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London and the colonial consumer in the late seventeenth century¹

By NUALA ZAHEDIEH

In the early seventeenth century Englishmen commonly complained that their land was burdened with ‘overgreat’ and ‘superfluous’ multitudes.² Although there were no national population counts, the orders and exhortations of the Privy Council, reports from JPs, the strict anti-settlement laws of the towns, and the petitions of the distressed themselves bear witness to the perception that numbers had risen greatly in the previous hundred years or so and that the land was unable to provide the ‘swarms’ with enough food or employment.³ Prices were rising and wages were falling while destitution and vagrancy increased.⁴ Against this background promoters of colonization recommended radical remedies. ‘It is true and high time that like stalls that are overfull of bees . . . no small number of them should be transplanted into some other soil and removed hence into new hives.’⁵ Removal of some of the ‘swarms’ to the New World would serve a double purpose. It would relieve population pressure at home and also provide new opportunities for those left behind. Transplanted Englishmen would produce valuable commodities which would stimulate shipping and processing industries. The colonists would also require a wide range of manufactured goods from the mother country which would offer a new means to conquer ‘idleness’ and ‘set the poor to work’.

The prescription appears to have met with a success which was quite exceptional in Europe. During the first century of American colonization Britain (England, Scotland, Wales, and Ireland—but principally England alone) sent nearly 400,000 emigrants to America, a ratio of emigrants to domestic population almost twice that of Spain in its first 150 years of colonial rule, and more than 40 times that of France in the seventeenth

¹ Thanks to the British Academy, Leverhulme Trust, and University of Edinburgh for research grants. Further thanks to Michael Anderson, Peter Earle, David Greasley, Leslie Hannah, Dwyrriy Jones, Audrey Stewart, John Styles, and Tim Wales for constructive help.

² Eburne, *A plain pathway*; Campbell, ‘Of people either too few or too many’, pp. 169–201; Coleman, ‘Labour in the English economy’; Palliser, ‘Tawney’s century’, pp. 339–53.

³ The contemporary perception of rising numbers is borne out by recent work in demographic history. Wrigley and Schofield estimated that the population of England increased from about 2.8 million in 1541 to 4.1 million in 1601 and 5.2 million in 1651: Wrigley and Schofield, *Population history*, pp. 528–9.

⁴ Gray, *A good speed to Virginia*; Phelps Brown and Hopkins, ‘Seven centuries of building wages’; Phelps Brown and Hopkins, ‘Seven centuries of the prices of consumables’; Phelps Brown and Hopkins, ‘Wage rates and prices’; Goldstone, ‘Demographic revolution’, pp. 7–8, 15.

⁵ Eburne, *A plain pathway*; Symonds, *Virginia*, pp. 19–20. The image of bees swarming occurs again and again: Bridenbaugh, *Vexed and troubled Englishmen*, p. 397.

century.⁶ The exodus seems to have had a greater than expected impact on English population trends because most of the migrants were young men and their loss reduced the marriage opportunities of the young women left behind.⁷ Wrigley and Schofield's statistics suggest that celibacy rose markedly in the decades after 1650 and that this caused a trough in fertility rates.⁸ Population growth slowed down in mid century and went into mild reverse, and they conclude that emigration was the major cause.⁹ Englishmen had migrated out of a potential Malthusian trap.¹⁰

Contemporary preoccupations shifted a little. Real wages began to rise in the second half of the seventeenth century and fears of overpopulation gave way to some concern that the plantations were 'draining the life blood of the kingdom'.¹¹ Emigration agents met with widespread disapproval and found recruitment increasingly difficult.¹² But the pro-colonization lobby also remained strong. Much influential opinion pointed to continuing slack in the economy and conceded that, while it was true that people were the wealth of a nation, 'it must be where you find employment for them, else they are a burden to it as the idle drone is maintained by the laborious bee'.¹³ England was pushing back its frontier. The increased productivity of the transplanted Englishmen, who numbered over 250,000 by the end of the century (table 1), raising valuable export commodities on virgin American lands and exchanging them for manufactures 'of all sorts imaginable in egregious quantities' had given more employment to those back home than any other extension of markets in the globe.¹⁴

⁶ Emigration figures are tentative as neither England nor the English colonies kept a record of all migrant movements in the seventeenth and eighteenth centuries. In the 70 years between 1630 and 1699 the number of emigrants to the New World has been estimated by Gemery to have been 378,000 English, Scots, Welsh, and Irish: Gemery, 'Emigration from the British Isles', pp. 179-231. Wrigley and Schofield's back projection estimates suggest that there were 544,000 net emigrants from England over the same period but that figure includes destinations other than America, deaths at sea, and soldiers and traders abroad. It seems likely that about 70% were destined for the New World: Wrigley and Schofield, *Population history*, p. 223. For comparisons with European migration see Bailyn, *Voyagers to the west*, pp. 24-5.

⁷ In the seventeenth century emigration to North America included a high proportion of indentured labour which was predominantly male and in the age band 15-24: Wrigley and Schofield, *Population history*, p. 201; Galenson, *White servitude*.

⁸ Wrigley and Schofield, *Population history*, pp. 229-32, 469.

⁹ Over most of the period studied the volume of net emigration was low compared with the surplus of births over deaths, and consequently net emigration reduced rates of population growth by a relatively small amount. Between 1650 and 1750 natural increase was low and even occasionally negative, and in these circumstances net migration exerted a more powerful influence on population growth rates. For example between 1656 and 1686 the population fell from 5.281 million to 4.865 million (a fall of 0.416 million), and of this 58% was due to net emigration (in the back projection sense of term) and the rest to an excess of deaths over births: Wrigley and Schofield, *Population history*, pp. 227-8.

¹⁰ Historians have noted the importance of an abundant supply of land either at home or overseas in allowing the positive effects of population growth to outweigh the negative, but have paid little attention to the addition of new lands in America in solving the problem: Habakkuk, 'Population growth'; Chambers, *Population, economy and society*, p. 17; Palliser, 'Tawney's century', pp. 339-53. It should be noted that for many individuals migration was costly. Mortality rates were very high in the new territories as reflected in the figures for total population in the British colonies in 1700 (tab. 1).

¹¹ Thomas, *An historical account*, p. 1.

¹² Smith, *Colonists in bondage*.

¹³ Cary, *State of England*, pp. 66, 163; Child, *New discourse*, p. 183; Davenant, *Plantation trade*, p. 2.

¹⁴ Child, *New discourse*, p. 176.

Table 1. *Estimated population of England's American colonies (in thousands)*

		1650	1700
North America	white	53	234
	black	.2	31
West Indies	white	44	32
	black	15	115
	total	114	412

Source: McCusker and Menard, *Economy of British America*, p. 54.

The extension was considered a net gain provided that the trade was reserved for the mother country and not allowed to fall into other nations' hands. The Navigation Acts, first introduced in 1651 and re-enacted after the Restoration, were designed to ensure that this was so. They required that all important plantation products should be shipped to England, or an English colony, in an English or colonial ship, manned by an English or colonial crew while plantation imports (with some exceptions) should be supplied from the same, with foreign goods being shipped via England.¹⁵ Provided that these laws were strictly observed, commentators claimed the colonies would prove, not a damaging drain of wealth, but a valuable strength to their mother country.¹⁶ The evidence presented in this article suggests that many of these aspirations were realized and that seventeenth-century colonial trade provided a quantitative and qualitative stimulus to English industry and employment. This stimulus was particularly strongly felt in London.

