will only bear fruit three to four years later. By the time the new production is ready for sale, the market may already have balanced. Thus, it will then become oversupplied and prices will fall. However, when the price falls farmers are unwilling to reduce production, and still less to cut trees down (a situation encouraged by their investment in trees and the lack of livelihood alternatives noted above). Consequently, an oversupply can hang over the market, keeping prices low for years before farmers finally decide to reduce supply.

On the demand side, the concentration of both cocoa and coffee processing among a small number of firms noted above gives these companies the market power to raise retail prices when there is a shortage and reduce them slowly, if at all, when there is a surplus. Consequently, falling international prices are not accurately reflected in retail prices, there is no increase in demand in response to oversupply, and the surplus is not reduced.

This rigidity in supply and demand means that prices for coffee and cocoa are unstable not just during the course of the year but, more importantly, over the six- or eight-year length of the business cycle. Low prices and gluts are exaggerated, as are high prices and shortages at the other end of the scale. When prices do move, they can go up or down very rapidly due to this inflexibility in both supply and demand.

The volatility of coffee and cocoa prices greatly hinders government development planning, frustrating macroeconomic management and investment²⁷. It generates huge livelihood insecurity for producers, and particularly hurts the small-scale farmers and cooperatives that cannot manage risk because they lack access to insurance or futures markets.

In sum, liberal economic and development policies promoting market deregulation and a narrow concentration on export-orientated agriculture mean that, despite low prices, production has continued to expand in many areas, increasing competition and placing further pressure on prices. Alongside their drastic implications for producer livelihoods and government development efforts, these policies and their reflection in market prices have serious consequences for the environment, especially biodiversity.

3. Coffee and cocoa and biodiversity

3.1 Production and the environment

3.1.1 *Shade versus sun production*

As suggested earlier, coffee and cocoa can be grown in a way that is environmentally preferable to some alternative land uses. Traditional low-intensity production methods involve the planting of cocoa trees or coffee bushes under a selectively thinned canopy of existing rainforest trees. These shaded systems can support a high level of biodiversity and are comparable to pristine forest for non-specialist taxa. In landscapes with little natural cover left, shade plantations represent a vestige of more complex habitats, support high biodiversity relative to surrounding landscape types, and can support large numbers of threatened species. Of particular interest to Northern consumers, shade coffee and cocoa are an important habitat for wintering migrant bird populations, for example redstarts (*Setophaga ruticilla*), solitary vireos (*Vireo solitarius*) and the summer tanager (*Piranga rubra*).²⁸

Shade production also has benefits for producer livelihoods and well-being. Low-intensity shade systems tend to incorporate a variety of crops and provide farmers and their families with a variety of products, including firewood, construction materials, traditional medicines and food.²⁹ The additional crops make farmers less reliant on one commodity and reduce their vulnerability to falling market prices.

Over the past few decades, increased competition among farmers and between countries and the promotion of export agriculture have encouraged a move away from shade systems towards more intensive production methods. In the drive to raise yields, shade cover has been cleared to make way for monocrop full sun production. Forty per cent of the land planted to coffee in Mexico, Colombia, Central America and the Caribbean was converted to sun production in the early 1990s.³⁰ Intensive systems are perhaps particularly characteristic of new market entrants. In Vietnam, all coffee is grown in full sun systems as there is no history of shade production in the country. This intensification has considerable negative environmental and livelihood impacts:

- *Direct loss of species biodiversity.* Clearance of shade trees brings a loss of structural vegetation diversity and greatly reduced biodiversity. For households, the simplification of plantations increases the economic dependence of farmers on coffee or cocoa by reducing secondary production (for example, firewood, timber, medicines and fruit) to near zero³¹.
- *Increased use of pesticides.* Heavy and generally under-regulated pesticide use is an integral part of full sun systems. Whether used in shade or sun systems, pesticide application in coffee and cocoa production can have adverse impacts on the environment and human health. Many of the chemicals used, such as chlordane, endosulfan and DDT, are banned in the countries that consume most coffee. Poisoning from pesticide contamination is common amongst plantation workers.³²
- *Increased use of fertilisers.* Full-sun systems necessitate greater use of water and nitrogenous fertiliser. This can increase soil erosion and acidification, bringing a loss of soil fertility, pollution of drinking water, and damage to aquatic habitats. The increased soil erosion associated with full sun plantations can also cause devastating landslides and flooding during weather emergencies.³³

Broadly, then, shade systems are associated with more wildlife, less environmental damage, greater livelihood security, and better household health. They can also be regarded as more economically sustainable. The structural and biotic diversity of shade systems aids pollination and the biological control of pests and diseases. Full sun systems are more vulnerable to damage from pests, and have encountered secondary pesticide problems. In Malaysia, the conversion of shade cocoa to intensive, full sun production placed significant ecological stress on the cocoa trees, which became susceptible to a number of diseases. This contributed to the collapse of the industry.³⁴

Nevertheless, while shade systems often do hold benefits over full sun production, there are important distinctions within this broad picture. Shade plantations vary greatly in their suitability as wildlife habitats depending on the species of shade trees and the management intensity. In general,

systems that aim for increased structural and floristic habitat diversity (e.g. modified natural cover instead of planted monoculture shade, limited canopy pruning and low external inputs) are most beneficial for biodiversity. The size of the plantation and its distance from remaining forest are also important variables. Shade farms near forest remnants tend to support a higher level of biodiversity than isolated plantations, indicating the importance of wildlife corridors.³⁵

What is more, even when new plantations are shade-planted and environmentally sensitive, the biodiversity impact of any expansion of production into forested areas is likely to be negative. Biological forest specialists (particularly forest raptors, terrestrial insectivores and large frugivores) tend to suffer from any conversion of primary forest. It is important to remember that coffee and cocoa remain net contributors to deforestation, and even shade plantations cannot be considered ecologically equivalent to old growth forest.

