
CIGARETTE TRAFFICKING IN THE WORLD-SYSTEM

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Core-based transnational corporations ship hazardous products, production processes, and wastes to the peripheral zones of the world-system. The peripheral countries are put at substantial health and environmental risk because they seldom have the risk assessment and management capabilities for dealing adequately with such hazards. The case of cigarette trafficking in the world-system is examined in this paper. The nature and scope of the cigarette trafficking problem is first examined, followed by a discussion of political and economic drivers, adverse consequences, economic costs and benefits, and solutions for dealing with the problem.

Keywords: *cigarettes, transnational corporations, globalization, hazardous exports, World-System, health and environmental risks.*

Core-based transnational corporations (TNCs) export hazardous products, production processes, and wastes to the peripheral zones of the World-System (see, e.g., Frey 1998, 2006a, 2006b, 2012a, 2012b, n.d.). The peripheral countries are put at substantial health and environmental risk from this hazardous trade because they do not have the assessment and management capabilities for handling the risks of hazardous exports. This problem can be illustrated with a specific case: cigarette trafficking in the world-system. The story of cigarette trafficking is framed in the World-Systems perspective (Wallerstein 1974–2011, 2004) and it is told in five parts: (1) the nature and scope of cigarette trafficking are first addressed; (2) the political and economic forces promoting cigarette trafficking are identified; (3) the adverse health and environmental risks, as well as the economic and social costs of cigarette consumption and production are discussed; (4) the neo-liberal contention that globalization and the trade in hazards are economically beneficial to all parties is debunked; and (5) the story closes with a brief discussion of what has been and what should be done to curb the problem of cigarette trafficking.

The Nature and Scope of the World Cigarette Trade

Cigarette consumption has grown dramatically since the beginning of the 20th century (see Brandt 2007; Eriksen *et al.* 2012). The annual world consumption was 5.5 trillion cigarettes in 2000 and it has been growing rapidly since then (Mackay *et al.* 2006; Proctor 2011; Shafey *et al.* 2009). Mackay *et al.* (2006: 32) observe that ‘more than 10 million cigarettes are smoked every minute of every day around the world’. Despite growth on a global scale, cigarette consumption varies considerably between countries: core countries have experienced a substantial reduction in consumption during the past four decades due to increased health concerns and regulation (a halving of adult male smokers [Pampel 2007]), while the non-core countries (especially China and India) have experienced a substantial increase during this period (Mackay *et al.* 2006: 22;

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Shafey *et al.* 2009). This trend is expected to continue and low and middle-income countries now account for 80 per cent of the world's 1.1 to 1.3 billion smokers (Brandt 2007: 451). And the number of smokers in these countries is expected to increase dramatically in the next twenty years (Mackay *et al.* 2006: 72, 88–89; Shafey *et al.* 2009).

The international production, manufacture, and distribution of tobacco (with the exception of countries like China where the state has a monopoly on tobacco and an interest in promoting its use [Proctor 2011: 540–541]) was dominated by six TNCs in 2003: Altria/Philip Morris (the largest with 17.6 per cent of the market), British-American Tobacco (BAT, see Cox [2000] for the definitive history of this corporation), Japan Tobacco Group Limited, Gallaher Group, Imperial Tobacco Group, and Altabis (Mackay *et al.* 2006: 52–53; Shafey *et al.* 2009). These TNCs produce approximately 50 per cent of the more than 5.5 trillion cigarettes consumed worldwide each year and the revenues of these companies exceed the gross domestic product of any number of countries (Mackay *et al.* 2006: 52; Shafey *et al.* 2009; Yach *et al.* 2007). The top three companies (Altria/Philip Morris, BAT, and Japan Tobacco Group Limited) operate in most countries of the world. The tobacco TNCs have directed their manufacturing and marketing to the peripheral countries for decades: Latin America became a major target in the 1960s, the newly industrializing countries of Asia were the key target in the 1980s; and China, India, Eastern Europe and Africa became the major targets in the 1990s and on into the 21st century (see, *e.g.*, Brandt 2007: 449–491; Proctor 2011: 540ff.).

TNC marketing practices are based on a double standard: one for the core and one for non-core countries. TNCs operating in the non-core areas often sell cigarettes with limited health warnings, advertise on television and sell cigarettes with higher levels of tar, nicotine, and other hazardous chemicals than those marketed in the core. TNCs also engage in promotional activities directed at children and women, including the distribution of free candy cigarettes and cigarettes; the use of images and messages in ads that promote smoking as sexy, romantic, and slimming; the sponsorship of sporting, music, fashion and other events; and the use of Western celebrities to advertise. TNCs engage in such activities because of limited restrictions in many non-core countries (Brandt 2007: 458ff.; Mackay *et al.* 2006: 24ff., 60–61; Shafey *et al.* 2009).

