## DOCTORAL THESIS

## Telling timepieces

Representations of the timepiece within literature and visual culture of the eighteenth century

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# Telling Timepieces: Representations of the Timepiece within Literature and Visual Culture of the Eighteenth Century 

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A thesis submitted in partial fulfilment of the requirements for the degree of $\mathbf{P h D}$

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#### Abstract

Leading up to the eighteenth century horology showed a clear progression from approximation to precision, whereby the measure of time no longer varied by season and the clock turned unequal hours into equal ones. This thesis is going to elucidate the important cultural role of the timepiece during the era by reading works of literature and art within the context of an increasingly time-conscious society. In doing so I highlight the often-overlooked role of timepieces, clocks, and watches in culture and introduce new ways of seeing familiar texts and images. The structure of the thesis has been arranged so the global context of the timepiece is explored first, with each subsequent chapter narrowing the clock's sphere of influence. From the public, to the private and finally to the personal timekeeper, each iteration of the clock creates a new or distinctive type of time to be studied.

Through the analysis of authors such as Daniel Defoe and Jonathan Swift, Chapter 1 frames the clock as a vehicle of imperial time, which allows Britain to impose its temporal order on the 'timeless' across the globe. Chapter 2 establishes the timepiece as an important device for co-ordinating social action in public spaces and shows how industrial time was imposed over natural cycles. This is going to be achieved through analysing texts written by, among others, Mary Collier and Thomas Legg. In Chapter 3, reading Laurence Sterne's The Life and Opinions of Tristram Shandy, Gentleman (1759-67), I examine the clock in domestic life and show how it reinforces wider notions of implicit hierarchical spheres. This will be supported by Samuel Richardson's Pamela (1740), Elizabeth Inchabald's A Simple Story (1791) and Nicolas Lancret, The Four Times of Day: Morning (1739). Finally, in Chapter 4, I highlight how the


pocket watch provides an insight into the criminal economy that grew in conjunction with the ever-changing refinement of eighteenth century fashion. I use Daniel Defoe's Moll Flanders (1722) to introduce this argument, before Mary Meeke's The Sicilian, A novel in four volumes (1798) and John Gay's The Beggar's Opera (1728), along with examples of prosecutions from the Old Bailey archives, furthers the discussion.

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## Introduction

'The clock ... is the key machine of the modern industrial age. ${ }^{1}$ Lewis Mumford, Technics and Civilization.

Lewis Mumford's observation emphasised a single technical advancement in history that profoundly changed the modern age. Such is the ubiquity of timepieces, clocks and mobile devices in the twenty-first century that we are hardly ever in a position to forget the time. It is displayed prominently on our phones, attached to our wrists, embedded in our homes and adjoined to buildings at the heart of every community. British society, in particular, has an enduring relationship with the timepiece; aside from the abundance of devices accessible for everyday consumption, the country is home to a number of reputed machines. Within the Royal Greenwich Observatory is the Shepherd Gate Clock, the first timepiece to show Greenwich Mean Time (GMT), the central locus from which all other time zones in the world extend. Similarly, residing in the heart of London is 'Big Ben', where the famous clock tower stands a constant vigil over the Houses of Parliament as a physical and aural symbol of the continued functioning of the British government. The bell marking the hours is quite literally connected to the comings and goings of British politics.

Clocks have become so deeply ingrained in our society that the majority of our actions are defined through mechanical, electrical or atomic denotations of time. Mumford notes that 'in today's world almost everything is driven by the time and ability to measure the time. Without the invention of the clock it would be hard, if not impossible to imagine the world we have today. ${ }^{2}$ From the early days where the round of seasons and the daily cycle of daybreak and nightfall

[^0]were the temporal signifiers, time has always been a galvanising force that dictated the action and habits of people. As time passed, and social complexity increased enough to warrant a more accurate marker of time, David S. Landes explains that 'the artificial clock enters as an intruder.' ${ }^{3}$ Trish Ferguson further states that this encroachment was an 'essential rupture from a human, qualitative experience of time to an objective, universal notion of time as homogeneous and quantitative. ${ }^{4}$

Throughout the middle ages, the timepiece appeared in various places, and, seemingly, in unrelated manners. However, reasons for this were usually mixed and often detached from their time-telling functions. Carlo M. Cipolla explains that one reason was simply local envy; as public clocks dispersed across Europe and one city or town installed a clock, its neighbour soon followed. ${ }^{5}$ In broad terms, the clock and modern time discipline did not appear in Europe until the seventeenth century when horology and science combined to produce many significant inventions that invigorated design and quality. Michael J. Sauter explains how, before Europeans would submit to clock time, the vast majority of a community's timepieces had to show correct time, 'it was no longer enough for it to run well; it now had to be "accurate"". ${ }^{6}$ The new clocks reflected the urge to subdivide time, and, as the clocks became more accurate, the necessity for there to be confidence in a community's church clock was paramount.

[^1]The onset of the mechanical timepiece in this period invariably meant that these modern objects were featured in various artistic works of the era. This thesis explores the representation of timepieces in literature and art in eighteenth century Britain, an era where time measurement undertook the most emphatic change, and as Stuart Sherman explains, was a place and period 'critical to the development of both clocks and narratives' ${ }^{7}$ The growth of the timepiece in the century had a radically new effect on people's perception of time. More so, people writing in the eighteenth century were sensitive to a change of temporality in working and social life, to the increase in social complexity and to the futures made possible by new technologies. George Levine argues that literature was unable to avoid the new timekeeper because it asserted an 'epistemological authority so powerful' that it determined how we allowed ourselves to 'imagine the world, or to resist that authority. ${ }^{8}$ This change had huge implications as it remodelled cultural values, technological change, social organisation and reshaped the temporal consciousness of the seventeenth and eighteenth century. The device's cultural resonance inevitably compelled writers and artists of the era to reconfigure the clock's meaning beyond its basic function as a device for timekeeping.

In undertaking the research for the thesis I have similarly endeavoured to move beyond the representations of the timepiece as a purely technological artefact, instead choosing to explore the works where its socially encoded value, or common function, has been presented to us in new ways. I will engage with a wide range of sources, including novels, images, personal papers, criminal

[^2]records, plays, poems, essays and periodicals, to show how the arrival of the clock accrued a nuanced set of attributes and implications beyond merely being objects that marked the passage of time. At first glance, a timepiece might appear to be an irrelevant detail and regarded by many as an 'accessory function'. ${ }^{9}$ However, narratives and images are shaped by the presence of clocks which redirect our attention into the operative role of time. The new experience of time also entailed new modes of perception, and, in wider terms, a more extensive conditioning to cultural modernity. The novel helped acculturate the reader to industrial modernity and facilitated modernity's dissemination into the wider social realm; as Nicholas Daly explains, it can be read as 'a species of temporal training ${ }^{.10}$

Critics have responded in diverse ways to this complex topic and explored an array of theoretical aspects of the relationship between time, the clock, and literature. Influential works in the field include David S. Landes, whose Revolution in Time: Clocks and the Making of the Modern World (1983) is a general history of time measurement and its contribution to modern civilisation. Landes' interdisciplinary work uses cultural history, the history of science and technology, and economic history to contribute to an understanding of the clock's significance. Similarly, Paul Ricoeur's work on narrative structures in Temps et Recit (Time and Narrative; 1983, 1984, 1985) will also be noted because of how his analysis of novelistic time helped to secularise time, and moved it onto a social and subjective frame of reference. The philosopher's literary investigation will appear briefly though its methodology is not interested

[^3]in material objects. Finally, in Telling Time: Clocks, Diaries, and English Diurnal Form, 1660-1785 (1996), Stuart Sherman's historical work shows how the new 'chronometry' of the horological revolution was absorbed into 'narrative form'. Charting this development from private diaries to periodical essays, and then to travel writing, he focuses on the late seventeenth and eighteenth century as a particular era for temporal influence and argues that the timepiece as an artefact was integral to the shaping of certain novelistic structures. Sherman shows how the outward notation of the timepiece, that is the mechanisms of the clocks and its dial face, brought about an 'epochal innovation in technology' that made available to 'sense and thought' ${ }^{11}$ a new means of experiencing time; one that is both accurate and constant. As such, he argues that the impact of the new chronometry led to new literary structures that reflected its cultural surroundings.

While these critics are helpful in their approach to novelistic time, there is an absence of discussion in regard to the timepiece as an artefact in text and imagery, which this thesis will endeavour to fill. There have been relatively few studies on this topic, especially when touching on the wide variety of clocks that fall under the umbrella term, and more so in the era where the timepiece as a cultural symbol became prominent. Marcus Tomalin offers a broad analysis on the important role literature played in testing out and exploring new notions of time and the timepiece. His essays, ‘The Intriguing Complications of Pocket Watches in the Literature of the Long Eighteenth Century' (2015) and 'Literature and Time in the Eighteenth Century and the Romantic Period' (2016), acknowledge how 'horology had a profound impact on many aspects of literature

[^4]of the long eighteenth century, ${ }^{12}$ and that this was mutually reciprocal. He continues, 'literature exerted a powerful influence upon particular time telling practices and perceptions'. ${ }^{13}$ Tomalin limits his work to the portable watch and the auditory aesthetics of temporality and connects the timepiece to a broader cultural framework. He explains, 'this important topic has been inexplicably neglected in critical studies to date, and therefore still awaits the scholarly attention it so richly deserves. ${ }^{14}$ My thesis will redress the lack of academic study into timepieces as a literary artefact while widening the investigation to give an understanding of a broader array of devices.