I

At a time of sluggish traditional markets, and of relatively slow growth in overall trade, in the second half of the seventeenth century the new Atlantic trade expanded rapidly (table 2).¹⁷ Colonial commerce, and particularly the export trade in manufactures, was centred on London, as shown in table 3 (whose source is the Inspector General's ledgers), and this picture is reinforced by colonial records. For example, the Jamaican trade records indicate that 75 per cent of the shipping tonnage which entered the island from England in the 1680s came from London, as did an even higher proportion of dry goods. Ships arriving in Jamaica from Bristol and other outports brought mainly provisions and passengers.¹⁸ Undoubtedly, manufacturing, packing, exchanging, and shipping goods in this expanding Atlantic commerce were important factors in London's sustained growth.¹⁹ While England's total population rose by less than 25 per cent in the seventeenth century, and even fell in the third quarter, the capital seems

¹⁵ Harper, *English navigation laws*; Beer, *Origins of the British colonial system*.

¹⁶ Child, *New discourse*, pp. 90-8.

¹⁷ Davis, 'English foreign trade', pp. 150-66.

¹⁸ P.R.O., CO142/13, Naval officers' returns, Jamaica, 1682-1705.

¹⁹ Wrigley, 'Simple model'.

Table 2. *London's plantation trade in the later seventeenth century*

	Plantations		Total	
	£	per cent	£	per cent
<i>Imports</i>				
1663/9 (average)	421,000	12.0	3,495,000	100
1686	881,649		not available	
1699-1701 (average)	863,000	18.5	4,667,000	100
<i>Exports</i>				
1663/9 (average)	163,000	8.0	2,039,000	100
1686	211,868		not available	
1699-1701 (average)	410,000 ^a	15.0 ^a	2,773,000	100

Note: ^a including Africa.

Sources: 1663/9 and 1699-1701: Davis, 'English foreign trade'; 1686: P.R.O., London port books, E190/139/1; 141/5; 136/6; 136/4; 143/1; 137/2. Values are taken from official valuations assembled by D. W. Jones from the Inspector General Ledgers, 1696-8, and are given in £ sterling. See text.

Table 3. *Exports of English manufactures to English plantations, 1698 and 1700*

		London		Outports		Total	
		£	per cent	£	per cent	£	per cent
1698	W. Indies	130,969	74	46,750	26	177,718	100
	N. America	226,162	71	91,751	29	317,912	100
1700	W. Indies	134,736	67	67,745	33	202,481	100
	N. America	185,189	75	60,411	25	245,600	100

Sources: P.R.O., Cust. 2/4 and 8.

to have continued to grow. Wrigley suggests that by 1700 London housed about 575,000 people, 11 per cent of the national total, compared with 475,000 in 1670 (9.5 per cent of the total), and 200,000 in 1600 (5 per cent of the total). It far outstripped all English rivals and became the largest city in western Europe.²⁰

Davis indicated the outstanding new features of England's foreign trade in his 1954 article but, despite the acknowledged importance of the rising Atlantic trade in stimulating the growth of London and numerous commercial developments, little detail has been added to his work. One obstacle to further work has been the paucity of statistics—there is no continuous series of trade figures for the period 1660-96. Davis concluded that the 'statistical blank' could only be filled by modern work on the port books which, according to a commentator in 1696, would require the fulltime work of a team of four men to deal with London alone each year.²¹ The figures discussed in this article are derived from such work in the form of a computerized analysis of the colonial shipments in the London port books for 1686, a year for which the books (apart from those listing re-exports)

²⁰ Wrigley, 'Urban growth'.

²¹ Davenant, quoted in Davis, 'English foreign trade', p. 155.

survive in full. The picture drawn from one year provides a very partial glimpse of late seventeenth-century trade, but the time taken to assemble and process the port book data fulfilled the contemporary prediction and it would take many years entirely to fill the statistical blank. Meanwhile, the completed database does provide a remarkably detailed picture of about 700 ships, over 3,000 merchants, and almost 30,000 consignments involved in London's colonial trade in 1686—a year in which, like those used by Davis, England was at peace and in which the volume of colonial trade was reported to reach a peak before the disruption of King William's war.

The valuations used in the port book analysis are official valuations assembled by Jones from the Inspector General's ledgers of 1696-8 and similar to those used by Davis for 1699 although, as Davis explains in his paper, they are completely different from those of 1663 and 1669. The basis used in the 1690s was clear: 'Upon all the respective goods exported from hence according to their current price here at home and in imported goods according to their current price abroad'.²² In other words, the import values were not c.i.f. prices as used today, but prices in the country of origin. The price of exports probably changed little between 1686 and 1696 but that of plantation imports rose considerably during the decade. Unfortunately there are no reliable series of farm prices for plantation goods in the seventeenth century but it is clear that the trend for sugar and tobacco was downwards until after the outbreak of war in 1689.²³ The year 1686 was one of bumper crops of sugar and tobacco and consequent price lows.²⁴ Thus, the figures in table 2 are a precarious indicator of changes in the value of trade but, with constant prices for 1686 and 1699, they do suggest the change in volume. The stagnation of imports and continued increase of exports between these years is borne out by contemporary comment, speculation in Davis's article, and other sources.

II

In 1686 the 'transplanted' Englishmen in America were shipping goods worth, in the official values used, about £881,649 to London alone (table 4). The West Indies accounted for about 77 per cent of the value of these imports from the colonies, justifying their reputation as the most valuable of the plantations.²⁵ The islands' produce was heavily dominated by sugar even in the relatively diversified island of Jamaica. Sugar was becoming an item of common consumption²⁶ and, being shipped mainly in its raw state, was stimulating the growth of a refining industry in the capital which employed several hundred people.²⁷ Other island produce included exotic foodstuffs and important raw materials—notably cotton, hides, and dye-

²² Davenant, as quoted in Davis, 'English foreign trade', p. 157. There is a useful discussion of official values in Ashton, 'Introduction', pp. 10-4.

²³ McCusker and Menard, *Economy of British America*, pp. 122-3, 157.

²⁴ *Cal. State Pap. Colonial, America and West Indies, 1686-8*, nos. 1080, 1118.

²⁵ Child, *New discourse*, pp. 204-8; Cary, *State of England*, p. 65.

²⁶ Shammas, *Pre-industrial consumer*, pp. 81-3.

²⁷ Deerr, *History of sugar*, II, pp. 458-60.

Table 4. Imports from English colonies to London, 1686

	Barbados	Jamaica	Antigua	Montserrat	Nevis	St Christopher	Total
West Indies							
No. ships	139	70	21	5	37	15	
Value (£)	363,171	175,323	39,066	9,583	71,854	15,521	674,518
Per cent of total value	53.8	26.0	5.8	1.4	10.7	2.3	100
N. America							
Bermuda		Carolina	Chesapeake	Hudson	New England	Pennsylvania	New York
No. ships	1	2	89	1	38	3	3
Value (£)	3,737	2,108	141,192	3,440	48,443	530	7,059
Per cent of total value	1.8	1.0	68.2	1.7	23.4	0.3	3.4
							Warehouse
							—
							622
							0.3
							207,131
							100.00

Source: P.R.O., London port books, E190/143/1; 137/2. Values as in tab. 2.

stuffs, which provided an important boost to the expanding textile finishing trades²⁸ (table 5). Unfortunately, the port books did not record bullion imports. However, although some of the large figures bandied around by contemporaries may exaggerate, it is evident from merchants' papers and the naval officers' returns that Jamaica remitted large amounts of money earned in trade with the Spanish colonists which would significantly inflate the value of Jamaican exports.²⁹

Imports to London from North America accounted for about 23 per cent of the colonial total (in official values). Tobacco was easily the most important commodity and reflected a major change in consumption patterns. While 60 or 70 years earlier only gentlemen had taken tobacco, and that in moderation, it had now become 'a custom, the fashion, all the mode . . . so that every plow-man has his pipe'.³⁰ Tobacco was followed by skins, including valuable industrial raw materials such as beaver pelts for the hatting industry. Most of the remaining goods were West Indian products which were gained in exchange for northern provisions and then re-exported from New England³¹ (table 6).

