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978-0-521-88185-2 - Food, Energy and the Creation of Industriousness: Work and Material Culture in Agrarian England, 1550-1780

Craig Muldrew

Excerpt

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## 1 Introduction

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'Tis Labour then which puts the greatest part of Value upon Land, without which it would scarcely be worth any thing ... For 'tis not barely the Plough-man's Pains, the Reaper's and Thresher's Toil, and the Baker's Sweat, is to be counted into the Bread we eat; the Labour of those who broke the Oxen, who digged and wrought the Iron and Stones, who felled and framed the Timber employed about the Plough, Mill, Oven, or any other Utensils, which are a vast Number, requisite to this Corn, from its being seed to be sown to its being made Bread, must all be charged on the account of Labour ... 'Twould be a strange Catalogue of things, that Industry provided and made use of, about every Loaf of Bread, before it came to our use, if we could trace them; Iron, Wood, Leather, Bark, Timber, Stone, Bricks, Coals, Lime, Cloth, Dying-Drugs, Pitch, Tar, Masts, Ropes, and all the Materials made use of in the Ship, that brought any of the Commodities made use of by any of the Workmen.

John Locke, *Two Treatises of Government*<sup>1</sup>

[O]ur *People* are strong and able for Work at Home ... and naturally as ingenious, industrious, and willing to labour as any part of Mankind, so long as they can have a reasonable fruit of their Labours.

William Petyt, *Britannia Languens or a Discourse on Trade*<sup>2</sup>

Two shillings and sixpence a day, will undoubtedly tempt some to work, who would not touch a tool for one shilling. A fellow that has been used to lounge at home, in an idle cottage, may be tempted out by high wages, though not by low ones: Another that in cheap times used to bask himself all day in the sun, holding a cow by a line to feed on a balk in dear ones, betakes himself to the pick-ax and the spade. In a word, idle people are converted by degrees into industrious hands; youths are brought forward to work; even boys perform their share, and women at the prospect of great wages clap their hands with cheerfulness, and fly to the sickle. Thus a new race of the

<sup>1</sup> John Locke, *Two Treatises of Government*, ed. Peter Laslett (New York, 1963), Second Treatise, §43, p. 298.

<sup>2</sup> William Petyt, *Britannia Languens or a Discourse on Trade* (London, 1680), in J. P. McCulloch, *A Select Collection of Early English Tracts on Commerce* (Cambridge, 1954), p. 313.

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industrious is by degrees created, and its increase is proportioned to its creation; an effect so undoubted, that any village in this country might by an increasing employment be presently raised to a *Sheffield*, or a *Birmingham*.

Arthur Young, *A Six Month Tour through the North of England*<sup>3</sup>

This book begins with food and ends with work. Its aim is to examine the living standards of agricultural labourers in much greater detail than has been attempted until now. In doing so it will advance two central theses about the early modern period. One is that the culture of eating needs to be given more importance, because the calories contained in the food consumed by labourers were the petrol of the early modern economy. The other concerns the changing demand for labour in the economy over time. By the early seventeenth century a growing population meant that the supply of labour started to outgrow demand. This is a situation well known to historians who have drawn on the evidence of rapidly rising food prices compared to more slowly rising wages. Lack of rural employment led to increased labour mobility as the young took to the road in search of work, and the poor laws were established to deal with the growing problem of relieving the sick and elderly without family or community support.<sup>4</sup> However, after the mid-seventeenth century this situation was reversed and demand for labour outstripped supply. There were a number of reasons for this, including the emigration of a considerable number of young men to the New World and much slower population growth after 1650. At the same time, however, by the early seventeenth century rising food prices began to motivate farmers to engage in 'improving' their farms to profit by selling more food. This had the effect of increasing the demand for agricultural labour to increase crop production. Agricultural historians have debated when crop yields went up, but certainly by 1700 England was producing enough grain to start exporting a surplus to the continent in most years once population stabilised. The increased availability of food energy produced by agriculture also led to an increased number of people being able to work in non-primary sectors of the economy, such as shop keeping or cloth production. E. A. Wrigley has estimated that the percentage of the population engaged in primary agricultural production fell from 76 per cent in 1520 to only 36 per cent by 1801.<sup>5</sup>

<sup>3</sup> Arthur Young, *A Six Month Tour through the North of England* (London, 1771), I, pp. 175–6.