My approach has been to draw on aspects of the methodology of these critics in order to study timepieces as both literal and symbolic presences in literature and art, as this is an important aspect of their value. I use close readings to highlight the importance of timepieces in eighteenth century cultural texts and to explain how these are not merely rhetorical or casual inclusions in the work, but significant markers of the change I am charting throughout the century. In traditional studies of the clock there are basic assumptions of what constitutes a timepiece: a dial plate, hands and cogs. However, a neglected yet key aspect of the clocks I have investigated is the auditory nature of the device, which will be included under the umbrella definition of the object. Time was translated into constant sounds of which the chime and the dial, as Raymond Murray Schafer puts it, 'became the most inescapable signals of the soundscape... with even more merciless punctuality'. ${ }^{15}$ In the eighteenth century, the bell was for the first

[^5]time wedded to the clock to deliver the data of passing time to both sight and hearing, and few men and women were out of earshot of these chimes.

I have organised the thesis according to the power structures that clock time regulated, and the progression of the chapters also brings out the growing importance of clocks in British culture. As the century advanced the clock was increasingly implicated in the discourses of power, and as such, Michel Foucault's theories of power structures will be used to underscore the complexity of the devices' place in the eighteenth century. According to Foucault, systems of control no longer required force to make people behave in particular ways, and he regarded the era as inventing this 'synaptic regime of power, a regime of its exercise within the social body, rather than above it'. ${ }^{16}$ His adage, 'power is everywhere', ${ }^{17}$ is not regarded or referred to as a structure, rather, as Foucault proposes, 'the procedures of power that are at work in [eighteenth century] society are much more numerous, diverse and rich. ${ }^{18}$ This allows for the literary texts to be seen on a plane with non-literary discourses, and to look at the subtle ways in which 'telling time' related to wider issues of power.

The timepiece encapsulates a wide array of devices; as such the organisation of the thesis is structured in a way to best capture all its iterations. The chapters are arranged like concentric circles, beginning with the global context of the Imperial timepiece and moving inwards towards more personal experiences of the artefact; from the public clock, to the private timepieces of the homestead and finally to the personal nature of the pocket watch. Each chapter begins with a canonical 'portal' text before moving onto a brief history of the corresponding device,

[^6]which allows us to better discern the route leading to its presence in literature and art.

Chapter 1 examines the importance of the timepiece in Britain's growing empire, and how it was an integral, yet understated device of the expansion toward imperial dominance. This chapter will explore the ways in which chronometry developed during the eighteenth century, how its growth was adjoined to the culture of the empire and its subsequent role in supporting global and racial hierarchy. Jonathan Swift's Gulliver's Travels (1726) will open the chapter and provide the cue for exploring how the timepiece helped to shape the flourishing British Empire. Swift took up themes of empire and the power of expansionism that were central constituents of various prose narratives of the time, yet Gulliver's Travels was one of the first texts to feature the physical timepiece in this critique. In Gulliver's first adventure to Lilliput, the timepiece is initially established as an object of reverence and as a powerful constituent of Gulliver's sea voyage. As Swift mentions, Gulliver is 'a Man well experienced in the Navigation of those Seas, ${ }^{19}$ and as the Lilliput inventory declared upon cataloguing his watch, he 'seldom did anything without consulting it' ${ }^{20}$ The implication being this was an important object in the material and imperialist expansion of the empire.

To place the chronometer into its proper context the discussion will then move to the history of the device and in particular the remarkable invention of the longitude timepiece. More than any of the subsequent timepieces that feature in this thesis, none have as notable or as immutable a legacy, and the sense of the chronometer's enormity within the identity of the imperial eighteenth century

[^7]projects a compelling narrative as to the general state of navigation before and after the century. While the discovery of longitude and John Harrison's clock are central to this chapter, I have used works such as Thomas Osborne, A Collection of Voyages and Travels, Consisting of authentic writers in our own tongue (1745), Papers of the Board of Longitude; Acts of Parliament and awards, 17131821, and The Journals of Captain James Cook on his voyages of discovery, 1728-1779, to supplement this study. This will enable me to further highlight the historical significance of the timepiece and how it figured in imperialist principles of the age. Alongside the texts I consider notable images of the era, such as William Hogarth's A Rake's Progress (1734) and James Gillray's The Reception of the Diplomatique and his Suite at the Court of Pekin (1792), that help underscore the wider cultural engagement of the search for longitude and that gives the timepiece a significant presence in the imperialist apologia.

The second chapter explores the transition from natural time to the public timepiece, and the relationship between the church and the factory clock in eighteenth century culture. Thomas Gray's Elegy in a Country Churchyard (1751), Stephen Duck's The Thresher's Labour (1730) and Mary Collier's The Woman's Labour (1730), are among the texts used in Chapter 2 to show how natural time was being superseded by time that was increasingly relied on to regulate and co-ordinate social and economic activity. The history of the public clock will briefly chart how orderly life in western culture first took shape with the formation of a regular clergy in the monasteries of the sixth and seventh century. The spread of monasticism, along with the use of bells to mark the canonical hours, standardised time for the community at large and with the proliferation of clocks came the propensity to measure the worth of all human
activities and conduct by the calculation of hours and minutes. William Hogarth's Four Times of Day (1736) and Balthazar Nebot's Covent Garden Market (1737) are among the images used to illustrate the social rituals that were conducted under the watchful gaze of the church clock, but as the eighteenth century progresses along an increasingly industrial trajectory, the thesis will turn to the rigid time discipline of the emerging factory system. Sir Ambrose Crowley's The Law Books of the Crowley Ironworks (c. 1700) extols the values of a factory clock and views the emergence of time discipline and clock-regulated work as being intimately bound up with the emergence of capitalism. E. P. Thompson's 'Time, Work-Discipline and Industrial Capitalism' (1967) will be used to support the notion of a clock-regulated factory put forward by Crowley. Thompson views obedience to the clock as the true judge of work and time, and the discarding of workers commitment to old-style time consciousness changed the cadence of daily life by simultaneously constraining and empowering communities.

The third chapter discusses the domestic timepiece and positions the clock as a vital component of the eighteenth century residence. Throughout the era there was perhaps no novel that embodied society's changing relationship with temporality more than Laurence Sterne's The Life and Opinions of Tristram Shandy, Gentleman (1759), and by analysing this text, along with a range of accompanying works and images that include Robert Dodsley's Servitude: a Poem written by a Footman (1729), Samuel Richardson's Pamela (1740), Interior With Card Players (1752), and The Battle of the Cataplasm (1773) drawn by of Pierre-Louis Dumesnil and Henry Bunbury respectively, the thesis will show how temporal discipline coerced and conducted the home's inhabitants. This highlights important issues of class, gender and morality, and shows how the timepiece fashioned a
hierarchy through which power structures forced the inhabitants to conform to institutional norms. In Chapter 3, Foucault's theory of invisible power is used to show how the domestic clock underpins how power is rendered. The timepiece, as I argue, conducts the routines and reinforces the authority of those within the eighteenth century domestic residence.

In the fourth (and final) chapter of this thesis, I examine the increasing prevalence of the pocket watch as an emblem of eighteenth century consumption and commodity culture. Daniel Defoe's Moll Flanders (1722) will open the discussion on how pocket watches are goods that circulate, change hands, move up and down the social scale, and are displayed, exchanged, pawned, stolen and taxed, all while assuming different meanings in different social contexts. Moll's descent into crime confirms eighteenth-century stereotypes of disorderly women and the poor, and reinforces social hierarchy through the presentation of dress. However, the pocket watch also allows Moll to briefly transcend rank and gender restrictions, and as will be explored in detail, it is the tool that allows Moll to briefly convey sentiment and family affections before resuming its role it as a material signifier of commodity fetishism. To elaborate on these ideas, John Gay's The Beggar's Opera (1728), William Hogarth's Cruelty in Perfection (1751), and $A$ Rescue or the Tars Triumphant (1768) by John Collett, along with examples of prosecutions from the Old Bailey archives, will form the foundation of my discussion of the pocket watch in regard to crime. The chapter will then turn to the pocket watch's representation as a sartorial embellishment by looking at Mary Meeke's The Sicilian, A novel in four volumes (1798), Francis Nivelon's The Rudiments of Genteel Behaviour (1737) and Carington Bowles' print The Modern Harlot's Progress, or Adventures of Harriet Heedless (1780). In order
for wealth and ownership to be acknowledged, pocket watches had to be transformed into a recognisable symbol, and in the eighteenth century the pocket watch was at the forefront of allowing individuals to enact methods of distinction directly onto the body.