The composition of the New England trade reflects the way in which different areas of England's empire were already interlocking in a system of mutual reciprocities. Shrewd contemporaries observed these reciprocities and the increased opportunities for specialization. 'The northward parts have drained us most of people and yet yield commodities of little value; the fact is so, but if it were otherwise the plantation trade could not perhaps be counted on.' Unlike the southern colonies, those in the north had not found a lucrative staple crop for export, but they did provide the southerners with necessary food and lumber and used the proceeds of selling these provisions to buy English manufactures. Davenant remarked that the value of the northern colonies depended on making a 'right balance' between England sending manufactures to the north or sending provisions to the southern colonies if they were not supplied from New England. He concluded that without doubt manufactured exports in which 'improvements came near four-fifths of the whole commodity' (i.e. manufacturing value added) were much more advantageous to the mother country than trade in provisions which were the 'unimproved produce of the earth'. Of course if New Englanders set up manufactures of their own, as they did in the eighteenth century, their nearness to the southern colonial markets would give them a competitive advantage but, in the late seventeenth century, this seemed an unlikely prospect. Hence Davenant concluded that he hoped it is 'sufficiently proved that southward and northward colonies having such a mutual dependence upon each other all circumstances considered are almost equally important'.³²

²⁸ Fairlie, 'Dyestuffs in the eighteenth century', pp. 488-510.

²⁹ Zahedieh, 'Trade, plunder', pp. 205-22; *idem*, 'Merchants of Port Royal', pp. 570-93.

³⁰ Tryon, *Way to health*, p. 128; *idem*, *Health's grand preservative*, pp. 126-7; Shammis, *Pre-industrial consumer*, pp. 77-80.

³¹ Bailyn, *New England merchants*; Pares, *Yankees and Creoles*; Bean, 'Food imports'.

³² Davenant, *Plantation trade*, pp. 20-5.

Table 5. Imports to London from West Indies, 1686 (£)

	Barbados	Jamaica	Antigua	Montserrat	Nevis	St Christopher	Total
Sugar	value 329,129.8 90.6	133,573.8 76.2	30,883.9 79.0	8,484.9 88.5	69,014.3 96.1	15,441.3 99.5	586,528.0 87.0
Cocoa	value 0.6 0.0	547.2 0.3	—	465.0 4.9	—	—	1,012.8 0.2
Cotton	value 8,862.2 2.4	4,640.9 2.7	654.4 1.7	20.2 0.2	124.4 0.2	—	14,302.1 2.3
Dye woods	value 263.7 0.9	9,335.5 5.3	155.2 0.4	—	—	—	9,754.4 1.5
Elephants' teeth	value 1,423.0 0.4	3,023.2 1.7	—	2.3 0.0	328.9 0.5	—	4,777.4 0.7
Ginger	value 19,305.8 5.3	3,727.1 2.1	—	0.5 0.0	0.4 0.0	—	23,033.8 3.4
Hides	value 196.5 0.0	3,756.6 2.1	—	—	44.1 0.1	—	3,997.2 0.6
Indigo	value 293.3 0.9	7,033.1 4.0	22.1 0.1	594.4 6.2	1,939.6 2.7	34.7 0.2	9,917.2 1.5
Lemon/lime juice	value 231.1 0.1	433.7 0.3	—	—	—	—	664.8 0.1
Lignum vitae	value 50.5 0.0	122.2 0.1	—	—	—	—	172.7 0.0
Pimento	value 7.0 0.0	3,792.8 2.2	—	—	—	—	3,799.8 0.6
Rum	value 119.3 0.3	39.4 0.0	—	—	—	—	158.7 0.0
Succados ^a	value 231.0 0.1	112.8 0.1	0.7 0.0	5.8 0.1	4.5 0.0	—	354.8 0.1
Tobacco	value 148.7 0.0	52.1 0.0	7,344.9 18.8	0.2 0.0	2.2 0.0	—	7,548.1 1.1
Tortoise shell	value 172.3 0.1	2,120.7 1.2	—	—	—	—	2,293.0 0.3
Miscellaneous	value 2,735.8 0.8	3,014.7 1.7	5.1 0.0	9.7 0.1	395.6 0.6	44.7 0.3	6,205.6 0.9
Total	value 363,170.50 100.0	175,323.2 100.0	39,066.5 100.0	9,583.0 100.0	71,854.0 100.0	15,520.7 100.0	674,517.9 100.0

Note: ^a candied fruits.

Source: P.R.O., London port books. E100/142/1: 137/2. Values as in tab. 2.

Table 6. *Imports to London from North America, 1686*

	<i>Value (£)</i>	<i>Per cent of total value</i>
Tobacco	141,606	68.4
Skins	20,588	9.9
Molasses	20,171	9.7
Sugar	16,675	8.1
Dye woods	1,982	1.0
Others	6,109	3.0
Total	207,131	100.0

Source: P.R.O., London port books, E190/143/1; 136/4; 137/2.
Values as in tab. 2.

III

English colonists were producing commodities which gave them purchasing power of almost £1 million in London in 1686. In the late seventeenth century the English economy could not absorb all the exotic goods imported from the colonies or supply all their wants. About one-third of the sugar and two-thirds of the tobacco imported into London in 1686 was re-exported and exchanged for European goods.³³ This re-export trade did little to stimulate English manufacturing but did, as was stressed by Davis, generate profits for English shipping, ports, and merchants in the form of freight, commission, and handling charges.³⁴

A very large part of the proceeds of colonial commodities was used to buy additional labour, particularly for the West Indies where 'slaves are as needful to a planter as money to a courtier and as much coveted'.³⁵ The islands' slave population increased from about 15,000 in 1650 to about 115,000 in 1700 (table 1). Jamaican port records indicate that, in 1686, 13 ships entered from Africa carrying 3,244 slaves, worth approximately £81,100, or just below half the value of the island's exports to London that year.³⁶ White indentured labour was also important, particularly in the northern colonies, which imported hundreds of servants a year costing about £10 each.³⁷ The ships also earned freight by transporting passengers: in 1686 the 22 ships arriving in Jamaica from London brought 428 passengers, 32 servants, and 28 convicts.³⁸ The colonists, particularly the West Indians, also imported large quantities of wine and spirits picked up in Madeira and the Canaries and these were 'so generally and so plentifully drunk' that

³³ Nash, 'English transatlantic trade'.

³⁴ Davis, 'English foreign trade'.

³⁵ The Royal African Company repeatedly complained about the planters' indebtedness to them but, in fact, the money owed to them was a small proportion of the total slave bill. In the seventeenth century high profits from sugar planting, the proceeds of trade, and plunder provided the bulk of the capital necessary to establish the plantation economy. On planter indebtedness see Davies, *Royal African Company*. On capital for planting see Pares, *Merchants and planters*; Zahedieh, 'Trade, plunder'. On the profitability of planting see Ward, 'Profitability of sugar planting'.

³⁶ P.R.O., CO 142/13, Naval Officers' returns, Jamaica, 1682-1705.

³⁷ Smith, *Colonists in bondage*; Galenson, *White servitude*.

³⁸ P.R.O., CO 142/13, Naval Officers' returns, Jamaica, 1682-1705.

they were reported to be the 'best commodities' in Caribbean trade.³⁹ The London port books record 65 ships leaving for the wine islands in 1686, about half of which went on to the colonies, while Jamaican records for the same year show that four of the 22 ships entering port from London came via Madeira.⁴⁰ Finally, many colonial merchants and planters used the proceeds of export earnings to build up capital balances at home. Some, such as the Port Royal merchant William Hall, hoped to be able to 'leave this hell' and return to England and buy a small estate.⁴¹ Others wanted to pay miscellaneous expenses and debts at home or in other colonies.