Environmental problems can also arise if plantations are deserted, particularly given that abandonment is often accompanied by clearance of previously undisturbed forest. Research in abandoned cocoa plantations suggests that abandoned plots are unlikely to support as much biodiversity as natural forest, with forest-dependent species being worst affected. Additionally, abandoning coffee plantations and leaving the crops unharvested can cause serious plagues and infestations of pests the following year, making it difficult to reinitiate any agricultural production.³⁶

3.1.2 Biodiversity impacts of market conditions

Farm practices respond to policy and market signals, such that biodiversity on the ground is intimately connected with the fortunes of the coffee and cocoa markets. World prices influence both the overall acreage of production and the ratio of sun to shade systems. However, the impact of market signals is highly context dependent and conditioned by many other factors, particularly the options available to farmers and the existing state of land use.³⁷

In general, high prices stimulate an increase in the area under cultivation and intensification. Higher returns compensate for the costs of pesticides and shade tree removal, so it pays producers to intensify production. In Colombia, rising world prices during the 1970s led to the conversion of 220,000 ha of traditional coffee agro-ecosystems into low-shade or full sun production.³⁸ A more recent example comes from the Cote d'Ivoire, where an increase in farmgate prices related to currency devaluation spurred a massive increase in cocoa production in the mid-1990s. The area under cocoa cultivation rose from 1,500,000 ha in 1994 to 1,950,000 ha in 1995.³⁹ Production spread into protected forest areas, roughly one-third of which were occupied by cocoa farmers in 1997.⁴⁰

However, even in times of high prices, many producers still lack the resources to expand or intensify their farms, and continue with shade production. Moreover, depending on the type of intensification and pre-existing problems, intensification as a result of high prices may have some positive implications for biodiversity. In the Soubré region of Côte d'Ivoire, for example, increased fertiliser use due to a rise in producer prices in the mid-1990s appears to prolong the life of existing cocoa plantations, so reducing abandonment of old farms and consequent clearance of old growth forest for new plantations. However, this outcome depended crucially on tighter government protection of the forests, which reduced the possibility of further migration to new areas.⁴¹ Similarly, in Sulawesi, higher producer prices and the greater availability of herbicides have increased farmers' interest in replanting cocoa on grassland and other supposedly degraded land. This reduces clearance of new forest land, and could also contribute to biodiversity in other ways, since the cocoa farmers are increasingly using agroforestry techniques for replanting.⁴² In both cases, increased chemical use could have downstream consequences for human health and the environment, and the overall ecological impact is uncertain. To benefit both local livelihoods and the environment, it is clear that producers must receive a price that enables investment in the most ecologically sustainable production methods. However, as the example from Cote d'Ivoire in particular demonstrates, viable returns for producers must be accompanied by effective complementary policies that promote environmentally sound production and protect biodiversity.

During periods of low international prices, a concern more relevant in today's context, cocoa and coffee growing becomes less profitable. Where farmers have the resources and options to diversify, coffee and cocoa may be replaced by other crops. Thus, in response to the recent falling prices, farmers in South America and Africa are converting shade-grown coffee and cocoa to pasture or crops such as sugar cane.⁴³ The conversion of shade plantations implies a loss of forest cover along with all the organisms that depend on this habitat. In addition, the new crops may not be adequate for the soils and slopes in coffee and cocoa regions, and their introduction risks causing serious erosion problems.⁴⁴

One example comes from the cocoa-producing region of Bahia, in Brazil. This region houses a large proportion of what little remains of Brazil's Atlantic rainforest, one of the world's most important and most threatened wildlife habitats. Much of this forest now survives as heavily-shaded 'cabrucagem' cocoa plantations. Partly due to the low market price, 30,000 ha of cocoa trees were felled in Bahia between 1992 and 1996, and recent estimates by Conservation International suggest that 15–20% of the cocoa forests in Bahia will be logged and converted to pasture and other more environmentally damaging agricultural practices in the next 10 years.⁴⁵

Some of the potential problems for the coffee industry resulting from these trends are evident in Ethiopia. Here, as elsewhere, the price decline is leading farmers to convert shade coffee to monoculture production of other crops. The loss of Ethiopian coffee plants has critical implications, since Ethiopia is the only centre of origin and diversification of Arabica coffee, and as such an important source of genetic resources for the world's coffee industry. Ethiopian shade coffee is also particularly important in terms of wider biodiversity, as the production system is based on minimal intervention in natural forest habitat and displays an extremely rich variety of species. The livelihood impacts of these changes are already becoming evident in southwest Ethiopia, where deforestation is estimated at 10,000 ha/year in coffee growing areas, bringing massive soil erosion and threatening the subsistence farming community.⁴⁶

Low prices have also caused farmers to abandon rather than convert their coffee or cocoa farms. As noted in 3.1.1, abandoned plantations are unlikely to support the same level of biodiversity as natural forest, and abandonment is often associated with clearance of new forest areas for cultivation. This is evident in Kenya. Low coffee prices, combined with regulations that prohibit the destruction of coffee plants, are leading coffee farmers to abandon their coffee plots in search of land on which to plant alternative crops, resulting in encroachment on forest areas.⁴⁷