## CHAPTER 1

## The Imperial Timepiece

During the eighteenth century the British colonies were seen as vital to Britain's economic success, and only by improving travel between the territories could Britain expand on a satisfying scale. As Philip Edwards elaborates, by the middle of the century; 'British ships were all over the globe, creating, developing and maintaining an overseas empire; gaining and losing territory, exploring and fighting, carrying goods and people - soldiers, officials, brides, travellers, indentured servants and convicts. ${ }^{1}$ As successive governments began to commit resources on a much greater scale to these activities, the emphasis was placed on the navy in the projection and consolidation of imperial control.

An expanding colonial civilisation demanded new machinery, new inventions and new processes, to which science now addressed itself. With England transforming through new technology, the timepiece must be seen as the key device of this imperial expansion. The purpose of this chapter will be to explore the ways in which chronometry develops during the eighteenth century, how its growth was aligned with the culture of the empire, and the subsequent reaction in literature and print culture. The clock in this context has a variety of functions. The definition of the imperial timepiece are not limited to longitude. Rather, I will look at different cultural representations of the clock in Britain's colonies. A history of the chronometer frames the chapter as a whole and the aim of this is twofold: to provide a brief account of how the chronometer worked, and to outline clock time technology, covering how the clock was used and how clocks were received within the public domain. In regard to the imperial timepiece in

[^8]culture the chapter will focus on Jonathan Swift's Gulliver's Travels (1726), Daniel Defoe's Robinson Crusoe (1719), William Cowper's The Task (1785), Captain James Cook's voyages of exploration as noted in Captain Cook's Journal During his First Voyage Round the World Made in H.M. Bark 'Endeavour' 1768-71 and The Journals of Captain James Cook on his Voyages of Discovery - II: The Voyage of the Resolution and Adventure 1772-1775, Erasmus Darwin's The Love of the Plants (1789) and James Grainger's The Sugar-Cane (1764). The narratives are arranged thematically and each is an important and useful resource when thinking about chronometry, oceanic travel and their effect on imperialism. It will be argued that the clock is an integral yet understated part of Britain's appropriation of new lands in the latter parts of the eighteenth century.

## Crusoe and Gulliver's Time Travels

Jonathan Swift explored the export of time from England to overseas colonies in Gulliver's Travels (1726), which was written at a time when England itself was described by Tillman W. Nechtman as 'almost Lilliputian in relative geographic terms,,${ }^{2}$ but was rising in power on the basis of its naval, economic and technological advances. This national growth brought England into contact with a wide variety of new animals, plants and places, but the most significant change wrought by expansion was the encounter with previously unknown people from different cultures. In Gulliver's Travels, Lemuel Gulliver resolves to leave England for adventures abroad and his journey begins after receiving 'small Sums of Money' to be laid out in 'learning Navigation, and other Parts of the

[^9]Mathematics, useful to those who intend to travel ${ }^{\prime}{ }^{3}$ Michael Seidel points out that Gulliver is 'the primary critic of civilization by the end of his account, but he is also, and this is crucial to any productive reading of the work, the primary product on display of that civilization from the beginning' ${ }^{4}$ Gulliver's first adventure sees him land in Lilliput as an oversized representative of the British state; he is an expert in multiple fields, a surgeon and linguist, but most significantly in the context of the timepiece, a navigator of the oceans with the knowledge and tools to accomplish this task. If, as Seidel has detailed, Gulliver truly is the 'primary product on display of that civilization' then just as his navigation skills are on show, so too by extension, must be the objects in his possession.

The chronometric device is one of the first items listed on the inventory taken of Gulliver's possessions as reported to the Lilliputian king. Despite being 'most excellent Mathematicians and arrived to a great Perfection in Mechanics’ (28), the Lilliputians puzzle over its purpose:

> Out of the right Fob hung a great Silver Chain, with a wonderful kind of Engine at the bottom. We directed him to draw out whatever was fastened to that Chain; which appeared to be a Glove, half Silver, and half of some transparent Metal: For on the transparent side we saw certain strange Figures circularly drawn, and thought we could touch them, till we found our Fingers stopped by that lucid Substance... And we conjecture it is either some unknown Animal, or the God that he worships: But we are more inclined to the latter Opinion, because he assured us that he seldom did anything without consulting it. He called it his Oracle and said it pointed out the Time for every Action of his life (36).

The 'Silver Chain' that attaches the fob to the watch is worthy of further discussion as it has various metaphorical resonances in the context of

[^10]colonialism. Gulliver earlier likened the chain that bound him to the kind found on a watch; he comments, 'the King's Smiths conveyed fourscore and eleven chains like those that hang to a lady's watch in Europe, and almost as large' before making the connection with captivity, 'which were locked to my left Leg with six and thirty Padlocks' (29). He continues the analogy briefly by stating the inhibitions the restraints caused, 'the Chains that held my left leg were about two Yards long' (29), and 'I went as far as the length of my chain would suffer' (30). Clement Hawes traces the particular historical parallels that Swift satirises, and, in doing so, points out how 'additional emphasis must therefore be given to the fact that the publication of Gulliver in 1726 comes within thirteen years of a key turning point in the history of British colonialism, the English acquisition in 1713 of the "Asiento." ${ }^{5}$ Although English participation in slavery dated back to the mid-seventeenth century, possession of the Asiento made the slave trade central to English economic expansion and, in turn, made it a particular target for Swift. The chain was an important symbolic representation of slavery and marrying it with the watch, as will be looked at later, similarly identifies it as an object of colonial encounter.

At this point, the body of the watch is presented as a dispensable curiosity; the talk of 'transparent metal' or 'lucid substance' and 'circularly drawn' figures reduce its ostensible use for the tracking of time or navigation to visual display and idle activity in the eyes of the Lilliputians. However, by acknowledging the watch as integral to daily routines Gulliver is, in part, giving the less temporal minded Lilliputians an understanding of the larger underlying importance of his timepiece. In this passage, Swift also conceals an allusion about the change in

[^11]temporality conditioned by the daily distribution of the papers. By referring to an 'Oracle', Swift is not only offering a literal reference to an object of infallible authority, to quote the Oxford English Dictionary's entry, but is referencing one of a multitude of newspaper titles from Britain's ports: The Freeman's Oracle and New Hampshire advertiser published in Exeter, Portsmouth's The Oracle of the Day, or more likely the better-known The Bristol Oracle and Country Advertiser, as Swift's connection to this last paper was evident. He had, after all, geographically situated Lemuel's starting point in the port of Bristol: 'we set sail from Bristol, May 4 ${ }^{\text {th }}, 1699^{\prime}$ (22). When Stuart Sherman asserted that newspapers 'were central documents in new textual time-senses, ${ }^{, 6}$ he was pointing out the similarities between the emerging periodical press and the clock, that were both translating duration into number.

Swift's manipulation of scale is the satiric vehicle that he adopts as a way of manifesting cultural differences, and the scales of time are similarly represented when Gulliver offers the timepiece to the Emperor:

I likewise delivered up my Watch, which the Emperor was very curious to see, and commanded two of his tallest Yeomen of the Guards to bear it on a Pole upon their Shoulders, as Drayman in England do a Barrel of Ale. He was amazed at the continual Noise it made, and the Motion of the Minute-hand, which he could easily discern; for their Sight is much more acute than ours (37).

Gulliver's size and strength enacts the dynamics of Britain's encounters with 'lesser' non-Europeans as the West has imagined them. Manipulation of scale in this regard is then a figuration of British colonial power between Gulliver and the Lilliputian nation, and, if Gulliver is huge, then the timepiece he carries lends itself to his position as an omnipotent coloniser. The watch's physical stature

[^12]requires men of equally tall height to move the device, and, Gulliver likens the size of the Lilliputians to the finer divisions of clock time. When meeting the Emperor, he notes that, 'For the better convenience of beholding him, I lay on my side, so that my Face was parallel to his, and he stood but three Yards off' (31), before continuing later that he could easily discern the 'Motion of the Minute-hand...for their Sight is much more acute than ours' (37). The 'Face' Gulliver is referring to is either his own or of the watch he carries, and both are cast as the monolithic representatives of time. More specifically Gulliver represents the larger denotation of the hour while the miniature stature of the Lilliputians is designated by the activity of the minute hand. The relativistic concept that he plays with is appropriate at a time where man is discovering all those tiny things around him, not least of which was the finer division of time.

The trivialisation of Gulliver's timepiece and the absence of chronological denominations provide the link for articulating the imperial experiences of time in relation to the natural time of the Lilliputians, and disregarding the watch or treating it as an object of amusement is a protective reaction. While the

Lilliputians are small in Gulliver's eyes, they are unwilling to see themselves that way. Rather, the underlying view of the Lilliputians is that they are normal and Gulliver is the anomaly, as shown by their use of him as an instrument of war to be employed in naval battles or a beast of burden for transportation over the island:

For as to what we have heard you affirm, that there are other kingdoms and states in the world inhabited by human creatures as large as yourself, our philosophers are in much doubt, and would rather conjecture that you dropped from the moon, or one of the stars... besides, our histories of six thousand moons make no mention of any other regions than the two great empires of Lilliput and Blefuscu (4748).