Much of the remainder of colonial export earnings was used to buy a wide range of miscellaneous goods required for life and work in the plantations: 329 ships sailed directly from London to the colonies in 1686, carrying, apart from re-exports, 598 different English commodities worth (in official values) about £211,868 (table 7). About 5 per cent of the value of London's exports to the colonies consisted of food products but most of the rest consisted of 'manufactures . . . of all sorts imaginable'.⁴² I have been unable to trace re-export records for 1686 but the Inspector General's ledgers for the 1690s suggest that English goods accounted for more than half the total value (table 8). The requirement of the Navigation Acts that goods be transported to the colonies via England gave English producers a competitive advantage which they appear to have exploited with enthusiasm. There was a new broadening and deepening of England's export trade, a diversification away from traditional wool and woollens which was to stand the country in good stead in the next century.

Clothing and textiles predominated, accounting for just over half the computed value of exports to the West Indies and almost two-thirds to North America. Silk was easily the most valuable commodity, amounting to about one-quarter of exports to both regions, and this colonial demand was undoubtedly a factor in the growth of the London silk industry in the late seventeenth century.⁴³ Woollen cloths, cottons, lace, linens, ready-made clothing, stockings, gloves, hats, hose, wigs, and haberdashery are also found in this category, and more of these items are included in the category labelled 'miscellaneous, at value' which were often multiple cargoes with a collective value given in the port book. Even without these additional items the official value of clothing and textile exports to all the colonies was £122,683. This was a substantial addition to the London market which, using Gregory King's estimates of annual expenditure on apparel, would have been worth about £1 million a year.⁴⁴ Other exports reflect further the diversity of colonial needs for work and play, and the heavy reliance on the mother country to supply them. Cargoes included glass for windows, beds, upholstery and furnishings of all sorts, chariots and coaches, billiard tables

³⁹ Jeaffreson, *A young squire*, pp. 183, 190.

⁴⁰ P.R.O., CO 142/13, Naval officers' returns, Jamaica, 1682-1705.

⁴¹ P.R.O., C 110/152, Brailsford papers, Halls to Brailsford, 19 Oct. 1689.

⁴² Child, *New discourse*, p. 176.

⁴³ Earle, *Making of the English middle class*, pp. 19-20.

⁴⁴ King reckoned that England's population of about 5 million spent £10,392,500 a year on clothing; King, *Natural and political conclusions*, p. 68. For detailed discussion see Harte, 'Economics of clothing'.

Table 7. Exports from London to English colonies, 1686

	Barbados	Jamaica	Antigua	Montserrat	Nevis	St Christopher	Total
West Indies							
No. ships	74	28	13	5	26	3	
Value (£)	69,359	30,974	2,164	876	7,712	241	111,327
Per cent of total value	62.3	27.8	1.9	0.8	6.9	0.2	100
N. America							
Bermuda		Carolina	Chesapeake	Hudson's Bay	New England	Pennsylvania	New York Newfoundland
No. ships	2	8	111	2	37	6	11
Value (£)	615	5,495	35,107	1,448	46,700	2,121	15,031
Per cent of total value	0.6	5.5	34.9	1.4	40.5	2.1	15.0

Source: P.R.O., London port books, E 190/139/1; 141/5; 136/6; 136/4. Values as in tab. 2.

Table 8. Exports of manufactures to English plantations, 1698-1700

	English £	(%)	Foreign £	(%)	Total £	(%)
1698						
W. Indies	130,969.5	(54)	110,646.0	(46)	241,615.5	(100)
N. America	226,161.5	(70)	98,075.0	(30)	324,236.5	(100)
1699						
W. Indies	137,551.0	(52)	129,445.5	(48)	266,996.5	(100)
N. America	222,623.5	(74)	80,154.5	(26)	302,778.0	(100)
1700						
W. Indies	134,735.5	(54)	114,519.0	(46)	249,254.5	(100)
N. America	185,189.0	(71)	75,209.0	(29)	260,398.0	(100)

Source: P.R.O., Cust 2/4; Cust 2/6; Cust 2/8.

Table 9. *Exports from London to West Indies, 1686 (£)*

<i>Textiles</i>	silk	stuffs	6,851	<i>Household/ manufacturing</i>	apothecary	680
		thrown	1,569		barrel hoops	1,370
		wrought	17,176		books	316
		with gold	160		candles	1,236
		and silver, at value			chairs	274
	woollens	bays	1,100		clockwork	30
		cloths	2,239		coals	200
		crepe	22		cordage	1,164
		flannel	2,560		corks	63
		kerseys	287		earthenware	144
		perpetts	475		glass, window	77
		serges	1,229		glasses	2,947
		stuffs	3,847		gunpowder	1,287
		bone lace, at value	883		harness/bridles	204
		cotton	434		leather, tanned	313
		haberdashery	744		paper, at value	119
		linen (English)	178		pipes, tobacco	138
		ribbon, at value	41		saddles	1,116
		<u>39,795</u> (36%)	skins		938	
	<i>Clothing</i>	caps	181		soap	417
		fans	8		starch	175
gloves		1,249	turnery ware	95		
hats		6,405	upholstery	201		
hose		1,586	wax	53		
leather, wrought		1,337	whips	37		
shoes		4,251		<u>13,594</u> (12%)		
wigs		303				
	<u>15,320</u> (14%)	<i>Food</i>				
<i>Metals</i>	brass/copper	2,790	bacon	413		
	iron	6,209	beer	3,294		
	lead	794	biscuit	3,700		
	nails	2,219	butter	793		
	pewter	1,415	cheese	939		
	tinware, at value	93	flour	1,172		
		<u>13,520</u> (12%)	hops	113		
			oatmeal/oats	104		
<i>Bullion</i>	pieces of eight	750 (1%)	peas	97		
			wheat/wheatmeal	116		
			<u>10,741</u> (10%)			
		<i>Miscellaneous</i>				
		bulk parcels ^a (at value)	11,548			
		other	6,059			
			<u>16,579</u> (15%)			
		Total	<u>111,327</u> (100%)			

Note: ^a including goods from most other categories listed (in parcels given a lump value in port books).

Source: P.R.O., London port books, E190/139/1; 141/5; 136/6; 136/4. Values as in tab. 2.

and playing cards, spectacles and looking glasses, parrot cages, and even tombstones (tables 9 and 10).

Table 10. *Exports from London to North America, 1686 (£)*

<i>Textiles</i>	silk	stuffs	8,222	<i>Household/ manufacturing</i>	apothecary	162
		thrown	1,651		books	822
	woollens	wrought	12,571		candles	81
		bays	11,767		chairs, at value	236
		cloths	47		clockwork	13
		crepe	10		coals	209
		flannel	1,641		cordage	3,293
		linsey	160		corks	2
		woolsey			earthenware	91
		perpetts	253		glass, window	89
		serges	6,104		glasses	888
		stuffs	4,601		gunpowder	1,677
	cotton	4,783	harness/bridles		192	
	haberdashery	1,014	pipes, tobacco		137	
	lace, at value	215	saddles		996	
	linen (English)	267	skins		2	
	ribbon, at value	8	soap		85	
	<u>53,314</u> (53%)	starch	149			
<i>Clothing</i>	caps	3	turnery ware	70		
	gloves	909	upholstery	458		
	hats	5,938	whips	<u>3</u>		
	hose	10		<u>9,655</u> (10%)		
	leather, wrought	873				
	shoes	5,158				
	wigs	<u>37</u>				
	<u>12,928</u> (13%)					
<i>Metals</i>	brass/copper	1,229	<i>Food</i>	bacon	1	
	iron	3,157		beer	320	
	nails	4,812		biscuit	631	
	pewter	1,026		butter	71	
	tinware, at value	<u>34</u>		cheese	441	
		<u>10,258</u> (10%)		flour	6	
		hops	18			
		oatmeal/oats	5			
		peas	1			
		wheat/wheatmeal	<u>6</u>			
			<u>1,500</u> (1%)			
<i>Bullion</i>	pieces of eight	975 (1%)	<i>Miscellaneous</i>	bulk parcels ^a		
				(at value)	4,792	
				other	<u>7,122</u>	
				<u>11,914</u> (12%)		
			<i>Total</i>	<u>100,541</u> (100%)		

Note: ^a including goods from most other categories listed (in parcels given a lump value in port books)

Source: P.R.O., London port books, E190/139/1; 141/5; 136/6; 136/4. Values as in tab. 2.