<sup>4</sup> See the excellent summary in Keith Wrightson, *Earthly Necessities: Economic Lives in Early Modern Britain* (New Haven, 2000), pp. 115–31, 145–9, 194–201.

<sup>5</sup> E. A. Wrigley, 'Urban Growth and Agricultural Change: England and the Continent in the Early Modern Period', in E. A. Wrigley, *People, Cities and Wealth* (Oxford, 1987), pp. 170.

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In absolute terms this meant that the population engaged in agriculture in 1800 was about 3,140,000, compared to 2,870,000 in 1600, even though the amount of land under cultivation had increased considerably and crop yields were much higher. This certainly suggests that agricultural labour had become more productive over this period. Authors who advocated 'improvement' also promoted the 'industriousness' of labour as necessary for improvement. More employment would eventually lead to more production and more wealth for all, including those who laboured. This is indicated by the quotations given above, even if they were expressed with the buoyant optimism of proselytisers.

Trends in standards of living have hitherto been dominated by the measurement of real wages; that is the purchasing power of money wages over time. But, here, I intend to look at the relationship of standards of living to the nature of work in much more detail. The nature of the alleged improvement in the industry of labour will be examined using material drawn from a wide range of sources, including pamphlets, published budgets, many account books and probate inventories taken of the goods of labourers when they died. The examination of food in this context is especially important, because it not only represents a vital aspect of labourers' material standard of living, but was equally the essential source of energy for the early modern economy. Although coal was increasingly being used in certain industrial applications after 1580 and water and wind power were also harnessed by mills and ships, most of the economy relied on human and animal power. E. A. Wrigley has termed this an organic economy, implying that the main form of energy came from food production.<sup>6</sup> He has also persuasively shown how the increasing energy available from crops grown to feed horses led to more animal energy being available in the eighteenth century.<sup>7</sup> But horses did not replace human labour; rather they allowed, for instance, more things to be carried from place to place, or ground to be ploughed more often. Both these activities would have also required more human labour to load and unload carts, to drive the horses and to look after them. This labour required calories supplied by food.

The chronology of this study will range from the mid-sixteenth century to about 1780. Inevitably there will be more discussion of the later part of the period because more records exist. I will also draw on

<sup>6</sup> E. A. Wrigley, *Continuity, Chance and Change: The Character of the Industrial Revolution in England* (Cambridge, 1988), pp. 27, 34ff.; Paul Warde, *Energy Consumption in England and Wales, 1560–2000* (Istituto di Studi sulle Società del Mediterraneo, 2007), ch. 2.

<sup>7</sup> E. A. Wrigley, 'The Transition to an Advanced Organic Economy: Half a Millennium of English Agriculture', *Economic History Review*, 59 (2006), pp. 435–80.

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sources from all over England, discussing regional differences wherever appropriate. It needs to be kept in mind that different regional patterns of manorial custom concerning levels of rent or entitlements to common land could affect standards of living in a way which is impossible to measure nationally. Gathering data on labourers is difficult because they left few of their own records. However, I hope I have unearthed a sufficient amount of information to do the subject justice.

I have chosen to stop in 1780 to avoid the question of living standards during the industrial revolution, which has been debated at length.<sup>8</sup> This is a quite conscious decision, as the rapidly expanding growth of population after about 1775, together with the rapid wartime inflation which lasted well into the nineteenth century, created a situation which was significantly different for labour from that in the early part of the eighteenth century. By 1820 the very nature of living for many was being changed by the growth of industrial cities, and this has a different historiography. However, since current work focuses more on long-term gradual industrialisation which began in the early modern period, the results of this study will certainly be able to shed light on this question.<sup>9</sup>

Even though I have chosen to stop before the end of the eighteenth century, no study of labouring households can afford not to use the work of the Rev. Mr David Davies and Sir Frederick Eden. Both of these individuals were motivated to investigate the living standards and earnings of labouring households in the 1790s because of the hardships brought about by the very rapid rise in food prices. By the end of the eighteenth century enlightened reformers had gathered data on a wide variety of subjects, including farming techniques, prison conditions and the condition of slaves, in order to provide empirical arguments for reform. This is what Eden and Davies set out to do for labourers, in order to show how their poverty might be alleviated. Davies had been a manager of a sugar plantation in Barbados in his early life, who returned to England in 1771 at the age of twenty-seven to become a tutor. He subsequently took holy orders and became deacon of Barkham, Berkshire in 1782, where he remained until his death in 1819.<sup>10</sup> He undertook his work,