It might be considered that the sight of the timepiece will convince the Lilliputians of Gulliver's superiority. As Lord Bolingbroke suggested, in carrying a clock 'they will soon be convinced that intelligence made it, and none but the most stupid will imagine that this intelligence is in the hand that they see move, and in the wheels they see turn', ${ }^{7}$ yet this does not come to pass. Lunar dates mattered, as when concluding the inventory of Gulliver's possessions the date stamp provided by the Frelock's decree is 'signed and sealed on the fourth day of the eighty-ninth moon of your majesty's auspicious reign' (36) and by continuing to use natural time to measure their activities, the Lilliputians are placing the chronometer, at least initially, beneath their regard. Despite being able to easily distinguish the finer motions of the clock, it was simply not important for Lilliputians to know the time with any precision or to admit they are in any way the finer units of Gulliver's monolithic hour. As will be explored later in the chapter, this attitude underscores a global hierarchy based on temporal conventions, that is, a naturalised timeline being seen as primitive and disposed to colonial domination.

Just as Gulliver provides a representation of the British colonial endeavour, Daniel Defoe's The Life and Strange Surprising Adventures of Robinson Crusoe (1719) occupies a symbolic position within the imperial ideology. As Tillman W. Nechtman's assessment of the novel suggests, like Gulliver, Crusoe himself is 'broadly emblematic of British national identity and of Britain'. ${ }^{8} \mathrm{He}$ is the cultural configuration of British imperialism, the castaway who wishes to take possession of the island he discovers and in doing so expand his territory and its

[^13]autonomy. However, in an era of new inventions, Defoe's novel is also seen as a glorification of British technology. According to Christopher Hill, 'It is thanks to the tools and commodities which Crusoe salvages from the wreck that he is able not only to survive but to prosper, drawing on the heritage of centuries of civilisation'. ${ }^{9}$

At the outset of Robinson's stay on the island, calendar time is the dominant temporal reference; Crusoe is concerned that he will 'lose reckoning of time' and marks the passing of days on 'a great cross'. ${ }^{10}$ The marks help Robinson divide time into days, weeks and months, providing a grid that, at first, appears more than an adequate way of framing his routines and securing control over his life on the island. His solitude is not defined by the natural temporality of sunrise and sunset, but rather by his personal time that must be organised. Crusoe parallels the symbolic ordering of chronology with the many salvaged objects recovered on the island. As he explains, 'at first this was a confus'd heap of goods which as they lay in no order, so they took up all my place, I had no room to turn my self' (55). Until this point, Robinson has no mastery over his belongings and, therefore, time; in fact they mastered him by disallowing him the space to 'turn'. This is rectified when Crusoe makes the decision to reclaim order in his dwelling:

But when I had wrought out some boards, as above, I made large shelves of the breadth of a foot and a half one over another, all along one side of my cave, to lay all my tools, nails, and iron-work, and in a word, to separate every thing at large in their places, that I must come easily at them; I knock'd pieces into the wall of the rock to hang my guns and all things that would hang up. So that had my cave been to be seen, it look'd like a general magazine of all necessary things, and I had every thing so ready at my hand, that it was a great pleasure to me

[^14]to see all my goods in such order, and especially to find my stock of all necessaries so great (56).

Just as Robinson puts into words how the use of shelving masters the objects scattered around his cave, so does he master time by compartmentalisation and separating everything at large into its proper place. If, as Lewis Mumford further explains, 'time took on the character of an enclosed space: it could be divided, it could be filled up, ${ }^{11}$ the 'home', then, parallels the symbolic temporal ordering Crusoe has just established spatially.

In addition to the calendar, it is in one of the journal entries that Robinson's relation to the clock and its finer divisions are revealed. Having spent over a month on the island, he writes:

Nov. 4. This morning I began to order my times of work, of going out with my gun, time of Sleep, and time of Diversion, viz. Every Morning I walk'd out with my gun for two or three hours if it did not rain, then employ'd myself to work till about eleven a-Clock, then eat what I had to live on, and from twelve to two I lay down to sleep, the weather being excessive hot, and then in the evening to work again (58).

While stranded, Robinson does not adhere to an organic schedule of eating when hungry or sleeping when tired. Rather, he chooses to conduct himself according to a set schedule that defines the amount of time to spend on the varying activities. His days include regular working hours, yet Robinson has no mechanical watch or clock for measuring time and his habit of dividing time, according to hour-based periods of work and leisure, is influenced by the development of the timepiece. As Aino Makikalli points out, 'Robinson's need to organise his daily tasks - to find or prepare food, to work, eat, rest, and spend his leisure - with an accuracy defined in hours can be seen to originate in the

[^15]cultural values of his upbringing. ${ }^{12}$ In Defoe's novel the function of the timepiece, or the function of time as an organiser of everyday tasks, reveals itself as an embedded cultural value that manifests itself when Robinson is separated from civilisation. The clock, or lack thereof, in this context is therefore regarded as a ghostly determining presence.

## Travelling Time

At the beginning of the eighteenth century, England was moving away from its rural and agricultural roots and developing into a nation that was asserting its dominance over the sea. As has been seen in Swift's narrative, global exploration, the expansion of international trading networks among the colonies and naval might were acute national aspirations, all of which were first and foremost ocean-going enterprises. Despite this, and with over two centuries of oceanic voyaging, seamen still had no reliable way of fixing a ship's position out of sight of land. The measurement of latitude was calculated using a relatively basic instrument like the crosstaff or astrolabe. However, longitude was not a measurement that could be calculated with accuracy through the methods of the age. Determining a ship's exact position at sea remained a quandary that was yet to be solved and many references can be found to the problem of positional and directional accuracy in the political, economic and scientific writings of maritime nations. For example, in Thomas Osborne's A Collection of Voyages and Travels, consisting of authentic writers in our own tongue (1745), Antony Galvano wrote a treatise of modern discoveries of the world that stated, 'for there never sailed together in one fleet at sea, from ten pilots to the number of an

[^16]hundred, but that some of them found themselves by reckoning in one longitude, and some in another. ${ }^{13}$ Considerable monetary incentives were offered during the sixteenth and seventeenth centuries by various governments of Europe to solve the problem. Philip III of Spain, for example, proposed an award of 6,000 ducats, a life pension of 2,000 ducats and a gratuity of 1,000 to anyone who could provide a solution. ${ }^{14}$ Yet, despite this financial stimulus, no scheme of any note was developed and the prizes went unclaimed. J. H. Parry states that some intellectuals of the time 'were all too ready to assume that the problem of observing longitude was insoluble, or that any solution proposed was too difficult to be used at sea. ${ }^{15}$

Such fears were not wholly without foundation and it was not until a naval disaster in 1707 that public attention was sharply focused upon the great uncertainty inherent in navigational practice. Surviving logbooks show that having concluded foreign duties in the Mediterranean, a British fleet under the command of Sir Cloudesley Shovell set sail for England. Having received conflicting positional, and mostly inaccurate, opinions from the various sailingmasters under his command, the ill-fated Admiral followed a course that found his fleet among the rocks and islets that lay to the south west of the Isles of Scilly. Seven ships of the line, of a total sailing of twelve, went ashore on the Gilstone Ledge with five becoming total wrecks. An estimated two thousand seamen, including Sir Cloudesley himself, were lost in what would be one of the

[^17]worst naval tragedies of the time. ${ }^{16}$ It was a stark reminder that navigation was still largely a matter of hazardous guesswork and the fate of Shovell's fleet made it, in England at least, a matter of grave public urgency. Eric G. Forbes describes this as being at the forefront of the minds of the two mathematicians, William Whiston and Humfrey Ditton, when they submitted a petition to the British parliament a few years later 'begging that a public reward be offered to anyone who might invent a practicable and generally useful method for finding longitude at sea, ${ }^{17}$

The general state of navigation, including the importance of location, was eventually addressed by the British government which declared that 'nothing is so much wanted and desired at Sea, as the discover of the Longitude, for the Safety and quickness of voyages, the preservation of Ships and the lives of men'. ${ }^{18}$ In an effort to solve this problem, British Parliament, along with Queen Anne, enacted the 1714 Longitudinal Act to encourage and reward 'such person or persons as shall discover the longitude at sea, ${ }^{19}$ This bill stated that the winning submission be, 'tried and practicable and useful at sea', ${ }^{20}$ with stipulations of the monetary reward tied to determinant degrees of accuracy:

Ten thousand pounds, if it determines the said longitude to one degree of a great circle, or sixty geographical miles; to fifteen thousand pounds, if it determines the same to two thirds of that distance; and to twenty thousand pounds if it determines same to one half of the same distance. ${ }^{21}$

[^18]Furthermore, the bill required that both the security of the ships extend 'within eighty geographical miles of the shores, which are places of the greatest danger', and that a ship shall 'actually sail over the ocean, from Great Britain to any such port in the West-indies... without losing their longitude beyond the limits before mentioned. ${ }^{22}$ In his poem, The Longitude Discover'd; A tale. By the Author of the Deluge, and Bottomless tub (1726), Jonathan Swift notes the benefits for both the country and individual offered by the Longitudinal Act:

To raise this Island's Wealth and Trade, The thoughtful Senate once decreed, Who-e'er the LONGITUDE cou'd find, To steer their Ships, as they design'd, A Fund of Riches and Renown, His Life, and Memory shou'd crown. ${ }^{23}$

By framing the prize as a national concern for the proliferation of wealth and trade, Swift is declaring that longitude is more than a niche problem within the science of navigation. Rather, it is now a cultural symbol of concerns about the instability of the nation. Swift then goes on to pronounce that the old ways of navigating the sea are redundant:

Projectors thus lay mighty Schemes,
And Chymists live in golden Dreams;
Beggar'd by Hope, in Folly old;
They starve midst fancy'd Pow'r and Gold ${ }^{24}$
With the previous inability of European nations to find a solution still looming, the enormity of the reward reflected both the urgency and inherent difficulty of achieving a solution. Yet, despite this incentive, more than two decades would elapse before a genuinely promising scheme emerged.