IV

Josiah Child asserted that the migrants to the West Indies had been the most useful in providing employment for those left behind in the mother country: '(In our) West Indian plantations . . . one Englishman with the ten blacks that work for him accounting what they eat, use and wear would make employment for four men in England. . . . Whereas peradventure of ten men that issue from us to New England what we send to or receive

from them does not employ one man in England.⁴⁵ The figures in table 11 suggest that Child overstated his case. The ratio of West Indian white consumption to that of New England was not 40 to one, but would appear to have been at least six to one. The slaves in the West Indies consumed little. In the late 1670s the planter Sir Thomas Lynch required an annual supply of one jacket and one pair of drawers for each male slave and one frock for each woman. Hats, shoes, and stockings, deemed necessary for his white servants and overseers, were not required for slaves.⁴⁶ Meanwhile visitors commented that the whites, who benefited from harnessing black labour to work the land, lived in full enjoyment of 'ease and plenty' and almost all the manufactured goods imported were for their consumption.⁴⁷

Table 11. *Per caput consumption of imports from London*

Colony	Estimated white population in 1680	Value of imports from London, 1686 (£)	Per caput imports
	(1)	(2)	(3)
Barbados	20,000	69,359	3.46
Jamaica	8,000	30,974	3.87
New England	68,000	40,700	0.59
Chesapeake	55,600	35,107	0.63

Sources: col. 1, Dunn, *Sugar and slaves*, pp. 87-8; Zahedieh, 'Trade, plunder and economic development', p. 212; McCusker and Menard, *Economy of British America*, pp. 103, 136; col. 2, tab. 6, above. Values as in tab. 2.

The discrepancy in per caput imports reflects very different levels of wealth in north and south. The evident prosperity of Port Royal, Jamaica, which had a population of 2,931 (2,086 whites and 845 slaves) in 1680 aroused much admiration from visitors.⁴⁸ 'The manner of living there for gallantry, good housekeeping, and recreations (as horse-races, bowls, dancing, musick, plays at a public theatre etc.) sufficiently demonstrate the flourishing condition of the island.'⁴⁹ The surviving probate inventories confirm the picture of ease and comfort: 25 of the 115 Port Royal estates with surviving inventories for the period 1686-94 were valued at over £1,000 and the mean value was £925.⁵⁰ The merchants' inventories demonstrate that the shops were stocked with a vast array of merchandise both everyday and luxury. The townspeople were clearly concerned to cut a fine figure. The common people, though using 'good linen', dressed very simply and lightly as befitted the climate. A woman could be seen in a smock or petticoat, without shoes or stockings but with a straw hat and a tobacco pipe hanging out of her mouth. Thus attired she would wait in 'warlike posture . . . ready to booze a cup of punch with anyone'.⁵¹ Meanwhile, the artisans and tradespeople

⁴⁵ Child, *New discourse*, pp. 207-8.

⁴⁶ B. L., Egerton MS. 2,395, fo. 599, 'An account of necessarys to be sent once a year by Mr Thos. Duck to Sir T. Lynch for his plantation at P. Morant'.

⁴⁷ Institute of Jamaica (hereafter I. J.), MS. 105, John Taylor, 'Mulum in parvo', fo. 500.

⁴⁸ P.R.O., CO 1/45, fos. 97-109, Census of Port Royal, Jamaica, 12 May 1680; Dunn, *Sugar and slaves*, pp. 178-81.

⁴⁹ Hanson, *Laws of Jamaica*, introduction.

⁵⁰ Jamaica Archives, Spanish Town (hereafter J. A.), Inventories, 1686-1694, 1B/11/3, III.

⁵¹ I. J., MS. 105, fo. 504.

had higher social pretensions—to a greater extent than their betters felt appropriate. ‘A cooper’s wife shall go forth in the best flowered silk and in best silver and gold lace that England can afford, with a couple of negroes at her tail.’⁵² As for the great merchants and gentry, it was reported that ‘they live here in the height of splendour in full ease and plenty being sumptuous arrayed and attended on and served by their negro slaves, which always wait on them in livery, or otherwise as they please to clothe them’.⁵³

Visitors reported on the well-built houses, over half of them in brick, four storeys high, covered with tiles, and glazed with sash windows.⁵⁴ The rents were said to be as high as in London and the probate inventories show that homes were well furnished. A survey of the frequency with which consumer items were listed suggests that these townspeople were much more affluent than their northern counterparts and were prosperous even by London standards (table 12).

Henry Morgan, the privateer who died in 1688 worth £5,263, was typical of the merchant planter class.⁵⁵ He possessed one bed with a silk mohair suite of curtains lined with Persian silk and a coverlet appraised at £30, 14 other beds, and 4 hammocks. His 16 leather chairs, 36 cane chairs, 12 pairs of tables, several chests (1 inlaid), glasses, china, linen, knives, and forks suggest generous hospitality. His plate and jewels, 5 looking glasses, a clock, 123 bound books, numerous pictures, sermons, plays, and pamphlets suggest wealth, a surprising touch of piety, and comfort. The 27 guns, 3 pairs of pistols, and 3 swords reflect a violent society and, in fact, 75 per cent of the sample of Port Royal inventories listed 1 or more guns.

The gap between northern and southern levels of imports reflected not only the differences in wealth but also differential opportunities for making a fortune. The picture of the occupational structure of Port Royal, drawn from 112 probate inventories surviving from 1686 to 1692, indicates a very high proportion of merchants (65) and a very small number of craftsmen (10). Why stay in port to labour at a craft when you could serve aboard a privateer, go fishing, turtling, treasure hunting, logwood cutting, or, if you could amass sufficient savings, set about trading commercially or planting cash crops? Port Royal had a flourishing business in building and refitting ships, and the islanders manufactured some other goods in high demand such as barrels and guns.⁵⁶ There were reports that bricks and earthenware were made locally as were some shoes and hammocks.⁵⁷ But this was all petty production. The island depended overwhelmingly on imported goods for maintaining its comfortable life style.

Meanwhile, in the poorer northern colonies, particularly those which lacked a valuable staple export crop and the accompanying purchasing power, there were more serious attempts at import substitution. Some of the efforts were successful. Clark reported that Massachusetts was able to

⁵² Francis Crow to Giles Firmin, 7 March 1686/7, quoted in Dunn, *Sugar and slaves*, p. 285.

⁵³ I. J., MS. 105, fo. 500.

⁵⁴ *Ibid.*, fos. 500, 506.

⁵⁵ J. A., Inventories, 1B/11/3, III, fos. 259-67.

⁵⁶ *Ibid.*, fos. 300, 310.

⁵⁷ B. L., Egerton MS. 2,395, fo. 512, ‘A brief survey of Jamaica’.

Table 12. Frequency of mention of consumer durables in probate inventories (%)

	No. inventories	Pewter	Earthenware	Table linen	Knives/forks	Looking glasses	Books	Clocks	Pictures	Plate
England, 1685	520	93	27	45	1	28	18	9	8	21
London, 1685	—	na	19	na	na	74	17	15	26	na
Port Royal, 1685-9	41	44	27	63	41	68	61	27	24	90
Orphans Court, London, 1685	50	82	56	60	20	86	80	54	58	94
Port Royal, over £225, 1685-9	20	55	40	70	60	80	70	30	35	100
Massachusetts (rural), 1675-99	na	na	34	na	—	29	39	11	—	18

Sources: for England and London, Weatherill, *Consumer behaviour*, pp. 26-7; for Port Royal, J. A., Inventories, 1686-94, 1B/11/3; for Massachusetts, Main, 'Standard of living'.