<sup>8</sup> The debate is discussed in Martin Daunton, *Progress and Poverty: An Economic and Social History of Britain 1700–1850* (Oxford, 1995), ch. 16; Gregory Clark, Michael Huberman and Peter H. Lindert, 'A British Food Puzzle, 1770–1850', *Economic History Review*, 48 (1995), pp. 215–37; Charles Feinstein, 'Pessimism Perpetuated: Real Wages and the Standard of Living in Britain During the Industrial Revolution', *Economic History Review*, 58 (1998), pp. 625–58.

<sup>9</sup> E. A. Wrigley, 'The Quest for the Industrial Revolution', in E. A. Wrigley, *Poverty, Progress and Population* (Cambridge, 2004), pp. 17–43.

<sup>10</sup> Pamela Horn, 'Davies, David (1742–1819)', *Oxford Dictionary of National Biography* (Oxford, 2004), [www.oxforddnb.com/view/article/7229](http://www.oxforddnb.com/view/article/7229), accessed 19 May 2009.

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entitled *The Case of the Labourers in Husbandry Stated and Considered*, out of concern for the increasing poverty of agricultural labourers in his parish, which he expanded to include reports on the condition of rural workers elsewhere.<sup>11</sup> Eden also had colonial connections, being the son of the governor of Maryland. He lived in London and was chairman of the Globe Insurance Company, but became interested in the active debates over the question of how best to manage poor relief and to encourage the poor to save more as insurance for sickness and old age.<sup>12</sup> His three-volume investigation was entitled *The State of the Poor, or a History of the Labouring Classes in England*. In his preface he stated:

The difficulties, which the labouring classes experienced, from the high price of grain, and of provisions in general, as well as of clothing and fuel, during the years 1794 and 1795, induced me, from motives both of benevolence and personal curiosity, to investigate their condition in various parts of the kingdom. As I advanced in my enquiries, the subject became so interesting, that I persuaded myself the result would be acceptable to the Public, if I might be able to lay before them accurate details respecting the present state of the Labouring part of the community, as well as the actual Poor.<sup>13</sup>

As befitting someone who worked in the expanding insurance industry he set out to discover information through a parish-based questionnaire asking such questions as:

The extent and population of the parish?  
Occupations of parishioners, whether in agriculture,  
commerce, or manufactures?  
What manufactures?  
Price of provisions?  
Wages of labour?  
Rent of land, and land-tax on the net rental?  
Number of inns or ale-houses?  
Farms large or small? Principal articles of cultivation?  
Commons and waste-lands?  
How are the Poor maintained?  
Houses of industry (if any,) their state; numbers therein,  
and the annual mortality; diet; expenses, and profit, since  
their establishment?  
Number of Friendly Societies?  
Usual diet of labourers?

<sup>11</sup> David Davies, *The Case of the Labourers in Husbandry Stated and Considered* (London, 1795; reprinted 1977).

<sup>12</sup> Donald Winch, 'Eden, Sir Frederick Morton, second baronet (1766–1809)', *Oxford Dictionary of National Biography* (Oxford, 2004), [www.oxforddnb.com/view/article/8450](http://www.oxforddnb.com/view/article/8450), accessed 19 May 2009.

<sup>13</sup> Sir Frederick Morton Eden, *The State of the Poor, or a History of the Labouring Classes in England*, 3 vols. (London, 1797), I, pp. i–vi.

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Earnings and expenses of a labourers' family for a year: distinguishing the number and ages of the family members?

Some parishes he visited himself, but he also used information collected by agents. As a result of the systematic nature of his investigation, his book is hugely valuable.<sup>14</sup>

I will also focus almost exclusively on agricultural labourers and servants in husbandry for the same reason given by David Davies at the beginning of his work:

For the bulk of every nation consists of such as must earn their daily bread by daily labour ... It is chiefly on these that every nation depends for its population, strength, and security. All reasonable persons will therefore acknowledge the equity of ensuring to them at least the necessary means of subsistence.