[^19]A feeling of ambivalence about the project was widespread, with William Ward and Caleb Smith echoing earlier comments, stating that 'the greatest part of Mankind look on it as an Impossibility'. ${ }^{25}$ William Hogarth situated the search for longitude in more nuanced cultural terms in 'Bedlam', the last plate of $A$ Rake's Progress (1734) (Figure 1.1). Hogarth's satire depicts an interior scene of the notorious Bethlehem Royal Hospital for the poor and insane where, on a shadowed wall between two cells, and amongst the many inmates who imagine themselves to be kings, popes and musicians, one has written the word longitude next to a globe of the earth encompassed by arcs and meridians. The implication being that either finding the answer to the longitude problem is an act undertaken by a madman, or that the attempt to find a solution would eventually drive a sane person mad.


Figure 1.1. William Hogarth, A Rake's Progress, Plate 8, (1735), Tate Gallery, London.

[^20]Albert J. Khun traces how the state of the matter at mid-century was reflected in a prominent literary magazine of the time, the Gentleman's Magazine. Khun remarks that the publication gave 'liberal space' to the numerous, diverse and somewhat poorly conceived ideas proposed to the Board of Longitude. These included the relatively successful and promising astronomer's method that measured lunar distance, the application of the theory of sound, the magnetic variation of a compass and even some spiritual rather than mechanical solutions to the discovery of longitude. ${ }^{26}$ All these curiosities notwithstanding, it was apparent that the most viable and promising ideas came from the mechanical timekeeping method, specifically one that involved an accurate chronometer.

The general principles involved were understood in the early eighteenth century, but the problem lay with their practical application. If the ship carried an accurate timepiece that recorded the prime meridian time of a set and unmoving point, then at suitable intervals the navigator could find his local meridian time and ascertain his longitude. This method was predicated on a timepiece whose error was negligible, and although the art of clock making had advanced greatly in the second half of the seventeenth and early eighteenth century, standing clocks depended for their accuracy on the isochronous swing of the pendulum. J. H. Parry rightly points out, 'a pendulum clock however carefully mounted in gimbals and otherwise protected, was unreliable at sea, because the irregular movements of the ship made the pendulum move irregularly. ${ }^{27}$

While it was accepted that a chronometer was the best hope to solve this conundrum, the difficulty with calculating longitude on a sea journey lay in constructing a timepiece immune to changes in climate, alterations in

[^21]atmospheric pressure and the vacillating motions of a ship. The prospect of winning the money brought forward a number of ideas and proposals for timekeeping methods to discover longitude, but the process also became a target for hoaxers. In 1714 a proposal titled The Longitudes Examin'd (1714) was put forward by Jeremy Thacker of Beverley in Yorkshire, which begins 'with a short Epistle to the longitudinarians' and ends 'with the Description of a Smart, pretty Machine of my Own, Which I am (almost) sure will do for the Longitude, and procure me The Twenty Thousand Pounds. ${ }^{28}$ Thacker deduced that there were 'but two Ways by which it can be found, viz. By the Improvement of Astronomy, or by the perfecting of Clock-Work' (8), and settled on the timekeeping method. The writing of a pamphlet would allow readers to 'enter upon the Description of my Engine with a good Opinion of my Skill' (ii).

In the first part of the pamphlet, Thacker sought to deride several of the more questionable solutions presented to solve the longitude problem. In one example he notes:

Before Mr. H---bs thinks of sending his Spring-Movement to Sea, let him know how to make the Month of June in one Year, just as hot as the same Month in another, and so of every Day and Month in all Years; then his instrument will be equally hasten'd and retarded at the same Seasons; and then he may polish his Pivots, and make an Etherial Oil that won't thicken and increase the Friction of his Watch (3).

The second half of the pamphlet puts forward his method of offsetting the motion of the ship that 'sometimes cause the [clock's] Pendulum to make large, and sometimes small Vibrations' (11). He proposes that, to make the clock stable, it would have to be placed inside a vacuum chamber and fitted with an auxiliary spring to supplement the mainspring during winding (Figure 1.2). Thacker was

[^22]so confident in his invention that he finished his tract by stating that, 'I am satisfy'd that my Reader begins to think that the Phonometers, Pyrometers, Selenometers, Heliometers, Barometers, and all the Meters are not worthy to be compar'd with my Chronometer' (23).


Figure 1.2. Proposed vacuum-enclosed sea clock. Image from Jeremy Thacker, The Longitudes Examin'd (1714).

To respond to the inundation of submissions, a group, 'including a renowned mathematician and Royal Society council member, and the Tories' chief ministerial writer, ${ }^{29}$ gathered in London to scrutinise the most prominent proposals. And, while Thacker's idea for a device resistant to the motion of a ship was recognised by the group as inherently flawed (Thacker indeed admitted

[^23]that the device erred up to 6 seconds a day), he received due recognition for his inventiveness. Thacker was the most prominent voice on the subject, but Pat Rogers conjectures that this invention was more than likely a hoax. 'The real aim of Longitudes Examin'd', Rogers surmised, 'was to parody the other hopeful projects, ${ }^{30}$ before continuing to say that his chronometer seems to have 'never existed and ... a strong suspicion arises that the putative scheme came from within the Scriblerus group. ${ }^{31}$ This unofficial club, consisting of Alexander Pope, John Gay and Jonathan Swift, along with essayist Thomas Parnell and mathematician John Arbuthnot, sought to ridicule inept and pretentious efforts within the world of learning. Although their satires on science were often profoundly personal and political in their satirical motivations, simultaneously they revelled in the creative potency of new ideas associated with real knowledge.

The argument for the Scriblerians being responsible for this satirical hoax can be seen in the members' attitude towards the prize and in the stylistic choices within the pamphlet itself. Scriblerus members referred to the prize-motivated attempts to win as largely absurd. Swift, for one, was sceptical of the prize when replying in a letter to his friend Esther Johnson, 'do you know what the Longitude is? A Projector has applied to me, to recommend him to the Ministry, because he pretends to have found out the Longitude. I believe He has no more found it out than he has found out mine arse. ${ }^{32}$ Gregory Lynall points to the one example of the text's ironic posturing as proof of its satirical intent, noting that the usual guideline when submitting a proposal was to acknowledge one's

[^24]humbleness before the commissioners. However, as Lynall further explains, the 'boastful Longitudes Examin'd therefore seeks to expose the faux humility of projectors through shamelessly emphasizing its own economic motivation and placing itself confrontationally amidst the proliferation of self-promoting texts. ${ }^{33}$ The search for longitude at sea and the subsequent monetary reward for its discovery encapsulated what the Scribulerus group saw as the growing concern with scientific enquiry in the eighteenth century. That is, invention was no longer being undertaken to increase collective human achievement and was being used increasingly as a means of self-promotion and self-aggrandisement.

It was John Harrison in the mid-1730s who took the first decisive step to solving this conundrum. Harrison had constructed the first 'sea watch' (or H1) in his attempt to produce a reliable chronometer. The H1 was the first proposal that the board considered to be worthy of a sea trial and, while ultimately flawed, it performed well enough to earn Harrison a further grant from the Board of Longitude. On testing, Harrison's H2 and H3 met with moderate success, but it was the fourth of Harrison's models that was to be his defining achievement. ${ }^{34}$ The significance of Harrison's inventions was expressed in James King's eponymously titled painting (Figure 1.3) and in the subsequent engraving produced for wider circulation. In this display, behind the seated figure of John Harrison, there can be seen the H 1 chronometer and wooden pendulum clock which garnered him widespread recognition, while, in his right hand, he holds the later H4 device, his crowning achievement. The image structure can be seen to derive its inspiration from William Hogarth's Captain Coram (1740) through

[^25]its iconographic similarities; the demeanour of Coram, the seal of the Royal Patent held in his right hand, and further artefacts that reflect his past achievements, in this case relating to his time as captain of a merchant vessel. In replicating Hogarth's intent, King adopted the layout with the purpose of elevating Harrison to a position where previously only nobility would be expected to reside, this being what Christine MacLeod describes as 'indicative of the growing respect which society accorded inventors'. ${ }^{35}$


Figure 1.3. James King, Portrait of John Harrison (1766), Science Museum, London.
King's picture equally reflects the growing tradition of eighteenth century portraits that associates the inventor with his technical achievement; such work shows 'an expression of pride in his work' and partly provides 'an association of

[^26]ownership, ${ }^{36}$ Harrison's portrait was produced at a time when the Board of Longitude was disputing the veracity of the H 4 device and Harrison sought legitimacy in public opinion as well as petitioning the royal court. In William Harrison's words:

Till about the year 1761, we had no difficulties to encounter besides those which nature threw in our way; for until the Invention was brought to maturity, we were happy in the uniform countenance and protection of the Board of Longitude; but no sooner was it evident that we had succeeded, than by a strange fatality that Board turned against us, and has ever since acted, as if it had been instituted for the express purpose of preventing our Invention from being made useful to mankind. ${ }^{37}$

The painting harnesses a dual preoccupation with the clock and inventor through the direction of light and gives the timepiece a similar stature to Harrison himself. The light source equally illuminates the head of the sitter as well as enveloping the H 4 timepiece in his hand in an attempt to emphasise the machine's significance. ${ }^{38}$ Harrison wasn't the only competitor for the coveted prize that recognised the opportunity for winning lay in developing a reliable timepiece. John Arnold's highly regarded 'watch-machine' began to garner praise and support of the Commission of Longitude and was commissioned for trials at the request of the Royal Society, although initial tests on the voyages of Captain Phipps were less than satisfactory and subsequently rejected. ${ }^{39}$ Abroad, France followed Britain's lead to establish the Bureau des Longitudes to oversee the activities of the Paris Observatory, thereby entering the race for the discovery

[^27]of longitude. Similar awards, or Rouille prizes as they were known, were offered prompting marine timekeepers from Pierre Le Roy and Ferdinand Berhoud to be put forward, but, despite the mastery of these machines, the French never managed to catch up with the British efforts. ${ }^{40}$

The development of navigation through the chronometer in the eighteenth century represented an impressive achievement, leading the Morning Post to declare 'this is the age of inventions', before continuing, 'how happy we are to live at such a pregnant period, when common mechanics produce contrivances, that a very few centuries ago would have been considered as miraculous, or caused their inventors to be hanged as conjurors'. ${ }^{41}$ The general assimilation of the timepiece to sea travel meant a large step had been taken toward navigational certainty, and, for ship-borne navigators, a sense of time would be central to their calculations. More so, a new science had been born; one that was punctilious and could be exported to the British territories.

Doubts and anxieties over Britain's imperial endeavours receded in light of this success and its dominance was secured by the subsequent accession of territories and trade worldwide. By the end of the century, New South Wales, Trinidad and the Cape Colony were but a few of the colonies acquired, and trade with China and India became important features of transatlantic commerce. The chronometer supported and embodied the vision of the empire as extensive and far-reaching and consolidated a British imperial and colonial identity. With the chronometer, longitude and British imperial ascendancy wedded in what seemed to be a secure and permanent union of co-dependency, the mood of the political

[^28]nation changed dramatically, and it is under this shadow that voyages such as those by Captain James Cook became possible.

## Cook's Clockwork Voyages

In a letter to William Cawthorne Unwin, William Cowper describes the significance of the sea: 'I think with you, that the most magnificent object under Heaven is the great deep' (to Unwin, 26 September 1781). ${ }^{42}$ For the writer the appeal of the ocean is varied; it is a 'hostile externality', as Conrad Brunstorm suggests, but it is also a means for travel, adventure and exploration and it is this vision that is explored in Book IV of The Task (1785), ‘The Winter Evening’. The poem's structure does not require the poet to have engaged personally in sea travel; as Conrad Brunstrom further explains, it is 'a different version of being all at sea ${ }^{43}$ that is offered in the context of the work. Within the domestic retreat of his poetic home the narrator is reading about the adventures in a newspaper:
'Thus sitting and surveying thus at ease / The globe and its concerns...' (IV. 9495) It is from this position that this section of the poem begins:

Hark! 'tis the twanging horn o'er yonder bridge, That with its wearisome but needful length Bestrides the wintry flood...
('The Winter Evening', IV. 1-3)
The 'twanging horn' signals the coming of the outside world from which the 'wintry flood' has isolated the narrator. Not in the sense of the intrusion of the sole 'herald' delivering the post, who would have been a familiar and welcome guest, rather, the 'noisy world' comes in the form of the newspaper that brings

[^29]'News from all nations' (IV. 7). The paper is further described as 'a map of a busy life' (IV. 55) but the real emphasis is that the newspaper, as previously mentioned, was translating duration into number, and, through this, the sense of time controlling life is introduced.

It is later in the poem that this theme is developed, most notably with the central image of the clock. Cowper notes the newspaper is full of tales of travels and it is pleasant 'To peep at such a world' (IV. 89), and further talks of joining these expeditions if only in spirit, to 'Discover countries, with a kindred heart / Suffer his woes and share in his escapes' (IV. 116-117). He also observes that 'fancy like the finger of a clock / Runs the great circuit...' (IV. 118-119). The clock in this issue signifies a world run according to the passing of mechanical time and this included control of the seas and oceans.

Similar to Cowper's newspaper, a large part of the public saw the voyage of Cook through printed accounts, in this instance the eyes of John Hawkesworth's three-volume work An Account of Voyages undertaken...for making Discoveries in the Southern Hemisphere (1773). This work blended Cook's writing with those of his crewmen's diaries, most notably one of the voyage's officers and botanist Joseph Banks, and as Glyndwr Williams notes, he 'inserted reflective and philosophical passages... in order to enhance the story and render it more exciting to the readers' ${ }^{, 44}$ In trying to find the balance between entertainment and edification, this account still retained the British curiosity over the provision of scientific and technical information, with the timepiece playing a prominent role. Daniel Baugh remarks on the importance of Cook's modern seafaring device: 'to consider Cook's case in particular, we must take note that his habitual

[^30]persistence and exactitude paid unprecedented cartographical dividends because he had the advantage of new precision instruments' ${ }^{45}$ The discourse, in other words, was conditioned more than ever before by the inclusion of a timepiece on the voyage.

Earlier, the time spent in searching out 'remote nations of the world', to use Swift's expression, was a vast and largely inaccurate undertaking. This began to change in the latter part of the century when the government commissioned James Cook to lead three circumnavigations that would have a lasting impact on England's visions of science, empire and of the Pacific. In contrast to the treasure hunts of earlier, shorter expeditions led by luminaries such as William Dampier or Woodes Rogers, ${ }^{46}$ the voyages were supplanted by the more sophisticated impulse of science and research. On the first voyage, Captain Cook commanded the Endeavour and, overtly at least, the primary purposes were in themselves ostensibly astronomical. Several voyages to certain pre-ordained sites around the globe had been commissioned to observe and, in temporal terms, chart the Transit of Venus, with Cook's voyage to Tahiti being the most prominent. In preparation for the journey the Commission for executing the Office of Lord High Admiral of Great Britain ordered the Endeavour,
... to be fitted out in a proper manner for receiving such persons as the Royal Society should think fit to appoint to observe the passage of the Planet Venus over the disk of the sun on the $3{ }^{\text {rd }}$ of June $1769 \ldots$ and have desired that the observation may be made at Port Royal Harbour [Matavai Bay] in King George's Island [Tahiti]... ${ }^{47}$

While obtaining and calculating the distance of the earth from Venus and the sun would, in effect, master space, the voyage to Tahiti was a voyage of the clock.

[^31]The main use of the timepiece was not navigational, as the journey could be navigated with relative safety. Rather, Cook had to be at the destination at a preordained time, in order to measure in temporal terms the four phases of Venus' journey across the sun.

Captain Cook arrived in Tahiti on April $6^{\text {th }} 1769$ and after anchoring in Royal Bay, headed inland 'where we had been directed to make our astronomical observation' ${ }^{48}$ The instruments had to be set up in the proper order, as shown in the writings of Green and Cook in the Philosophical Transactions of the Royal

## Society:

The astronomical clock, made by Shelton and furnished with a gridiron pendulum, was set up in the middle of one end of a large tent, in a frame of wood made for the purpose at Greenwich, fixed firm and as low in the ground as the door of the clock-case would admit, and to prevent its being disturbed by any accident, another framing of wood was made round this, at the distance of one foot from it. The pendulum was adjusted exactly the same length as it had been at Greenwich. Without the end of the tent facing the clock, and 12 feet from it stood the observatory, in which were set up the journeyman clock and astronomical quadrant ${ }^{49}$ (Figure 1.4).

The quadrant was used to check the rate of the astronomical clock, and the rate compared with that at Greenwich was used to give the relative force of gravity at the two places. Cook's experiment required detailed chronological measurement and, after the event, he decreed, 'the observation was made with equal success by the persons whom I had sent to the eastward, and at the fort... the whole passage of the planet Venus over the sun's disk was observed with great advantage by Mr. Green, Dr. Solander, and myself' (404-405).

[^32]

Figure 1.4. Engraving of a portable astronomical observatory. Image from the French edition of James Cook's second voyage, Voyage dans l'Hémisphère Austral, et autour du Monde, fait sur les Vaisseaux de Roi, l'Aventure, la Résolution (1778).