Table 13. Selected exports from London to American plantations, 1663, 1686, and 1698

	1663			1686			1698		
	Quantity	Unit values (£)	Total value (£)	Quantity	Unit values (£)	Total value (£)	Quantity	Unit values (£)	Total value (£)
Brass: wrought	443 cwt.	9.50	4,209	868 cwt.	4.63	4,019	884 cwt.	4.70	4,156
Cordage	737 cwt.	1.50	1,106	2,669 cwt.	1.67	4,457	10,284 cwt.	1.20	12,340
Hats: castor	—	—	—	1,456 doz.	5.38	8,126	1,988 doz.	6.50	12,923
felt	618 doz.	3.60	2,225	2,034 doz.	2.00	4,068	4,220 doz.	2.10	8,863
Iron: wrought	2,383 cwt.	1.50	3,575	2,635 cwt.	2.77	7,299	9,001 cwt.	2.80	25,202
Leather gloves	521 doz.	0.50	261	7,193 doz.	0.30	2,158	5,921 doz.	0.40	2,368
Nails	884 cwt.	2.00	1,768	3,972 cwt.	1.77	7,031	6,897 cwt.	1.80	12,415
Shoes + wrought leather	56,215 lbs.	0.18	10,119	105,627 lbs.	0.11	11,619	169,450 lbs.	0.10	16,945
Silk: thrown	54 lbs.	0.90	49	2,147 lbs.	1.50	3,220	3,062 lbs.	1.65	5,052
wrought	3,427 lbs.	2.25	7,711	16,998 lbs.	1.75	29,747	19,667 lbs.	1.75	34,418

Source: for 1663, B. L. Add. MS 36,185. Values as given in MS. For 1686, P.R.O., Ergo/139/1; 141/5; 136/6; 136/4; 137/2. Values as in table 2. For 1698, P.R.O., Cust 2/4.

supply itself with shoes by the mid seventeenth century and in 1648 the Boston shoemakers organized themselves into a craft society to regulate the trade.⁵⁸ Shoes were in great demand as they were flimsy and wore out quickly, particularly in the pioneer conditions of the New World. Richard Ligon reported that a white servant in America required 12 pairs of shoes a year.⁵⁹ Meanwhile, the raw material in the form of hides was locally available and both capital and skill requirements of the trade were very modest.⁶⁰ Production could be organized in many ways: domestic production for own use, a commercial by-employment for farmers and others, or through independent full-time craftsmen, who could expand operations through a domestic putting out system, or in large centralized workshops.⁶¹ New England's early success in shoemaking is apparent from the London port books. In 1686 New England, which with about 80,000 people accounted for about one-third of the north American population, imported less than 2,000 lbs. of shoes out of a total of over 36,000 lbs. In the West Indies, where the opportunity cost of shoemaking was higher, the 40,000 or so whites imported almost 30,000 lbs. of shoes.

Tailors, carpenters, coopers, millers, and others also transported their skills to parts of the New World in the same way as shoemakers, but some trades proved less transferable and their products were the most successful English exports to the colonies (table 13). Silkmaking, requiring as it did expensive imported raw materials, and being labour and skill intensive, stood no chance of success in the colonies with abundant land but little capital and scant labour. But other more everyday items were also difficult to transplant and were not produced on any scale in the colonies until the eighteenth century. Headdress was, like shoes, an integral part of the costume of all classes of society. 'There is not one commodity that is more universal, or that the people love to have in a better decorum than a hat.'⁶² But the manufacture of felt hats, which increasingly replaced the rough, woollen caps worn since the middle ages, had high requirements in terms of capital and skill. Expensive raw materials (beaver or coney fur) and complex manufacturing processes needed strict supervision of labour to avoid losses through spoiling and embezzlement.⁶³ As a result it took some time to establish the industry in America. At the end of the seventeenth century Massachusetts hatters petitioned for permission to form a regulated craft society like that of the shoemakers but permission was refused until the local producers could make hats as well and as cheaply as imports.⁶⁴ It

⁵⁸ Clark, *History of manufactures*, I, p. 66; Bridenbaugh, *Colonial craftsman*, pp. 1-7, 33-64; Hazard, *Boot and shoe industry*, pp. 3-24.

⁵⁹ Ligon, *History of Barbados*, pp. 109, 115.

⁶⁰ The irony of the availability of raw materials and the colonists' frequent failure to use them, particularly in the richer southern colonies, was not lost on contemporaries. Robert Beverley remarked that in Virginia 'most of the hides lie and rot or are made use of only for covering dry goods, in a leaky house . . . to the eternal reproach of their laziness': Beverley, *History and state of Virginia*, p. 295.

⁶¹ Commons, 'American shoemakers', pp. 39-84; Russo, *Free workers*; Hazard, *Boot and shoe industry*, pp. 3-24.

⁶² Anon., *Proposal for raising the sum*.

⁶³ Hats and hat making in the 1680s are described in Holme, *Academy of armory*, pp. 129, 291. See also Corner, 'Tyranny of fashion'.

⁶⁴ Clark, *History of manufactures*, I, p. 66.

seems that the Americans were not able to compete effectively with English hatters for another two or three decades.⁶⁵

Table 14. *Export of hats to plantations, 1686*

	value (£)	West Indies		North America	
		no. shipped	total value (£)	no. shipped	total value (£)
Beaver	0.88	220	194	49	43
Caster	0.47	10,936	5,140	6,353	2,986
Felt	0.17	6,818	1,159	17,113	2,909

Source: P.R.O., E190/139/1; 141/5; 136/6; 136/4. Values as in tab. 2.

In the sixteenth century England had imported felt hats from Europe, and the Tudors had made a deliberate attempt to foster a native industry encouraging European hatters to settle.⁶⁶ Such was the success of the felt hat that, by the 1690s, annual consumption was estimated at about three million (0.6 per head).⁶⁷ The hatters successfully lobbied to protect this market from foreign suppliers and high import duties were imposed in 1660. Attempts to promote exports to Europe foundered since the Europeans were well able to make their own hats, but the growing new colonial market presented exciting opportunities. The number of hats exported from London to the plantations increased almost sixfold from about 7,400 in 1663 to 41,500 in 1686 (table 14), when the 40,000 or so whites in the West Indies imported about 18,000 hats (almost 0.5 per head) and the 200,000 North Americans imported about 23,500 (almost 0.1 per head). Contemporaries reported that London had a virtual monopoly of the export trade and, furthermore, the bulk of the hats shipped were produced there rather than in the provinces.⁶⁸ Thus, colonial demand was a significant addition of between 12 and 13 per cent to the London market, which consumed about 300,000 hats a year. The trade generated a good deal of employment.

V

It was not only the size of the colonial market which made it important but also its nature. The long-distance trade encouraged moves towards bulk manufacture and a more standardized product, though it did not mean the extreme degree of product standardization associated with twentieth-century mass-produced goods. The way in which wealth and fashion influenced the

⁶⁵ In 1732 an act was passed which prohibited export of hats manufactured in America to another colony or to Europe. It seems that New England manufacturers had begun to export to Spain and the West Indies and continued to do so despite the legislation: *ibid.*, p. 23. There were other examples of successful import substitution, and demand for British manufactured goods grew more slowly than population: Schumpeter, *English trade statistics*, pp. 63-72. On the rise of import substitution see Carr and Walsh, 'Economic diversification'; Russo, 'Self-sufficiency and local exchange'.

⁶⁶ Unwin, *Industrial organization*.

⁶⁷ Anon., *Proposal for raising the sum*.