TNCs use other means to enhance their market share in the periphery. They provide bribes and kickbacks to state officials and they apply political and commercial pressure in those countries that attempt to regulate or restrict tobacco marketing and promotional activities (McDaniel *et al.* 2008). TNCs have shown remarkable ingenuity in getting around existing restrictions. They use techniques such as the sponsorship of televised events, cigarette placement in movies and television, political campaign contributions, and branding logos on clothing (Brandt 2007: 449ff.; Mackay *et al.* 2006: 62–63; Otanez and Glantz 2009; Shafey *et al.* 2009). They have been quite successful in creating international management organizations that promote their interests and battle cigarette control activities worldwide (McDaniel *et al.* 2008).

The scope of direct TNC involvement in cigarette smuggling (accounting for upwards of 600 billion or more of the world's cigarettes in a given year) is unknown, but it is clear that TNCs benefit because these cigarettes are tax-free and states lose upwards of 50 billion dollars in revenue (see Bump and Reich 2012: 5). Cigarette smuggling (the most smuggled legal product in the world) is a particularly serious problem when

large price differentials exist at border areas such as China and Hong Kong and across several countries in the Middle East, Africa, and Eastern Europe. Smuggling is of concern because smuggled cigarettes are cheaper and more likely to be consumed by the poor and young (Mackay *et al.* 2006: 56–57; Shafey *et al.* 2009) and it reduces the effectiveness of efforts to reduce cigarette consumption (Bump and Reich 2012: 5–6).

Tobacco is one of the most widely grown non-food cash crops in the world; estimates are that 4 million hectares of the world's arable land are devoted to tobacco cultivation (Mackay *et al.* 2006: 48; Shafey *et al.* 2009). A large proportion of the world's land under tobacco cultivation is located in the periphery and the small farmers located in the periphery produce most of the tobacco sold in the world (Mackay *et al.* 2006: 48; Shafey *et al.* 2009). Despite this fact, most tobacco produced in the periphery is controlled by TNCs. These companies contract tobacco production out to small farmers: they arrange loans for farmers and they provide farmers with tobacco seed and the necessary inputs like fertilizer and pesticides. They see that farmers receive instructions on planting and tending the crop, and they buy the farmers produce (Otanez 2008).

The Political Economy of Cigarette Consumption, Marketing, and Production

The contradictory demands of capital accumulation and the increased regulation of and decline in cigarette consumption in the core have led tobacco TNCs to increase the marketing and production of tobacco in the periphery. State policies of many peripheral countries have also encouraged tobacco production and cigarette consumption. And the policies of several international financial and development organizations have contributed to increased tobacco production in the periphery over the years.

Crisis in the Core

Much like the opium trade in China during the 19th century (see the history of the trade by Janini [1999] and Lovell [2011]), cigarette trafficking reflects the economic interests of the core-based tobacco TNCs. Consider the fact that cigarette consumption has declined in the core countries due to state efforts to reduce use, including restrictions on advertising, excise taxes, restrictions on public smoking, health warnings, increased litigation, and efforts to make tobacco companies liable for smoking-related diseases. Tobacco TNCs have responded by denying health risks associated with smoking and seeking a market among minorities, the poor, women, and the young (see Oreskes and Conway 2010: chs 1, 2, and 5; Proctor 2011). They have aggressively sought markets in the non-core countries where demand is rising due to increasing affluence and there are fewer restrictions on marketing and the health risks of smoking are not widely known (Proctor 2011: 546).

The state has played an important role in the marketing of US cigarettes in the periphery. The US government has a history of threatening trade sanctions in countries where regulations and restrictions on cigarette marketing have been undertaken. TNC promotional activities have been underwritten by the state: cigarette-advertising costs have been tax-deductible in the past (Brandt 2007: 458–466).

Cigarette TNCs have been able to reduce the uncertainties associated with a declining cigarette market by reducing costs through the control of tobacco cultivation in the periphery. Most tobacco grown in the periphery is produced under contract to subsidiaries of major tobacco TNCs. Tobacco is far cheaper for TNCs to produce in the periphery than in the core (Otanez 2008).