Observing the transit was the first and most important instruction for the
Endeavour's voyage, however, Cook also had secret instructions to observe the nature of the inhabitants. If given consent he would take possession of 'Convenient Situations in the Country ${ }^{50}$ and place them under the rule of his Majesty. He notes their tools and other technologies, records their rituals and the subtleties of their kinship system, and writes of their engagement with chronometry to this point:

They compute time by the Moon, which they call Malama, reckoning 30 days to each moon, 2 of which they say the moon is Mattee, that is, dead, and this is at the time of the new moon, when she cannot be seen. The day they divide into smaller Portions not less than 2 Hours. ${ }^{51}$

[^33]Moreover, he notes their customs appear to be routinised mainly according to nature's cues:

After their meals in the Heat of the day they often Sleep, middle Aged people especially, the better sort of whom seem to spend most of their time in eating and Sleeping. Diversions they have but few, shooting with the Bow and Wrestling are the Chief. ${ }^{52}$

Certainly, the Tahitians did not believe in obedience to the clock. There were no discernible alternations of work and leisure recorded and, as evidenced, their days were not regulated by temporal activity, at least not in the artificial or mechanical sense that engendered frenetic activities. Instead, similar to Crusoe's arrival on his island, a natural or cosmic time orientation marked by sunrise, sunset, and night remained the temporal reference point fundamental to the arranging of tasks. The reorganisation of social and economic patterns in the eighteenth century according to the temporal regime of the industrial revolution (which will be a focus in Chapter 3) led to the increasing propensity to measure the worth of all human activity and, therefore humans, by the calculation of hours, minutes and seconds. When describing the Tahitians as, 'what the ancient Britons were before civilization', ${ }^{53}$ that is, in part, before the time of the clock, Cook and his men were able to imprint on them certain notions of the premodern noble savage.

Gananath Obeyesekere acknowledges that Cook brought a new vision of the world to the lands of the South Seas. He was, in effect, the civiliser and 'this aspect of the civilizer's persona is expressed in a variety of powerful symbolic sequences pertaining to fertility and order. ${ }^{, 54}$ It is noted that wherever he goes he

[^34]plants English gardens. This act, like the erecting of Shelton's clock, is primarily symbolic, as Obeyesekere further describes, he is 'supplanting the disorderly way of savage peoples with ordered landscapes on the English model. ${ }^{55}$ The symbolic acts of transposing a framework of domestication are acts of appropriation parallel to the symbolic taking over of the country by the ceremonial planting of the English flag and, by setting up the clocks, Cook is transposing time from an imperial source onto the natural timeframe of Tahiti. Similar to Robinson's exile on the island or Gulliver's journey in Lilliput, he indexes the clock's increasing eminence in a place which, until that point, was devoid of meaningful temporality from a European perspective.

During the first voyage, the resistance to Cook's intrusion was minimal, limited to the occasional theft of items that were, in most cases, promptly recovered with little need for penalty. The Tahitians looked on their Captain with feelings akin to the Endeavour's officers and crew: 'Cook is a loving yet stern father, aloof and idealized... their guide and genius. ${ }^{56}$ When leaving Tahiti for good, Captain Cook expresses the scepticism he felt about contact with the Tahitian people. In the journal, he notes that 'we debauch their morals already too prone to vice and we introduce among them wants and perhaps diseases which they never before knew and which serve only to disturb that happy tranquillity they and their forefathers had enjoyed. ${ }^{57}$ Denis Diderot notes the reaction an elder has to the incursion on his land:

Here, as about to leave the tropics, a Tahitian elder delivers a speech to the two peoples... Weep, unhappy Tahitians! Weep! Not though, at the leaving of these cruel ambitious men, but at their coming. For one day

[^35]you will see them for who they are. One day they will return... They come to put you in chains. ${ }^{58}$

The overall sense of both Diderot and Cook is of the encroachment on Tahiti soil of foreigners, and, like the elder, of a broad subversion of his people and a disturbing of their 'happy tranquillity'. The elder's reference to 'chains' forewarns of an acute as well as physical temporal imprisonment.

The success of the first voyage so impressed the Board of Admiralty that Cook was asked to lead an expedition toward the South Pole and to circumnavigate the world by way of the Pacific, so as to ascertain whether there existed a southern continent that reached into the Antarctic. The instructions to Cook and to the members of the scientific staff emphasised the necessity of accurate observation and measurement, and for the first time in voyaging history, their devices included a replica made by Larcum Kendall of Harrison's H4 chronometer. On the Friday before departing, 'the Watches were put in motion' ${ }^{59}$ and once underway, 'depending on the goodness of Mr. Kendall’s Watch ... I resolved to try to make the island by a direct course, it did not deceive us and we made it accordingly on the $15^{\text {th }}$ of May at Day-break'. He continues, 'even the situation of such islands as we past without touching at are by means of Mr. Kendall's watch determined with almost equal accuracy. ${ }^{60}$ Cook confirmed that an otherwise routine leg of the voyage had established the efficacy of a method for determining longitude at sea and his reaction to the chronometer was equally positive. Cook was pleased to report 'the result of some of these observations

[^36]shewed, that Mr. Kendall's Watch had answered beyond all expectations, by pointing out the Longitude of this place to within one minute of time to what it was observed by Messrs. Mason \& Dixon in $1761,{ }^{\prime}{ }^{11}$ going further to refer it as 'our trusty friend, the Watch. ${ }^{62}$ Similarly, on $21^{\text {st }}$ March, he expressed that 'it would not be doing Justice to Mr. Harrison and Mr. Kendall if I did not own that we have received very great assistance from this useful and valuable timepiece. ${ }^{93}$

Cook was the vanguard of the new British national identity that spanned the world. Using various iterations of the watch machine, Cook explored new lands and seas more thoroughly, opening up the world in a geographical sense and making its most distant corners seem accessible and even familiar to every reader. More importantly, Cook was one of the harbingers of civilisation and, by introducing chronology and the timepiece into new lands, he not only extended imperialist authority through symbolic and figurative acts of the clock, he also made imperial domination and chronological hegemony inevitable.

## China Watches

Prior to helping propel the British Empire's global expansion, the timepiece held an important role with British envoys during diplomatic exchanges with foreign countries. Gift giving was a crucial part of the regulation and practice of relations between ambassadors, and in his examination of diplomatic gifts in the eighteenth century, Christian Windler notes that the choice of items given was increasingly made of 'objects suggestive of the capacity of Europeans to

[^37]dominate nature by technological progress' ${ }^{,}{ }^{64}$ During this time, watches were most commonly given as informal gifts, the goal being to build friendships and subsequently achieve particular diplomatic goals. In his studies of OttomanBritish diplomacy in the eighteenth century, Michael Talbot observes that 'gifts played a crucial role in gaining the favour and cooperation of Ottoman officials, and it is in this period that watches began to take an important place in the British gift portfolio. ${ }^{.65}$ As the century progressed, a changing focus on diplomatic gifts saw a more formal place for watches within exchange practices, giving specific timepieces to specific people. The increasing use and consumption of watches within the Ottoman court and its wider elite society accounted for the growing popularity of British devices. As Talbot states, 'there is a significant correlation between the increase in watches given from the late 1710 s and the significant increase in imported watches in the same period ${ }^{\text {. }}{ }^{66}$ The gift of watches stimulated interest among Ottoman society and, as Talbot surmises, the clocks given to Ottoman officials had at least some role in generating interest for British timepieces.

The importance of the timepiece as a token to be given and received by diplomatic envoys was most evident in the Sino-British relationship during the era. Western-style clocks were first brought to China in the sixteenth century where, according to Catherine Pagini, 'Matteo Ricci reached the Ming court and obtained an imperial audience by exploiting the Chinese curiosity about Western

[^38]objects ... with a clock and a watch. ${ }^{67}$ The emperor 'was taken by the clock' and Ricci was subsequently 'received and entertained with all magnificence and courtesie. ${ }^{98}$ This provided Jesuit missionaries with an opportunity to make contact with the emperor and other influential scholars and, as Pagini acknowledges, 'Ricci owed the favourable admission he obtained into the Emperor's court to a clock and a repeating watch. ${ }^{69}$ The roles of the early Jesuits in China were as scientists, technicians and artists, and the theory and mechanics of horology were provided in an effort to teach the higher principles of the faith and, thereby, make religious conversions. Pagani further explains, 'Elaborate clocks, with their European technology housed in decorative shells, provided for the Jesuits the perfect link between science and art, both of which were in demand, and ensured them almost two hundred years of access to Chinese rulers. ${ }^{70}$ The teaching of these horological principles feature in Kangxi's Ode to a Self-Sounding Bell in which it was stated that:

The method originated in the West, Through instruction we learn the ingenuity. Wheels move while time revolves, Hands indicate the change of the minutes.
Those in the red caps can cease announcing the dawn, A golden bell prepares to announce the time. In the early morning I diligently work on government affairs, And am annoyed by the late memorials. ${ }^{71}$

While not explicitly stating the Jesuit's role in China's horological history, the passage both acknowledges the mechanical timepieces' origins in the West as

[^39]well as showing a rudimentary understanding of the principles involved. ${ }^{72}$ To position itself as a major world power China chose to engage with new 'cutting edge' technologies for state building purposes, in the same way that early modern states in Europe adopted the same technologies. ${ }^{73}$