⁶⁸ Corner, 'Tyranny of fashion', p. 155. London's domination of the export trade is confirmed in the Inspector General's figures for the 1690s. In 1698 London exported hats to the value of £24,926 (76%) and the outports to the value of £7,975 (24%).

market is demonstrated by the sale of additional quantities of hats which were also individually more expensive in the West Indies than in North America (table 14). The inventories of Jamaican shopkeepers list a wide range of product styles and colours. Goods described as 'out of fashion' had little value, demonstrating the fickleness of the customers.⁶⁹ Merchants such as William and Francis Hall sent their correspondents detailed information about which colours and styles were popular. For example, in 1688 they requested Thomas Brailsford to send blue, purple, and scarlet hose which were in high demand, but to take care to avoid sending carnation-coloured hose which were out of vogue. The Halls frequently requested 'new, pretty things' and stressed that anything 'in fashion with you' would do well.⁷⁰ But the nature of the colonial market did mean that, while fashion and novelty were important, there was less possibility of a 'face to face' relationship between producer and consumer and much less scope for bespoke production, particularly for accessories such as hats. Back in London, in 1663, Samuel Pepys records how he acquired a hat made to order by one Mr Holden; meanwhile, in Port Royal, gentlemen bought bulk-produced goods from merchant importers.⁷¹ Jamaican inventories show that hats were held in batches of a dozen, or even a gross, and in standard sizes for men, women, and youths. Styles and decoration were also standardized; for example Richard May of Port Royal held '12 fine Carolina hatts edged with gold'.⁷² Thus, producers could make medium or long runs of a uniform product in standard sizes, which enhanced opportunities for cost cutting and, no doubt, hastened the concentration of trade into the hands of men with large amounts of capital at their disposal.⁷³ And indeed Corner has shown that the system of production which emerged in late seventeenth-century London hat-making was characterized by a small number of wealthy entrepreneurs who maintained centralized workshops which employed large numbers of workers to perform the more complex and capital intensive processes (such as finishing and dyeing). They put out materials on credit to dependent producers to perform the simpler processes, or to fulfil orders when their own workshop capacity was at its limit.⁷⁴

The organization of industry in large workshops and the concentration of production into fewer hands became increasingly common in other late seventeenth-century export industries—shoemaking, ribbon-making, silk-making, the ready-made clothing trades, furniture-making, bottle-making, metal trades, and so on. But innovation was not in these years confined to organizational techniques. There was also a greatly increased use of machinery, some of which had been developed much earlier. There were many reasons for the accelerated take-up of new technology, including rising real wages, the decline of the guilds, and influxes of European immigrants,

⁶⁹ J. A., Inventories, 1B/11/3, III, fo. 251.

⁷⁰ P.R.O., C110/152, Brailsford Papers, Halls to Brailsford, 10 Sept. 1688, 21 May 1689.

⁷¹ Latham and Matthews, eds., *Diary of Samuel Pepys*, IV, pp. 274, 280.

⁷² J. A., Inventories, 1B/11/3, III, fo. 394. Holme describes the way in which shoes were sized: Holme, *Academy of armory*, pp. 129, 291.

⁷³ Some of the issues raised here are discussed in more detail in Styles, 'Manufacturing, consumption and design'.

⁷⁴ Corner, 'Tyranny of fashion'.

particularly in the 1680s, but the new, expanding opportunities to market wares in the colonies added to the pressure in the same direction. The knitting frame was invented in 1589 but was not used widely until the late seventeenth century. The ribbon or Dutch loom was introduced in 1616 but again not much used until the end of the century. Other examples of new ingenuity include multi-spindle mills for silk-throwers, wheel-cutting machines in watchmaking, and a tobacco-shredding machine. A different type of innovation can be seen in many metal trades when casting and foundry work were becoming more important.⁷⁵ In the 1690s John Cary remarked on how the 'new ingenuity' had reduced prices of manufactures to half what they had been a few years earlier, while wages had been maintained, so tending to increase consumption

(which) proceeds from the ingenuity of the manufacturer and the improvements he makes in his ways of working. . . . New projections are every day set on foot to render the making of our manufactures easy, which are made cheap by the heads of the manufacturers, not by falling the price of poor people's labour; cheapness creates expense and expense gives fresh employment, so the poor need not stand idle if they could be persuaded to work.⁷⁶

VI

Thus, the needs of the 250,000 or so Englishmen living in what were effectively 'detached suburbs' across the Atlantic, with little industry of their own and a protected market, offered an important stimulus to London industry by size of demand and also by its quality. A more standardized, uniform product market provided opportunities for enhanced labour productivity. Part of the demand was already supplied from the provinces, where costs, particularly wages, were lower. In 1651 Richard Ligon advised a merchant to purchase Monmouth caps from Wales, shoes and boots from Northampton, gloves from Somersetshire, and iron pots from Sussex.⁷⁷ But in the seventeenth century a large proportion of the goods, particularly the more sophisticated items, were undoubtedly produced in London, which with a wide range of skills, more capital, better information, and the advantage of a concentration of consumers, was the leading manufacturing centre in Britain. Industry accounted for 40 per cent or more of the city's employment and not until the eighteenth century did the development of provincial skills, capital resources, and better transport networks push it from its pinnacle.⁷⁸

Historians have not fully worked out the links between the rapid growth of London in the seventeenth century and English economic development. But there is general agreement that the city's expansion was one of the most important aspects of the early modern period and that it had positive effects on long-term growth.⁷⁹ Servicing the transatlantic customers in the colonies

⁷⁵ Earle, *Making of the English middle class*, pp. 19-29.

⁷⁶ Cary, *State of England*, pp. 147-8.

⁷⁷ Ligon, *History of Barbados*, pp. 109-10.

⁷⁸ Beier, 'Engine of manufacture'.

⁷⁹ Wrigley, 'Urban growth'.

by manufacturing, packing, exchanging, and shipping goods to the plantations was obviously an important link in the chain. Migration out of a Malthusian trap to the New World had provided not only a temporary relaxation of population pressure on resources—a valuable breathing space—but also enhanced employment opportunities for those left at home. A new market was opened up which, with the protection of the Navigation Acts, was almost entirely reserved for England. Extensive growth across the Atlantic meant that large numbers of transplanted Englishmen were saved from being ‘hanged or starved’ while at the same time, with the help of slaves, they produced goods worth over £1 million by 1686 and thus became valuable customers purchasing miscellaneous manufactures of all sorts imaginable.⁸⁰ Increased specialization encouraged improvements in technique and organization, raising productivity. As Child remarked, the loss of people to the plantations was far from being a charge, as ‘the employment of those people abroad do cause the employment of so many more at home in their mother kingdom’. The new market stimulated innovation, initiative, and enterprise and was a ‘valuable strength to the mother country’.⁸¹

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⁸⁰ Child, *New discourse*, pp. 176-83. On the continuing ‘Americanization’ of British trade in the eighteenth century see O’Brien and Engerman, ‘Exports and the growth of the British economy’.

⁸¹ Child, *New discourse*, p. 183.