... But of all the denominations of people in a state, *the labourers in husbandry* are by far the most valuable. For these are the men, who, being constantly employed in the cultivation of the earth, provide the staff of life for the whole nation. And it is the wives of these men, who rear those hardy broods of children, which, besides supplying the country with the hands it wants, fill up the voids which death is continually making in camps and cities. And since they have thus a peculiar title to public regard, one might expect to see them every where comfortably accommodated. Yet even in this kingdom, distinguished as it is for humanity and political wisdom, they have been for some time past suffering peculiar hardships. To make their case known, and to claim for them the just recompense of their labour, is the chief purpose of this publication.<sup>15</sup>

Agricultural labourers had a different set of skills from other workers, though equally developed, and it will be part of my argument that we need to consider labourers, or what is often termed the 'labouring poor', as a more diffuse group of people, with different skills and work habits. Thus the term used here will be 'labourers' rather than the 'labouring poor', although of course many were poor. But, as indicated in the quotation from Eden given above, the poor in need of relief were considered a different, more destitute group than the labouring poor. It has been estimated that rarely did those on relief form more than 5–6 per cent of parish populations at any one time. Of course, many labouring families found themselves in need of relief at some point in their lives course, and Steve Hindle has described how many labouring families also survived through 'shift', that is combining numerous odd jobs. But since there is a much larger historiography of the poor on relief, I will focus on those labourers in employment, and the nature of the demand for their labour.<sup>16</sup>

<sup>14</sup> Idem. <sup>15</sup> Davies, *Case of Labourers*, pp. 1–3.

<sup>16</sup> Steve Hindle, *On the Parish: The Micro-Politics of Poor Relief in Rural England c. 1550–1750* (Oxford, 2004), pp. 271ff.

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Another reason for examining agricultural labourers separately from other workers such as miners, weavers, combers, building workers or porters is that although agricultural labourers were paid wages, they were less vulnerable to the problems created by the shortage of small coins in the economy. Agricultural workers could be paid their wages in food, pasture and rent because they were usually working for larger farmers in their neighbourhood. In contrast, industrial workers had to rely more on credit because the lack of coins made paying regular wages difficult.<sup>17</sup> Industrial workers were also much more vulnerable to long periods of unemployment caused by rapidly changing market demand for the products manufactured, whereas food was always in demand somewhere.

Excellent work has also been done on the living standards of building labourers in the north of England in this period by Donald Woodward, and on coal miners in the parish of Wickham by David Levine and Keith Wrightson.<sup>18</sup> But although many historians have discussed living standards, no one has focused specifically on agricultural labourers since Alan Everitt's essay on the subject published over forty years ago in volume IV of the *Agrarian History of England and Wales*.<sup>19</sup> I will also focus on England, because living standards for Scotland have been examined by Alex Gibson and Christopher Smout in their *Prices, Food and Wages in Scotland 1550-1780*, which looks at food consumption and nutrition of the poor through various diets, as well as providing a history of wages and prices.<sup>20</sup> Clarkson and Crawford's *Feast and Famine* also deals with the diet of the poor in Ireland over the long term from 1500 to 1920, although it does not examine housing, work or wages.<sup>21</sup>

As already suggested, most work on the question of standards of living has focused on the best way to construct real wage series to track change over time. This is typically done by looking at evidence of daily

<sup>17</sup> Craig Muldrew, 'Wages and the Problem of Monetary Scarcity in Early Modern England', in Jan Lucassen (ed.), *Wages and Currency: Global Comparisons from Antiquity to the Twentieth Century* (Berne, 2007), pp. 391-410.

<sup>18</sup> Donald Woodward, *Men at Work: Labourers and Building Craftsmen in the Towns of Northern England, 1450-1750* (Cambridge, 1995); David Levine and Keith Wrightson, *The Making of an Industrial Society: Wickham 1560-1765* (Oxford, 1991).

<sup>19</sup> Alan Everitt, 'Farm Labourers', in *AHEW*, IV, pp. 396-465. Leigh Shaw-Taylor, however, has dealt with the effect of enclosure on the labouring poor after 1750. Leigh Shaw-Taylor, 'Proletarianisation, Parliamentary Enclosure and the Household Economy of the Labouring Poor, 1750-1850', University of Cambridge Ph.D. thesis, 1999.

<sup>20</sup> A. J. S. Gibson and T. C. Smout, *Prices, Food and Wages in Scotland 1550-1780* (Cambridge, 1995).

<sup>21</sup> L. A. Clarkson and E. Margaret Crawford, *Feast and Famine: Food and Nutrition in Ireland 1500-1920* (Oxford, 2001).