However, as with increased production, the biodiversity impacts of reduced coffee or cocoa growing vary from case to case. In response to low prices, the area of coffee production in Vietnam has been reduced by 30,000 hectares.⁴⁸ The environmental impact of this will be very different to the loss of cocoa forest in Brazil, since Vietnam's coffee is currently grown under intensive full sun conditions with minimal biodiversity value. Moreover, the environmental value of the remaining coffee plantations may increase as the Vietnam Coffee and Cocoa Association is encouraging a move into higher quality production as one strategy to combat falling prices, including towards organic and shade grown varieties.⁴⁹

Nevertheless, the extent to which this advice will be followed remains to be seen. Farmer options also shape the impact of price changes. Where growers lack the resources to diversify and so remain in coffee or cocoa production despite falling prices, declining returns can stimulate expansion of the cultivated area or intensification as farmers struggle to maintain income. In Vietnam, many farmers are still in debt from moving into coffee production, and find it difficult to raise more capital to move to a new production system or crop.⁵⁰ Indeed, far from diversifying away from coffee, growers are increasing fertiliser use on their farms in an attempt to boost yields and meet debt repayments, and in the process furthering both environmental damage and their own indebtedness.⁵¹ In Sumatra, low prices have brought the spread of coffee farms and further encroachment on the Bukit Barisan Selatan

National Park, home to the last remnants of Sumatra's lowland forest.⁵² Within existing farms, shade plantations may be degraded as the need for income drives producers to cut down and sell the shade forest as timber or firewood.⁵³

In India, low prices have encouraged coffee growers to remove shade trees to sell as timber, leading to deforestation and loss of ecological balance. This has serious repercussions for biodiversity, since the Western Ghats where coffee is grown are rated as one of the 14 most sensitive ecological areas in the world.⁵⁴

Beyond the direct environmental impacts of prices at farm level, there are also indirect environmental impacts. In Cameroon, the fall in cocoa prices and consequent squeeze on government revenue has contributed to substantial cuts in civil servant salaries, freezes on employment, tax hikes and a reduction in the number of state employees. Many public workers who lost their jobs or faced salary cuts responded by increasing food crop production to compensate for lost income. This in turn led to a very significant increase in forest clearance.⁵⁵ Another example comes from Côte d'Ivoire, where the price crashes of cocoa and coffee during the 1980s and early 1990s increased deforestation for timber production as the government sought to make up for the loss of revenue from its two traditional cash crops.⁵⁶

This range of impacts suggests that there is no singular relationship between biodiversity effects and market price: the response to price movements and impacts on biodiversity are case specific, and there is no optimal world price from an environmental point of view. It is clear that the market on its own cannot ensure environmentally sound production. The balance between maintaining and promoting beneficial shade production, discouraging expansion and intensification of plantations, and supporting producer livelihoods is delicate, and too complex to be achieved through any one simple market intervention. It demands a wide-ranging, context-specific and considered response. The policy implications of this are discussed below.

3.2 Consumers and the environment

At the opposite end of the commodity chain, consumer choices also affect the biodiversity value of production. Fair Trade, organic and Bird Friendly coffee and cocoa are emerging as niche market sectors. The basics of Fair Trade schemes are well known. They usually involve a company or NGO helping to set up producer co-operatives and agreeing to purchase a proportion of their coffee or cocoa at a guaranteed fair price, thereby creating a more direct link between producers and consumers and providing farmers with greater economic security. Price premiums can be used to offset additional costs (for example, certification) and to help the community with other income generating and social development projects. Many schemes also provide farmers with affordable credit and promote sustainable farming practices.

The term 'Bird Friendly' has been trademarked by the Smithsonian Migratory Bird Centre to describe coffee grown in Latin America under defined environmental criteria, including a minimum percentage of shade cover, promotion of diversity by limiting the proportion of *Inga* trees in the canopy, and use of organic methods.⁵⁷ Other labels that promote environmentally sound coffee production include the Rainforest Alliance Certificate, which specifies a diverse shade cover of native tree species. SalvaNATURA, the BirdLife partner in El Salvador, uses this label in a programme to support sustainable coffee cultivation in buffer zones and biological corridors.⁵⁸

Although consumers pay what seem like premium prices for these products, in reality they are paying closer to the true costs of production as they 'internalise' some of the environmental and social costs that are usually excluded from the price.

Whilst the rapid growth of these sectors in recent years is encouraging, they remain a tiny proportion of the wider coffee and chocolate trade and look set to remain niche markets in most developed nations. Organic coffee accounts for just 0.9% of the US coffee market, and less than 1% of total UK

chocolate sales are FairTrade. The vast majority of consumers still choose not to pay any price for the environmental damage that their coffee and cocoa consumption is causing.

3.3 The failures of liberalisation?

This situation demonstrates some of the inherent flaws in the assumption that market deregulation and dismantling of trade distorting practices always lead to greater 'efficiency'. Unregulated markets do not take into account public goods. The social and ecological costs of trade are not reflected in market prices, but are instead passed on to the environment and society. Consequently, in some situations, the market alone produces highly inefficient outcomes - in this case, biodiversity loss, soil erosion, contamination of drinking water, pesticide poisoning, and displacement of rural communities. If the market is to work for the public benefit, some form of government or intergovernmental intervention is an absolute necessity.