Footnote references

- Anon., *A proposal for raising the sum of £200,000 or more per annum . . . by a duty being laid upon all sorts of hats* (c. 1692).
- Ashton, T. S., ‘Introduction’, in E. B. Schumpeter, ed., *English overseas trade statistics, 1697-1808* (Oxford, 1960), pp. 1-14.
- Bailyn, B., *The New England merchants in the seventeenth century* (Cambridge, Mass., 1955).
- Bailyn, B., *Voyagers to the west: a passage in the peopling of America on the eve of revolution* (New York, 1986).
- Bean, R. N., ‘Food imports into the British West Indies: 1680-1845’, *Annals New York Acad. Sci.*, 292 (1979), pp. 581-96.
- Beer, G. L., *The origins of the British colonial system, 1578-1660* (New York, 1908).
- Beier, A. L., ‘Engine of manufacture: the trades of London’, in A. L. Beier and R. Finlay, eds., *The making of the metropolis: London, 1500-1799* (1986).
- Beverly, R., *History and present state of Virginia*, ed. L. B. Wright (Chapel Hill, N.C., 1946).
- Bridenbaugh, C., *The colonial craftsman* (New York, 1950).
- Bridenbaugh, C., *Vexed and troubled Englishmen, 1609-1642* (New York, 1967).
- Campbell, M., ‘Of people either too few or too many’, in W. A. Aitken and B. O. Henning, eds., *Conflict in Stuart England: essays in honour of Wallace Notestein* (1960), pp. 169-201.
- Carr, L. G. and Walsh, L. S., ‘Economic diversification and labour organization in the Chesapeake, 1650-1820’, in S. Innes, ed., *Work and labour in early America* (1988), pp. 144-88.
- Cary, J., *An essay on the state of England in relation to its trade* (Bristol, 1695).
- Chambers, J. O., *Population, economy and society in pre-industrial England* (1972).
- Child, J., *A new discourse of trade* (1692).
- Clark, V. S., *A history of manufactures in the United States* (Washington, D.C., 1929).
- Coleman, D. C., ‘Labour in the English economy of the seventeenth century’, *Econ. Hist. Rev.*, 2nd ser., VIII (1955-6), pp. 280-95.
- Commons, J. R., ‘American shoemakers, 1648-1895: a sketch of industrial evolution’, *Qu. J. Econ.*, 24 (1910), pp. 39-84.
- Corner, D., ‘The tyranny of fashion: the case of the felt-hatting trade in the late seventeenth and eighteenth centuries’, *Text. Hist.*, 22 (1991), pp. 153-78.
- Davenant, C., *On the plantation trade* (1698).
- Davies, K. G., *The Royal African Company* (1957).
- Davis, R., ‘English foreign trade: 1660-1700’, *Econ. Hist. Rev.*, 2nd ser., VII (1954), pp. 150-66.

- Deerr, N., *The history of sugar*, 2 vols. (1949).
- Dunn, R. S., *Sugar and slaves: the rise of the planter class in the English West Indies, 1624-1713* (Chapel Hill, N.C., 1973).
- Earle, P., *The making of the English middle class* (1989).
- Eburne, R., *A plain pathway to plantations* (1624).
- Fairlie, S., 'Dyestuffs in the eighteenth century', *Econ. Hist. Rev.*, 2nd ser., xvii (1964-5), pp. 488-510.
- Galenson, D. W., *White servitude in colonial America* (Cambridge, 1981).
- Gemery, M. A., 'Emigration from the British Isles to the New World, 1630-1700: inferences from colonial populations', *Res. Econ. Hist.*, v (1980), pp. 179-231.
- Goldstone, J. A., 'The demographic revolution in England: a re-examination', *Pop. Stud.*, 49 (1986), pp. 5-33.
- Gray, R., *A good speed to Virginia* (1609).
- Habakkuk, H. J., 'Population growth and economic development', in *idem*, *Lectures on economic development* (1958).
- Hanson, F., ed., *Laws of Jamaica* (1683).
- Harte, N. B., 'The economics of clothing in the late seventeenth century', *Text. Hist.*, 22 (1991), pp. 277-96.
- Harper, L. A., *The English navigation laws: a seventeenth-century experiment in social engineering* (New York, 1939).
- Hazard, B. E., *The organization of the boot and shoe industry in Massachusetts before 1875* (Cambridge, Mass., 1921).
- Holme, R., *The academy of armory or a storehouse of armory and blazon* (Chester, 1688).
- Jeaffreson, C., ed., *A young squire of the seventeenth century: from the papers of Christopher Jeaffreson (AD 1676-1686)* (1878).
- King, G., *Natural and political observations and conclusions upon the state and condition of England, 1696* (1804).
- Latham, R. and Matthews, W., eds., *The diary of Samuel Pepys*, 11 vols. (1971).
- Ligon, R., *A true and exact history of the island of Barbados* (1657).
- McCusker, J. and Menard, R., *The economy of British America, 1607-1789* (Chapel Hill, N.C., 1985).
- Main, G. L., 'The standard of living in southern New England, 1640-1793', *Wm. & Mary Qu.*, 3rd ser., xlv (1988), pp. 124-34.
- Nash, R. C., 'English transatlantic trade, 1660-1730: a quantitative study' (unpub. Ph.D thesis, Univ. of Cambridge, 1982).
- O'Brien, P. K. and Engerman, S. L., 'Exports and the growth of the British economy from the Glorious Revolution to the Peace of Amiens', in B. L. Solow, ed., *Slavery and the rise of the Atlantic system* (Cambridge, 1991), pp. 177-209.
- Palliser, D. M., 'Tawney's century: brave new world or Malthusian trap?', *Econ. Hist. Rev.*, 2nd ser., xxxv (1982), pp. 339-53.
- Pares, R., *Yankees and Creoles: the trade between North America and the West Indies before the American Revolution* (Cambridge, Mass., 1956).
- Pares, R., *Merchants and planters*, *Econ. Hist. Rev.*, supplement, 4 (Cambridge, 1960).
- Phelps Brown, E. M. and Hopkins, S. V., 'Seven centuries of building wages', *Economica*, 2nd ser., xxii (1955), pp. 95-206.
- Phelps Brown, E. M. and Hopkins, S. V., 'Seven centuries of the prices of consumables, compared with builders' wage rates', *Economica*, 2nd ser., xxiii (1956), pp. 296-314.
- Phelps Brown, E. M. and Hopkins, S. V., 'Wage rates and prices: evidence for population pressure in the sixteenth century', *Economica*, 2nd ser., xxiv (1957), pp. 287-306.
- Russo, J. B., 'Self-sufficiency and local exchange: free craftsmen in the rural Chesapeake', in L. G. Carr, P. D. Morgan, and J. B. Russo, eds., *Colonial Chesapeake society* (Chapel Hill, N.C., 1988), pp. 389-432.
- Russo, J. B., *Free workers in a plantation economy: Talbot County, Maryland, 1690-1759* (New York, 1989).
- Schumpeter, E. B., *English overseas trade statistics, 1697-1808* (Oxford, 1960).
- Shammas, C., *The pre-industrial consumer in England and America* (Oxford, 1990).
- Smith, A. E., *Colonists in bondage: white servitude and convict labour in America, 1607-1776* (Chapel Hill, N.C., 1947).
- Styles, J., 'Manufacturing, consumption and design in eighteenth-century England', in J. Brewer and R. Porter, eds., *Consumption and the world of goods in the seventeenth and eighteenth centuries* (1992), pp. 527-54.
- Symonds, W., *Virginia: a sermon preached at White-Chapel* (1609).
- Thomas, D., *An historical account of the West India colonies* (1690).
- Tryon, T., *Health's grand preservative* (1682).
- Tryon, T., *The way to health, long life and happiness* (1691).

- Unwin, G., *Industrial organization in the sixteenth and seventeenth centuries* (Oxford, 1904).
- Ward, J. R., 'The profitability of sugar planting in the British West Indies, 1650-1834', *Econ. Hist. Rev.*, 2nd ser., XXXI (1978), pp. 197-213.
- Weatherill, L., *Consumer behaviour and material culture in Britain, 1660-1760* (1988).
- Wrigley, E. A., 'A simple model of London's importance in changing English society and economy, 1650-1750', *P. & P.*, 37 (1967), pp. 44-70.
- Wrigley, E. A., 'Urban growth and agricultural change: England and the continent in the early modern period', *J. Interdisc. Hist.*, xv (1985), pp. 683-728.
- Wrigley, E. A. and Schofield, R. S., *The population history of England, 1541-1871: a reconstruction* (Cambridge, 1981).
- Zahedieh, N., 'The merchants of Port Royal, Jamaica, and the Spanish contraband trade, 1655-1692', *Wm. & Mary Qu.*, 3rd ser., XLIII (1986), pp. 579-93.
- Zahedieh, N., 'Trade, plunder and economic development in early English Jamaica, 1655-89', *Econ. Hist. Rev.*, 2nd ser., XXXIX (1986), pp. 205-22.

Official publications

Calendar of State Papers, Colonial Series: America and the West Indies, 1686-8 (1879).