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food consumption, together with the cost of clothes, fuel, rent and other household costs, to create a 'typical' 'basket of consumables' bought over the course of a year, for a family of a certain size. Prices of these goods are examined to work out their changing cost for different years. Evidence of monetary wage payments is then collated to form a time series, and the real wage is calculated to be the percentage of the basket of consumables which could be bought by a single family in a year. The first, and until recently the only, long-term attempt to do this was the work of Henry Phelps Brown and Sheila V. Hopkins in their two articles, 'Seven Centuries of Building Wages' and 'Seven Centuries of the Prices of Consumables, Compared with Builders' Wage-Rates', published in the journal *Economica* in 1955 and 1956.<sup>22</sup> In these articles they used builders' wages collected largely from southern England, together with a large dataset of prices collected previously in the nineteenth and early twentieth centuries by historians such as James Thorold Rogers and William Beveridge.<sup>23</sup>

In order to measure a historical standard of living all the way from 1260 to 1954 Phelps Brown and Hopkins attempted to construct four baskets of consumables for 1275, 1500, 1725 and 1950, to introduce a rough measure of change over time. But the evidence they had of both diet and the consumption of household goods before the nineteenth century was very limited – consisting of only one medieval account book of two priests and David Davies's and Frederick Eden's budgets for poor families during the hard years of the late eighteenth century. Since they were not interested in actual consumption, they did not investigate the accuracy of what building workers might actually have been consuming. They were more interested in having a reasonable standard measure which could track the changing prices of comparable units. However, their real wage series became a seminal tool in explaining socio-economic change in the early modern period. Figure 3 in their second article famously showed that real wages, owing to the price inflation of the sixteenth century, fell to a nadir during the run of bad harvests in the late 1590s. Prices of food were shown to have risen by over six times between 1550 and 1650, while nominal money wages only rose by 2.5 times in the same period. In contrast real wages were at their highest when food prices and population were low in the

<sup>22</sup> Henry Phelps Brown and Sheila V. Hopkins, 'Seven Centuries of Building Wages', in Henry Phelps Brown and Sheila V. Hopkins, *A Perspective of Wages and Prices* (London, 1981), pp. 1–12; Henry Phelps Brown and Sheila V. Hopkins, 'Seven Centuries of the Prices of Consumables, Compared with Builders' Wage-Rates', in *ibid.*, pp. 13–59.

<sup>23</sup> J. B. Thorold Rogers, *A History of Agriculture and Prices in England from 1259 to 1793*, 8 vols. (Oxford, 1866–1902); William Beveridge, *Prices and Wages in England* (London, 1939).



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fifteenth century. After 1650, gradually rising money wages, together with falling food prices, led to slowly rising real wages.<sup>24</sup> These figures were puzzling because their work showed that building workers would have been better off in the fifteenth century, which experienced a long trade depression and market contraction. In addition they showed that it would have been impossible for a family to survive on just the husband's wages which were paid at this time.

Following from this work, a pioneering attempt was made by Keith Wrightson and David Levine to reconstruct a poor family's actual minimum survival budget based on poor law payments in the Essex village of Terling in the late seventeenth century, and by Ian Archer, who constructed some budgets for poor widows supported by poor relief in London in the 1580s and 1590s.<sup>25</sup> The most detailed attempt to reconstruct early modern family budgets so far, however, has been Donald Woodward's work on building workers in the north, where he looked at how many days male wage earners would have had to work to support families of various sizes in Hull and Lincoln from 1540 to 1699. To do this he used a diet outlined for famine years which left out drink, but there were still many years when it appears that a family with three or four children would have found it impossible to survive on just the husband's wage earnings, even on a diet advocated for years of severe shortage.<sup>26</sup>

However, apart from Wrightson and Levine, none of this work was done for agricultural labourers. Recently, though, a new long-term series of farm labourers' wages from 1209 to 1869 has been constructed by Gregory Clark. Clark looked at a much larger sample of farm labourers' wages from all over England, in contrast to Phelps Brown and Hopkins, who based their series on building labourers' wages from the south.<sup>27</sup> For his price series, Clark relied on those collected by William Beveridge with additions from his own new research. However, he

<sup>24</sup> Christopher Clay, *Economic Expansion and Social Change: England 1500–1700*, 2 vols. (Cambridge, 1984), I, ch. 2.