Even from the viewpoint of pure economic efficiency, theory and practice suggest that such intervention is justified. Numerous features of the coffee and cocoa markets make them very different from the 'perfect' markets that conventional economic theory predicts will work well of their own accord. The unequal balance of market power and structural rigidity of supply and demand create classic cases of 'market failure', and the commonly agreed remedy for that is official intervention. As noted by UNCTAD, the persistence of the problems of commodity dependence suggests that markets on their own have not been able, and cannot be expected, to solve the problem.⁵⁹

4. A possible strategy

4.1 The need for policy action

There have been numerous international commitments to address the problems faced by commodity producers and to stem biodiversity loss. As yet, however, governments have shied away from concrete international actions, perhaps due to the constraints imposed by IMF, World Bank and WTO, the failure of some past government interventions, a desire to provide consumers with the cheapest possible goods or the resistance of powerful vested interests in the commodity industry.

Nevertheless, although firm international action is lacking, there has been increased attention to the commodity crisis over the last few years. Several possible initiatives have been put forward. Among the most notable is the work of the Global Alliance on Commodities and Coffee (GLACC), a group of coffee growers and development organisations in producer and consumer countries led by Oxfam and launched in September 2002. GLACC calls for immediate global action to increase producer prices through a Coffee Rescue Plan, involving the destruction of coffee stocks, a fund to help farmers diversify away from coffee, and commitment by roaster companies to trade only in coffee that meets basic quality standards and to increase the amount of coffee they buy under Fair Trade conditions. GLACC also demands a longer-term Commodities Campaign, including mechanisms to manage supply and demand and promotion of sustainable natural resource management.⁶⁰ The Coffee Rescue Plan supports another recent initiative, the ICO's Quality-Improvement Programme. This aims to eliminate the current surplus and restore a better balance between supply and demand by eliminating low grade coffee from the market.⁶¹

Other valuable developments include the recent WTO submissions by commodity producing countries in East Africa. Joint papers by Kenya, Uganda and Tanzania in 2003 have highlighted the depth of the crisis and called for increased WTO action to address the issue.⁶² Notable political action in consumer countries includes resolutions by the European Parliament and the US House of Representative to address the coffee crisis.⁶³ A sustainable solution will depend on the corresponding governments turning words into action, and working with and supporting proposals from producer country governments, international commodity organisations, and civil society groups.

4.2 RSPB policy recommendations

4.2.1 Introduction

The wide variety of proposals for dealing with the commodities crisis have not all been reviewed in detail by the RSPB. There will be overlaps and also differences between policy recommendations developed by the RSPB and the work of other organisations. This is clearly an area for further investigation and partnership. In particular, we hope to find ways to strengthen the environmental component of proposed initiatives and develop the potential synergies between biodiversity and sustainable livelihoods. For example, how might environmental considerations be incorporated in the ICO's quality standards? What alternative livelihoods might be promoted under the GLACC Rescue Plan? And how should governments promote sustainable natural resource management, as suggested for GLACC's longer-term Commodity Management Initiative?

BirdLife International's knowledge and contacts can help to provide some of the answers to these questions (see endnote). The partnership has considerable field experience in coffee and cocoa producing regions. In Brazil, for example, BirdLife has been working with the Instituto de Estudos Sócio-Ambientais do Sul da Bahia (IESB) to assess socio-economic and environmental conditions as a basis for designing management strategies that can protect the Atlantic rainforest. Interviews with landowners and field surveys of forest quality indicated that an integrated system is most appropriate, involving a Private Reserve of core forest and maintenance of the cabruca cocoa system around the forested area. Elsewhere in Brazil, BirdLife is working with farmers to move to organic cocoa production and maintain patches of original forest on their plantations. Such experience will be valuable in formulating sustainable production strategies in different areas.

4.2.2 Sustainability Fund

The RSPB's core policy proposal is the establishment of a global fund to support more sustainable coffee and cocoa production. The need for financial support to counter the commodities crisis is widely recognised, and the idea of a global fund has been put forward by a diverse range of other stakeholders. For example, GLACC and the UN General Assembly both propose a fund for diversification (the former focused more on farmers, the latter on the national level), and Swiss coffee consultant Walter Zwald has called for a fund to promote coffee consumption and improve social conditions for producers.⁶⁴ For long term sustainability, it is essential that such proposals are developed in a way that reflects biodiversity concerns. Thus, the fund must focus on environmentally sound production and livelihood strategies.

4.2.3 Operation of the Fund

A trust fund could be governed under the auspices of the GEF, or the existing International Commodity Bodies. It could then be used to support sustainable production systems in developing countries. Project proposals would be submitted by commodity producing organisations, official bodies such as the ICO, governments or NGOs. An administrative board including representatives of different stakeholder groups and individuals with social and environmental expertise would select and approve projects.

It is important that the programme avoids a 'one-size fits all' approach. The huge diversity in production conditions and market reactions, shown earlier, demands a similar diversity of policy responses. Projects should be tailored to local conditions, using local decision-making and knowledge to arrive at site-specific solutions. However, some specific strategies and practices that could qualify for funds could include:

- *Maintaining existing shade production and converting from sun to shade production*

In El Salvador, a GEF-funded project is countering the conversion of traditional agroforest coffee farms to sun or monoculture shade production. The BirdLife Affiliate, SalvaNATURA, together with the Rainforest Alliance, National Foundation for Coffee Research and Ministry for Environment, is working with local coffee producers to improve the environmental and social conditions on their farms. Guidelines for sound coffee production have been developed, and these are used as a basis for certification of the coffee as sustainably managed. Certification has improved market access for

farmers, and protection of shade-grown coffee helps to provide crucial biological corridors and buffer zones for the areas surrounding national parks and reserves.⁶⁵