Conditions in the Periphery

Bribes and kickbacks provided by tobacco TNCs have encouraged peripheral states to support TNC cigarette promotion and consumption. The prospect of substantial tax revenues on cigarette consumption also facilitates peripheral state support of domestic consumption, for taxes often represent one of the largest single sources of state revenue. Such forces represent strong incentives for countries with economic problems (Proctor 2011: 542–545).

Since World War II many peripheral states have pursued agricultural policies promoting cash cropping. Proponents view this model as an effective means for increasing agricultural productivity and generating needed jobs and income for reducing hunger, increasing international competitiveness and improving their balance of trade, fostering debt repayment to the core countries, and initiating economic takeoff. Tobacco cultivation is a profitable form of cash cropping because it is not highly subject to commodity market fluctuations, and the returns are much higher than food crops. Peripheral state support of tobacco cultivation has taken various forms, including loans, tax incentives, extension programs, and technical assistance (Mackay *et al.* 2006: 48–49; Shafey *et al.* 2009).

Role of International Banking and Development Organizations

International banking and development organizations have also encouraged tobacco cultivation in the periphery. Since the mid-1970s the World Bank has loaned hundreds of millions of dollars to the periphery for tobacco cultivation and other cash crops (Goldman 2005). The Food and Agricultural Organization and the UN Development Programme have historically promoted tobacco as a cash crop by providing technical assistance to a number of peripheral countries. Various core state agencies have also contributed to tobacco cultivation by providing loans and expertise to the periphery.

The Costs of Cigarette Trafficking

Human Health Costs: Disease and Death

Tobacco is an addictive drug that is extremely hazardous to human health. Cigarettes are a human engineered product containing hundreds of toxic substances and contaminants, including, for instance, pesticides, dirt and sand, radioactive isotopes, urea, nicotine, various additives, and the like (Proctor 2011: chs 25–26). Cigarette smoking is a major contributor to preventable morbidity and premature mortality worldwide. Smoking causes lung cancer and other site-specific cancers, including cancers of the mouth, pharynx, urethra, and bladder. Smoking is also known to be a major cause of pulmonary illness and death: pneumonia, influenza, bronchitis, emphysema and chronic airway obstruction, as well as a contributing factor to tuberculosis. It increases the risk of cardiovascular diseases: stroke, heart attack, peripheral vascular disease and aortic aneurysm. And maternal smoking contributes to infant mortality (resulting from low birth weight, spontaneous abortions, and other congenital disabilities). Smokers are at an increased risk of fire-related deaths (see Eriksen *et al.* 2012; Mackay *et al.* 2006: 34–35, 38, 42–43; Shafey *et al.* 2009; Yach *et al.* 2007: 59).

Tobacco use is estimated to have caused at least 4.2 million deaths worldwide in 2000 and over 5 million in 2010 (Bump and Reich 2012; Brandt 2007: 488). The death toll for the 20th century is estimated to be at least 100 million and it could rise to one

billion for the 21st century if current trends continue (Brandt 2007: 488; Shafey *et al.* 2009). Recent estimates are that the annual mortality rate will continue to rise, resulting in many as 10 million deaths in 2025 (Mackay *et al.* 2006: 38; Shafey *et al.* 2009). By 2025 it is estimated that seven million of the world's ten million tobacco related annual deaths are likely to occur in non-core countries (Brandt 2007: 451; Mackay *et al.* 2006: 38; Shafey *et al.* 2009).

Environmental Costs

Tobacco cultivation requires extensive pesticide use. Pesticide use not only poses acute and chronic health risks to humans, but leads to the destruction of soil and flora and fauna. Pesticide use causes such problems for a simple reason: a large proportion of the pesticides applied move directly into ecosystems to contaminate water, soil, air, and food. Plant and animal species, as well as humans, are affected directly and indirectly by 'pesticide drift' (Harrison 2011). Natural parasitic and predator species are reduced in outbreaks of pests that were previously not a problem. Pesticides create pests in other ways; they contribute to the development of hundreds of pesticide-resistant species that can no longer be controlled. Development of such pest-resistant breeds of mosquitoes and other insects has resulted in an increase in malaria, yellow fever, and other parasitic diseases (see, *e.g.*, Arcury and Quandt 2006; Pimentel 2009).