<sup>25</sup> Keith Wrightson and David Levine, *Poverty and Piety in an English Village, Terling 1525–1700* (New York, 1979), pp. 39–41; Ian Archer, *The Pursuit of Stability: Social Relations in Elizabethan London* (Cambridge, 1991), pp. 190–1.

<sup>26</sup> Woodward, *Men at Work*, pp. 276–84. Steve Rappaport has also shown that the rise in the price of bread in London was not as great as Phelps Brown and Hopkins thought for the sixteenth century. Steve Rappaport, *Worlds within Worlds: Structures of Life within Sixteenth-Century London* (Cambridge, 1989), ch. 5.

<sup>27</sup> Phelps Brown and Hopkins, 'Prices of Consumables', pp. 13–57; Gregory Clark, 'The Long March of History: Farm Wages, Population, and Economic Growth, England 1209–1869', *Economic History Review*, 60 (2007), pp. 97–135; Gregory Clark, 'Farm Wages and Living Standards in the Industrial Revolution: England, 1670–1869', *Economic History Review*, 54 (2001), pp. 477–505.

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based his basket of consumables on a single example, that constructed by Sarah Horrell based on budgetary evidence from 1787 to 1796. In order to trace change over time he expressed the composition of different components as a geometric index based on changing prices of different goods.<sup>28</sup> In comparison to Phelps Brown and Hopkins, Clark's data show that the fall in real wages from the mid-fifteenth century to 1600 was only of the order of about 50 per cent, rather than 60 per cent, and, much more surprisingly, that real wages rose much less over the course of the early eighteenth century.<sup>29</sup>

Such real wage series are valuable in that they provide a rough index of very long-term change over time, and they also provide a way of comparing living standards in different countries or areas of the world.<sup>30</sup> But the numerical abstraction of such series often masks the difficulties in collecting evidence robust enough to be used in comparative terms, given the sweeping changes which have occurred in England since 1209 or those which existed in comparison to other areas in Europe, early modern China, the Ottoman Empire or India. The adult male wage was only one aspect of the way in which a family earned wealth, as has been pointed out in much recent work.<sup>31</sup> In the most comprehensive set of contemporary budgets from the period, those made by David Davies and Sir Frederick Eden in the late eighteenth century, the earnings of a household head, in the majority of cases, constituted less than two-thirds of household income, and this was after the introduction of spinning machinery radically diminished the most significant employment for women.<sup>32</sup> Furthermore, basing consumption on a sample of small diets can obscure the tremendous geographical and temporal changes in the consumption of food and other goods, even within England. This

<sup>28</sup> Clark, 'Long March', pp. 105–8; Gregory Clark, 'The Price History of English Agriculture, 1209–1914', *Research in Economic History*, 22 (2004), pp. 41–124; Sara Horrell, 'Home Demand and British Industrialization', *Journal of Economic History*, 56 (1996), pp. 565–71.

<sup>29</sup> Clark, 'Long March', pp. 131–4; Phelps Brown and Hopkins, 'Prices of Consumables', pp. 28–31.

<sup>30</sup> Robert Allen, 'Progress and Poverty in Early Modern Europe', *Economic History Review*, 56 (2003), pp. 403–43; Süleyman Özmucur and Sevet Pamuk, 'Real Wages and Standards of Living in the Ottoman Empire, 1498–1914', *Journal of Economic History*, 62 (2002), pp. 293–321; Stephen Broadberry and Bishnupriya Gupta, 'The Early Modern Great Divergence: Wages, Prices and Economic Development in Europe and Asia, 1500–1800', *Economic History Review*, 59 (2006), pp. 2–31.

<sup>31</sup> Lucassen (ed.), *Wages and Currency*; Peter Scholliers and Leonard Schwarz (eds.), *Experiencing Wages: Social and Cultural Aspects of Wage Forms in Europe since 1500* (New York and Oxford, 2003); Michael Sonenscher, 'Work and Wages in Paris in the Eighteenth Century', in Maxine Berg, Pat Hudson and Michael Sonenscher (eds.), *Manufacture in Town and Country before the Industrial Factory* (Cambridge, 1983), pp. 147–72.

<sup>32</sup> Carole Shammas, 'Food Expenditure and Economic Well-Being in Early Modern England', *Journal of Economic History*, 43 (1983), p. 95.