- *Encouraging multiple cropping within shade systems*

In Costa Rica, the Talamanca-Caribbean Biological Corridor project is supporting sustainable shade cocoa production, and activities include the promotion of agroforestry, greater structural complexity of canopy cover, and non-cocoa shrubs that can provide secondary products. A participatory programme for monitoring biodiversity shows that the project is conserving the biodiversity of cocoa plantations and increasing the importance of cocoa fields as habitat and corridor for wildlife biodiversity. Moreover, it has prevented the expansion of cultivation systems that require agrochemical inputs, and farmers implementing the project activities have doubled their yields.⁶⁶

- *Minimising external input use (e.g. through integrated pest management).*

Various methods for sustainable control of pests and diseases are available. For example, non-pathogenic fungi can be applied to cocoa trees to counter the infective spores of disease-causing fungi. In Ghana, certain species of the fungus *Trichoderma* have been found to inhibit growth of the black pod, a serious fungal disease in Africa. A commercial formulation of *Trichoderma stromatiicum*, developed in Brazil, is on the market to control witches' broom, a particular problem for cocoa production in South and Central America. Farmers are using the technology enthusiastically.⁶⁷

- *Setting aside conservation zones in the most ecologically important areas*

Protected areas an important feature of the BirdLife project with IESB in Brazil noted above. The project intends to create a 500-hectare private reserve in the Serra das Lontras that will function as a command centre to help landowners manage their forested areas and facilitate organic cacao certification. BirdLife and IESB are also working with the Brazilian government to create a 5,000-hectare federal reserve that would preserve the integrity of the entire targeted area.⁶⁸

- *Replanting existing farms rather than clearing new areas of forest*

Developing strategies to promote replanting and rehabilitation will require considerable agronomic and policy research. A workshop organised by the Smithsonian Institute identified some of the questions needing study.⁶⁹ For example, how can policies improve the ability of small producers to secure long-term tenure and resource rights for farms they work? Do tax, price, credit and subsidy policies provide appropriate tools for promoting sustainability and, if so, what package would provide the best and most affordable incentive for sustained cocoa production on existing lands? What agronomic techniques are most effective in replanting lands by small holders? Some of this research is underway, for example, Cadbury funds some research into methods for replanting in abandoned cocoa areas,⁷⁰ but more funding is needed to support such research, and to implement suggested recommendations.

4.2.4 Sources of Funding

There are various options for financing a global fund, and agreement on specific mechanisms will require further discussion among all stakeholders. However, the agreed strategy must recognize the responsibility of developed countries for funding biodiversity conservation.

Biodiversity can be viewed as the infrastructure supporting a flow of ecological goods and services such as climate regulation and nutrient recycling - functions upon which human society depends. Unrecognised in market prices, biodiversity loss is a negative 'externality' which must be paid for. Given the enormous global benefits of the preservation of biodiversity and reduction in forest conversion, there is a clear case for developed country funding to protect these global public goods.

Developed countries must follow up the commitments made at Rio in 1992 and reaffirmed at the World Summit on Sustainable Development (WSSD) in 2002 to 'common but differentiated responsibility' and 'new and additional resources' for sustainable development. Support for a global

fund would also back the Millennium Development Goals of poverty eradication and environmental sustainability, and the Convention on Biological Diversity Conference of Parties target of halting biodiversity loss at global, regional and national level by 2010. It also fits with other Rio Principles upheld in Johannesburg, including the need to change unsustainable patterns of production and consumption and to internalise environmental costs. Global action on coffee and cocoa relates particularly well to Paragraph 95 of the Johannesburg Plan of Implementation, which calls on the international community to build the capacity of commodity-dependent countries to diversify exports and to address the instability of commodity prices and declining terms of trade.

Various options for capitalising the fund exist. Many of these are equally applicable to other commodities or for other public goods. They include:

- *Official donor assistance*

As noted above, developed countries must contribute to the resources required for sustainable coffee and cocoa production. This assistance could be through bilateral aid projects, including support under poverty alleviation strategies. It could also come through multilateral assistance: the proposed measures would qualify for funding under a number of World Bank and UN projects, given the emphasis on biodiversity conservation and sustainable livelihoods. However, it is vital that support for more sustainable commodity production does not divert funds from existing official development assistance. At present, aid for international development is nowhere near the UN target of 0.7% of national income. Donor countries must increase their contributions in line with the commitments made in Johannesburg and Monterrey, and ensure that aid is genuinely directed at support for poverty reduction and sustainable livelihoods rather than tied to donor country interests. One potential basis for allocation of the financing burden among donor countries is their share in developed country commodity imports from affected developing countries, as suggested by the UN General Assembly.⁷¹

- *Tax on currency transactions*

A tax on all foreign exchange transactions, as first proposed by James Tobin to discourage short-term speculative capital movements, could provide considerable resources for global purposes. The International Coffee Coalition has suggested such a tax as one means to finance a Coffee Fund.⁷² Given the sheer size of the foreign exchange markets, conservative estimates suggest the tax could yield from \$150-300 billion annually.⁷³ Even the lower figure is roughly three times the amount of official development assistance going to developing countries from the OECD countries and multilateral agencies. A subset of this could be a tax specifically on transactions in commodity futures markets, or further restricted to the coffee and cocoa sectors. The revenue raising potential of this would depend on the rate and extent to which speculators were discouraged from entering the market. Currently, Taiwan is the only country that levies a tax on transactions in its futures market, but such a measure was proposed in the US President's 2003 budget proposal.⁷⁴