Tobacco curing is a process in which green tobacco leaf is kept at temperatures of 160 degrees Fahrenheit for six or seven days. This process requires substantial firewood. Twenty kilograms of firewood are needed to produce one kilogram of tobacco in the curing process (Otanez 2008: 17). A majority of the wood used in the curing process comes from open forest, woodland and savannah, but protected forest is likely to come under increasing pressure as existing stocks are depleted. Deforestation, in turn, leads to the loss of biodiversity and causes soil erosion and siltation of rivers and lakes, as well as contributing to flooding, climate change, desertification, and the increased incidence of infectious diseases (Mackay *et al.* 2006: 48; Shafey *et al.* 2009).

Social Costs

The negative consequences of tobacco production (cultivation and curing) and cigarette consumption are not equitably distributed within the peripheral countries. Deforestation decreases fuel wood and the poor depend on it for cooking and heating. The poor are at greater risk of exposure to the pesticides used in tobacco cultivation and the use of bonded and child labor are common in tobacco production. As production shifts from food to tobacco there is a reduction in food supplies (and increased food imports) and hunger increases among the poor. Cigarette consumption among the poor, though still limited, contributes to malnutrition because scarce resources are diverted from food purchases. In turn, large numbers of small farmers have limited autonomy and are at high risk of being displaced as tobacco cultivation becomes increasingly mechanized (Arcury and Quandt 2006; Mackay *et al.* 2006: 44–45, 48–49; Otanez 2008; Shafey *et al.* 2009).

Do the Benefits Outweigh the Costs?

The economic costs of cigarette consumption in the periphery (lost lives, health care, and lost productivity) are unknown, but estimates for the USA were nearly 185 billion dollars in 2005 and have continued to rise (Mackay *et al.* 2006: 42–43; Shafey *et al.* 2009). The economic costs of tobacco production are less certain. Despite the costs, to-

bacco production and sales contribute direct economic benefits in the form of income and employment for farmers and other workers, government revenue, and profits for tobacco TNCs. Several studies have concluded that the longer-term direct and indirect costs far outweigh the short-term benefits of production and sales in the periphery and elsewhere (Yang *et al.* 2011). In other words, tobacco represents a substantial threat to the sustainable and equitable development of the non-core countries (see Mackay *et al.* 2006: 42–43).

What Has Been Done? What Should Be Done?

The World Health Organization (2008) and other organizations (Proctor 2011) have recommended that cigarette trafficking in the periphery should be severely curbed; others have argued that peripheral countries should stop growing tobacco. Several analysts have taken a less extreme stance, suggesting that the most effective means for reducing the human, environmental, and social costs of cigarette trafficking is to institute stringent regulations on the marketing, promotion, and consumption of cigarettes in the periphery (Proctor 2011). Recommendations have included changes in core state and TNC trade practices and policies, increases in cigarette taxes, restrictions on cigarette advertising and promotional activities, public education and restrictions on public-smoking, and the elimination of subsidies for tobacco production (Mackay *et al.* 2006: 74–81; Proctor 2011: ch. 30; Shafey *et al.* 2009). Several of these recommendations were ratified through the Framework Convention on Tobacco Control (FCTC) in 2003 (Brandt 2007: 470–485; Mackay *et al.* 2006: 72–3). This convention requires countries to pursue active anti-smoking practices (Yach *et al.* 2007: 60).

Implementing such policies would reduce smoking and the attendant human and environmental costs associated with tobacco in the periphery. Various stringent measures practices have been enacted around the world (Jha and Chaloupka 2001; Mackay *et al.* 2006: 74–87; Shafey *et al.* 2009; Yach *et al.* 2007; see World Health Organization [2008] for an overview of policies for a number of countries). It is unlikely, however, that these policies will be fully implemented in the periphery in the near future because powerful economic and political interests (described by one noted critic over twenty-five years ago as the ‘Smoke Ring’ [Taylor 1985]) profit from cigarette trafficking. These include the tobacco TNCs, governments that collect cigarette-generated taxes and foreign exchange from tobacco sales, farmers and workers, and the media that benefit from cigarette advertisements. And, of course, many peripheral states have limited capacity to monitor and control tobacco sales and use (Eriksen *et al.* 2012; Mackay *et al.* 2006: 70–71; Shafey *et al.* 2009). As long as this ‘Smoke Ring’ (which is embedded in a World-System based on the asymmetrical exchange of wealth [see Frey 1998, 2012a, n.d.; Jorgenson and Rice 2012]) remains intact, the human and environmental costs of the cigarette trade in the periphery will not only persist but likely take on ‘pandemic’ importance in the future (see Brandt 2007: 486–487; Mackay *et al.* 2006; Proctor 2011; Shafey *et al.* 2009; World Health Organization 2008).

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