- *Border Tax*

An import or export fee provides a further means of generating funds. An export charge has been proposed by commodity analysts and the UN General Assembly, which recently suggested the ICO consider imposing an export fee that could be used to help alleviate poverty arising from low coffee prices.⁷⁵ An export tax on the commodity in question could be imposed by national governments, with the level of tax coordinated and agreed by all exporting countries. This would raise the price of the product and generate income that could be used to finance sustainability measures. Such a tax is permitted under WTO rules, but opposed by the IMF and World Bank as distorting markets.⁷⁶

Beyond its fund-raising potential, a border tax could be an important fiscal incentive for sustainable production. Linked to certification schemes, the tariffs could be lower or zero for sustainably produced coffee and cocoa. Nevertheless, implementing this in a pro-poor and sustainable manner would require a complex policy design and support from supplementary measures.

- *Direct industry contributions*

Many stakeholders have stressed the need for action by the coffee and cocoa multinationals, including the provision of substantial financial resources. The huge and rising profits of the roasters, processors and retailers at a time of increasing hardship for producers provide clear justification for such contributions.

One mechanism for voluntary contributions from the industry was proposed by Walter Zwald, noted above. Zwald suggests that coffee roasting companies could contribute US\$1.20 per standard 60-kilo bag to a Fund (though the amount could be varied to levels that would command the greatest support). Roasters participating in the scheme could report quantities used or imported four times a year with contributions to the Fund account two months after the period covered by the report. Participation in the Fund would allow roasters to use a special coffee fund label that could be used to promote their product. It is estimated that this strategy could create a fund of US\$80 million per year.⁷⁷

Zwald's reliance on voluntary contributions is based on the benefits of his proposals for use of the fund to enhance the coffee industry's economic future, for example, increased consumption and improved handling to meet food safety regulations. Support for measures without immediate economic returns for the multinational companies may be more limited, although the improved image of the coffee industry and marketing opportunities resulting from support could be an important incentive.

In the absence of voluntary donations, one way to capture industry contributions could be an internationally agreed windfall tax levied by national governments on large coffee roasters and chocolate makers. While politically challenging, such a tax was proposed by Oxfam as part of a solution for the coffee crisis, linked to use of the resulting funds for stock destruction.⁷⁸ Implementing and enforcing this strategy depends on government action and bold political initiative in the countries where the TNCs are based.

- *Perverse subsidies*

The vast public expenditures on environmentally perverse subsidies are a significant constraint to conservation. These subsidies lower resource prices to below market levels, and so encourage production and consumption behaviour that threatens biodiversity. Global spending on subsidies that are both economically and environmentally perverse is estimated at between \$950 billion and \$1950 billion each year.⁷⁹ Removing perverse subsidies could decrease the rate of biodiversity loss, promote sustainable resource use, and, most relevant for a global fund, enable increased generation of revenue for activities that promote conservation. Reallocating a minor fraction of total subsidies expenditures would make a huge contribution to funding needs.

Rather than subsidising environmentally harmful inputs, governments should instead seek to tax them. In this way, funds could be generated through taxes on pesticides, as proposed for coffee by the Smithsonian Migratory Bird Centre. This would be a means of 'internalising' the costs to the environment and human health that result from pesticide use. With assistance from international economic institutions, national governments could decide whether to levy the tax at point of sale, regulation or import. Useful precedents for taxing agricultural chemicals exist in several developed countries, and a tax on pesticides has been used successfully as part of pesticide reduction policies in several European countries.⁸⁰ The European frameworks would have to be adapted to developing country situations and accompanied by capacity building for low external input production methods to ensure that the tax was pro-poor. However, pesticides are currently often overused, so the tax could increase efficiency and reduce the cost of pesticide inputs. Indeed, the organic market demonstrates that chemicals are not key inputs for either coffee or cocoa production. In addition, the tax would fall

primarily on the bigger farms and plantations and richer producing countries since many poorer producers already make little use of chemical inputs.

- *Investment*

Investment of revenues by national governments in producing countries to save money for conservation measures is a possible complementary measure. Such a strategy was adopted in Colombia. The government used savings from the 1990 elimination of the European Community's four percent tariff on coffee imports to establish an Ecological Fund for Coffee Zones. The interest from the investment of these revenues now supports projects such as integrated watershed management, composting of municipal garbage, water treatment, community development and environmental education. The Fund is overseen by the Federación Nacional de Cafeteros de Colombia.⁸¹

4.2.5 Further supporting measures

In addition to their value for biodiversity, the environmental practices noted in 4.2.3 could have immediate economic benefits. For example, the promotion of diverse shade production systems is likely to increase farmers' security and resistance to price shocks. Such diversity at the local level could be just as important for poverty outcomes as economic diversification at the national level. However, if farm-level diversity does not adequately insulate communities from price instability, a Sustainability Fund could also support the establishment of insurance schemes and co-operatives.

The measures supported by the Fund to enhance environmental sustainability could also help address the problem of oversupply (and the impact this has on prices) by creating ways for producers to increase income other than by increasing yields. However, they may not overcome the problems of structural oversupply, and we support more radical supply management measures as proposed by GLACC and other stakeholders. Measures to regulate the market are essential for the well-being of both producers and the environment. Coffee and cocoa prices must provide viable returns that ensure livelihood security and allow longer time horizons and investment in sustainable production practices.

Beyond this, a wide range of further measures could help alleviate the social and environmental problems associated with the commodity trade. They should be pursued both as part of international action towards sustainable commodity production and in their own right.

- *Elimination of tariff escalation and trade distorting domestic subsidies*

As discussed above, tariffs on processed coffee and cocoa and on other merchandise and agricultural commodities restrict developing countries' opportunities for diversification. The subsidies for OECD farmers that lower world market prices for commodities further narrow their options. Removing these tariffs and eliminating trade-distorting subsidies for OECD agriculture would enhance the options for income generation at farmer and country level. The need to address these issues has been stressed by numerous governments and civil society organisations.⁸² It was a key issue in the Vth WTO Ministerial in Cancun, and has since been emphasised in relation to the commodities crisis by the UN General Assembly and UNCTAD.⁸³

- *Multilateral action on competition policy*

The huge market power of the multinational coffee and chocolate companies is a key factor in the low prices paid to farmers. Multilateral action on competition policy could help to make trading relations more equitable.

Competition policy has traditionally focused on consumer benefit and on the national level.⁸⁴ To ensure fair prices for farmers and address international trading relationships, it is important also to look at buyer power and at global competition standards.

However, we firmly oppose the proposals for action on competition law within the WTO. The

proposals are not designed in a way that supports small farmers and developing countries. They threaten a downward harmonisation of national regulations with consequent social insecurity and environmental degradation.

Instead, international competition policy needs to be tailored to the needs of developing countries, taking into account their level of development and the long term objective of sustainable development.⁸⁵ One option is an independent international competition body, with full representation of developing countries and civil society, that could build technical capacity in developing countries and deal directly with anti-competitive behaviour among large companies.⁸⁶

- *Debt cancellation*

As noted earlier, the massive external debt burden of many producing countries is a critical determinant of their economic policy choices. It is a key driver of export oriented agriculture (with potential results of market oversupply and environmental and social harm), and diverts money from investment for sustainable development. Further efforts to reduce and eliminate external debt burdens are essential.

One of the most recent calls in this respect come from the UN General Assembly, which recommended the rapid introduction of mechanisms to tailor debt relief efforts to the needs of commodity-exporting developing countries.⁸⁷

- *Consumer education and eco-labelling*

Consumer concern about the environmental and social impacts of their consumption decisions can be a powerful force for change. Eco-labelling schemes are important for realising this potential: they help in awareness raising and consumer education, and enable consumers to make informed choices.⁸⁸ The market can and does deliver such labelling in some circumstances, but there are also cases where some form of regulation or incentive is required to deliver effective public information. Wider adoption of eco-labelling will depend on action by governments, industry or international commodity organisations.

For eco-labelling to support sustainable commodities production, it must be based on a life-cycle approach. This means that trade rules must be clarified to allow labels based on the way that products are grown or manufactured. Such action would facilitate widespread labelling of coffee and cocoa that was sustainably produced.⁸⁹

It is essential that eco-labelling supports small farmers and does not unfairly restrict market access. Certification schemes for fair trade or organic coffee and cocoa have brought considerable benefits for producers in developing countries, but this has often relied on significant support and capacity building by NGOs or donors. To ensure that labelling initiatives are pro-poor, they must be designed in a participatory manner and accompanied by financial and technical assistance to support environmentally and socially sound production (this would be one appropriate use of the global Fund described above).

- *Co-operative action by companies to conserve the environment and improve livelihoods.*

Private sector coffee and cocoa firms must raise their efforts to apply principles of corporate social responsibility and increase the sustainability of their operations, in line with international standards and agreements. There have been some positive moves by the industry (for example, the partnership between the Rainforest Alliance and two large coffee trading companies⁹⁰). However, there is clearly much to be done to shift the focus from short-term profit towards equity and long term sustainability. Corporate codes of conduct must be strengthened, and backed by global monitoring of transnational company behaviour.⁹¹

- *Policy coherence*

Trade measures must be co-ordinated with other government regulations. One clear example here

relates to the EU legislation on the amount of alternative vegetable fats allowable in chocolate. The risk of reduced demand for cocoa resulting from the EC directive and consequent threat to farmer livelihoods has been highlighted by fair trade organisations.⁹²

Policy coherence should also involve eliminating subsidies and programmes that promote unsustainable forms of coffee and cocoa production. National, donor and multilateral policies must all be directed at the most environmentally and socially responsible production methods. This means, for example, that policies should not promote intensive use of industrial pesticides and fertilisers, and there must be sufficient regulation and capacity building to ensure the safe use of such inputs. Policies should also avoid promoting genetically modified coffee and cocoa, at least until further assessment of the impacts of this technology. GM coffee is designed for plantations and grown under intensive monocrop conditions with high use of chemicals. It could severely increase poverty among small producers through greater competition from large farms and dependence on GM companies. It is also designed to facilitate mechanised harvesting and reduce labour requirements, so could further increase poverty by putting plantation labourers out of work. Finally, the environmental implications of this technology are enormous, including the loss of biodiverse traditional coffee forests, increased chemical use, and genetic contamination of natural coffee and other species.⁹³ As noted above, the international community is committed to reducing the rate of biodiversity loss by 2010, and it is vital that government and multilateral policy supports this target.

- *WTO action*

As noted above, the commodities crisis has been brought to the attention of the WTO by producer countries. The draft declaration from the 2003 WTO Ministerial meeting in Cancún, Mexico, did suggest that commodity issues be specifically addressed in WTO negotiations, especially in those areas of most interest to developing countries. However, the wording of this was weak and the response from the major trading powers has so far been limited.⁹⁴ The WTO must genuinely listen to producer countries and firmly address their concerns.

Specific areas for action include market access, domestic subsidies and precaution in the use of GM technology, as discussed above. More generally, there must be increased attention by the WTO to mechanisms of special and differential treatment to enhance trade and development opportunities for poorer countries. This should be done in collaboration with other international institutions, including the World Bank, IMF and UN organizations, and in close partnerships with national governments and civil society. The power of developing countries in WTO negotiations must be strengthened, and the overall transparency of the WTO improved.

At a more fundamental level, trade negotiators must acknowledge that economic liberalisation and free trade will not deliver sustainable development in themselves. The legitimacy of measures for sustainable development must not be judged in terms of how trade distorting they are. It may be perfectly justifiable to distort trade to promote economic activities that are more socially and environmentally beneficial. Rather than pursuing free trade as an end in itself, the WTO should move towards managing trade for social and environmental ends.

5. Conclusion

The question of the sustainability of the commodity trade is timely. Given the growing calls for international action to address the commodities crisis and the final stage of negotiations in the Doha Round, the next few years will be influential in developing the planet's long-term agricultural and environmental policies and determining global production and consumption patterns.

In previous decades, the adverse impacts of agricultural production could be seen more legitimately as 'domestic problems' requiring domestic solutions. However, in the ever more globalised world of commodity trade, the responsibility is increasingly shared, and the RSPB calls on governments,

companies and producers to develop innovative solutions. We recognise that the policies proposed above will not be a panacea for commodity producers or for biodiversity conservation, but we believe that such measures are an important step in the right direction, and we hope that our proposals can make a useful contribution to the debate.

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BirdLife International is a global Partnership of conservation organisations, working in more than 100 countries worldwide. The BirdLife Partnership strives to conserve birds, habitats and global biodiversity, joining local communities around the world to achieve awareness of our natural resources and how to use them sustainably.

The Royal Society for the Protection of Birds is Europe's largest wildlife conservation organisation with over a million members and the UK partner of BirdLife International. Through research, advocacy and land management, we strive to link national and international policies for sustainability with local concerns in both the South and the North. We have extensive programmes of work in many policy areas including agriculture, trade, climate change, energy, transport, the marine environment, fisheries, education and capacity building.

Why we work on Trade

One of the greatest threats to birds - and biodiversity more widely - is habitat loss. The loss of habitats all over the world is being driven by a wide range of factors, many of which are inextricably linked with national and international economic policies. International trade and the rules that govern it thus have an important bearing on our core concerns.

Beyond this, BirdLife takes an active interest in wider policy areas concerning sustainable development. Biodiversity conservation is a key aspect of sustainability, and, as is increasingly recognised, international trade has a significant impact on biodiversity and on the prospects for sustainable development. Throughout the Doha Development Round of negotiations at the World Trade Organisation, BirdLife has been questioning the current emphasis of trade rules on ever greater economic liberalisation. We need to focus not on free trade as an end in itself, but rather on managing trade as a means for sustainable development, with trade rules that balance a range of social, environmental and economic concerns.

The rules governing agricultural trade have been a particular focus of the RSPB's trade policy work. This includes a long record of activity on reform of the UK and European agricultural policies and, more recently, the WTO Agreement on Agriculture. We are now drawing on this and other BirdLife experience to examine the links between biodiversity conservation and the global trade in primary commodities.

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- ⁸⁰ For example, a tax of 25-35% on the wholesale price of pesticides in Denmark led to a 47% reduction in usage between 1986 and 1997, Ian Dickie pers. comm.
- ⁸¹ Rice & Ward 1996
- ⁸² For more detail, see Trade and Agriculture Position Paper, BirdLife International and RSPB, July 2003.
- ⁸³ UNCTAD, 28 July 2003; UN General Assembly 2 October 2003.
- ⁸⁴ Vorley, B. 2003
- ⁸⁵ Singh, A & R. Dhumale, 1999 *Competition Policy, Development and Developing Countries*. South Centre.
- ⁸⁶ As proposed by Action Aid, *Competition Policy and the WTO*. 2003
- ⁸⁷ UN General Assembly, 2 October 2003.
- ⁸⁸ For more information, see the BirdLife and RSPB position paper Ecolabelling, July 2003.
- ⁸⁹ As noted in 3.2, various sets of appropriate criteria for labelling have been developed. See in particular 'Shade Management Criteria for bird Friendly Coffee', Smithsonian migratory Bird Centre
- ⁹⁰ Rainforest Alliance, June 2003 'Rainforest Alliance Signs Agreements With World's Two Largest Coffee Brokers'. www.rainforest-alliance.org/news/archives/news/news63.html
- ⁹¹ On which, see B. Vorley, 2003
- ⁹² For example, European Fair Trade Association <http://www.eftafairtrade.org/>
- ⁹³ Madeley, J. *Robbing Coffee's Cradle - GM Coffee and It's Threat to Poor Farmers*. ActionAid 2001; 'GM Coffee: Brewing up a storm?' *New Agriculturalist* no. 22 April 2001
- ⁹³ At an October meeting of the WTO Committee on Trade and Development, the US, Canada and EU, amongst others, opposed supply management measures, arguing that primary commodity prices were dependent on market forces, which are difficult to interfere with, and that improving the market situation for commodities was a question of competitiveness, diversification and encouraging investment. 'UN Assembly and WTO discuss primary commodities.' *Bridges Trade BioRes* 31.10.03