The imperial nobleman, Zhao Lian, wrote of the increasing availability of western clocks in the eighteenth century, saying 'more clocks made in Europe in a genius way arrived from Canton. They are so popular that gentlemen fought to buy one' ${ }^{74}$ Markman Ellis, Richard Coulton and Matthew Mauger tell of a British tea trading vessel docked in Canton, which, after the conclusion of its affairs, was denied permission for departure until a privately owned decorative clock on board was surrendered. The clock was not required by the hoppo for personal use, but rather to send 'to the emperor as a present'. ${ }^{75}$ The admiration was largely due to the watches' exotic nature and mechanical ingenuity but, as in Ottoman society, the desire to own a watch stemmed largely from emulation of the ruling elite. As will be shown in Chapter 4, along with their traditional function as timepieces, elaborate clocks featuring decorative items and personal adornments were used as status symbols. As Benjamin Elman notes, this was no different in early China, where the 'interest in elaborate mechanical clockwork, as in Europe, clearly reflected the linkage of imperial power and prestige. ${ }^{76}$ Clocks were considered very desirable during the reign of Emperor Qianlong,

[^40]who himself was an avid collector of timepieces. Catherine Pagani states that 'the emperor's own collection was distributed over his three palaces', which were built as a 'repository for Western clocks and watches'. ${ }^{77}$ Peter Kitson goes further by noting some of the Western themed curiosities on show: 'among the collection of Western style clocks and watches the emperor owned was a British device 'that chimed tunes from John Gay's Beggars Opera on the hour. ${ }^{\text {. } 78}$ The popularity of the device prompted its inclusion as a subject for imperial poetry, for example it features in Ode to a Self-Sounding Bell:

The unusual treasures arrived by ship, The talented makers can surpass the palace lotus. Water and fire cannot illuminate the records, The autumn equinox moves on unperceived. The skill of the workmanship surpasses that of nature, At the appointed hour, it gives forth a sound. The clock indicates the time without error, Moving back and forth the wheels turn. It can show morning and dusk, The expanding and contracting springs make no mistakes.

The clock's distinct sounds embody perfection, The tunes herald [the time] in a variety of ways. If you desire quietude, Then you should not wind it up. ${ }^{79}$

In this verse, Qianlong highlights the alluring nature of the imported device for Chinese culture; the clock is notable for its timekeeping that is 'without error'

[^41]along with its artistry that 'surpasses that of nature', features that place it simultaneously as decorative and functional, and make it a desirable commodity. Many of these notions reverberated in the material culture of Qing novels such as Dream of the Red Chamber (1791) by Cao Xueqin. The novel is a fictionalised biography of the Qing dynasty that provides a record of the lives of two branches of the aristocratic Jia clan, and, through them, a description of eighteenth century life. Both clans reside in the capital in adjacent compounds and are held in great esteem at the beginning of the novel, although their wealth, influence and prestige decline as the story progresses. Clocks are mentioned throughout Dream of the Red Chamber and serve to reinforce the status of the wearer and impose order on the households, further demarcating the differences between the Chinese upper class and the non-elite. As with the majority of wealthy families at the time, clocks were owned primarily as a spectacle, for example, when meeting with Tai-yu, Pao-yu 'drew back his hand, and producing from his breast a gold watch about the size of a walnut' ${ }^{80}$ In this passage the artistic ingenuity of the watch is being appreciated more than the utilitarian value as Pao-yu is trying to impress the lady he longs for. Beyond the aesthetic appeal of the watch, later in the novel, when Wang Xifeng is appointed as household manageress of the Ningguo mansion, the clock is relied on to both regulate her day and impose order on the servants as well:

That same day Phoenix took up the management. The first thing she did was to make a list of the names of all the staff. And then, every morning at half-past six punctually, she held a roll call ... And even when she had had only a few hours' sleep, she never missed this hour of the roll call. She demanded the same punctuality from the servants. Her own servants all had watches and were trained to be punctual to the minute, she told the staff. There must also be watches in the

[^42]Ningkuo palace ... The slovenliness which hitherto had reigned in the Ningkuo palace was replaced by stern discipline. ${ }^{81}$

Within Chinese society, the ownership of a pocket watch usually signified a higher social position for the wearer; however, in this instance the servants are all granted possession of a timekeeping device. This widespread ownership hints at the wealth of the family they serve, although this ownership is also married to the increased control the family covets. With the dissemination of clocks, along with the 'watches in the Ningkuo palace', those in power could manage those who worked around them, as better management of time could translate into better control of manpower. This was important for control over the servants who were reminded of their routines and duties to the family.

The British were well aware of China's, and more specifically the Qianlong emperor's, love of timepieces and saw this as an area to exploit when seeking to increase imports into China and establish diplomatic relations. By the later eighteenth century, Britain imported luxury consumer goods from China, which ranged from porcelain and silk, to lacquer and caneware furnishings, but it was tea drinking that made enormous demands on outflows of bullion to China. As Maxine Berg explained, 'the British purchased $£ 1,300,000$ worth of tea in Canton in 1786, and paid out for nearly half of this in silver bullion rather than other export goods. ${ }^{, 82}$ It was in the succeeding years that Britain sought to rebalance the trade deficit and looked at developing a Chinese market; however the emperor of China had previously closed the country to the majority of European merchants and permitted a limited trade at certain specified ports. In 1792, George Macartney led perhaps the most famous mission to the court of the

[^43]Qianlong emperor in an attempt to present and impress the older, sophisticated Qing culture with the brave new world of British science and the impressiveness of British manufacture. The key goal of this diplomatic mission was to enhance conditions of trade and to 'excite at Peking a taste for many articles of English workmanship hitherto unknown there ... [and] turn the balance of the China trade considerably in favour of Great Britain. ${ }^{83}$

The presentation of gifts was at the heart of the embassy's meeting with the emperor, and chief among the numerous preparations was the gathering of presents. Various assumptions were made over what would best attract the attention of the Chinese court, but the embassy was aware of the interest in horology among the Chinese and the access it had granted Jesuit missionaries. The timepiece, therefore, figured prominently in Macartney's strategy, and in May 1792, the embassy's mechanic Dr James Dinwiddie, began preparing a list of gifts that included mechanical devices. He 'suggested that Macartney purchase, among other articles, a planetarium and curious watches. ${ }^{94}$ James L. Hevia confirmed that, along with the clock featured in the 'Catalogue of Presents', Macartney purchased additional timepieces for his audience with the court as special gifts that he could personally give to the emperor; 'from Henry Browne at Macao he bought a telescope and later acquired two watches of 'very fine workmanship' from Captain Mackintosh'. ${ }^{85}$ The watch had a number of purposes within the expedition, most notably to catch the curiosity of the Qianlong emperor and to convey that the gifts brought from the Crown were the

[^44]most precious considered in Britain, and the best examples of British science.
However, as Maxine Berg states, the timepieces had to be 'superior to the clocks
... brought by earlier visitors'. ${ }^{86}$
The Qianlong emperor received Macartney at the park of Wanshu Yuan, and, just as it had been derided by experts in London, who had already ridiculed the intended gifts for China as a banal effort to redress Britain's largest deficits in the China trade, the mission became a target for British satirist James Gillray. In The Reception of the Diplomatique and his Suite at the Court of Pekin (1792)
(Figure 1.5), Gillray presented the introduction between Macartney's envoy and the Chinese emperor. ${ }^{87}$ Macartney is at the forefront of the British contingent and foregoes the prostrations demanded by the Chinese court, choosing to kneel in front of the emperor as he would to his sovereign. His attitude towards performing the Chinese kow-tow is acted out by the undignified figures behind who are bowing, with their heads touching the floor, their faces hidden and the back of their breeches exposed. In Macartney's right hand is a letter from King George III, which is signed 'GR $\backslash \mathrm{WP}$ [Pitt] Sec', while his left hand is indicating the collection of tribute gifts which have been placed at the emperor's feet. These include a shuttlecock and bat, an oval miniature of George III, a toy windmill, a volume of Shakespeare, a dice-box and dice, and a clock, all of which were, as Frederick Wakeman explains, 'the best gifts George III had to offer'. ${ }^{88}$ Overlooking these proceedings is the Chinese emperor, reclining under a dragon-

[^45]ornamented pagoda with a disdainful look toward the party, and flanked by a guard, advisors and a child holding a tray with a teapot and cup, itself a symbol of what China offers in return should the party be successful.


Figure 1.5. James Gillray, The Reception of the Diplomatique and his Suite at the Court of Pekin (1792), National Portrait Gallery, London.

The British envoy believed the gifts that had been brought were enough to convince the Qianlong emperor of Britain's dominance in science and technology. There was, as Benjamin Elman continues, a 'notion of Chinese ignorance that convinced him [Macartney] that diplomatic success would naturally follow' ${ }^{89}$ The grandiose display the British envoy had concocted to awe the court and sway opinion toward Macartney's requests was, however, illconceived. As the picture astutely indicates, the emperor and his court expressed

[^46]a studied indifference, implying that they had already seen such wonders. Indeed, when later given a tour of the palace, Macartney noted:
(The pavilions) ... are all furnished in the richest manner, with pictures of the emperor's hunting and progress; with stupendous vases of jasper and agate; with the finest porcelain and Japan, and with every kind of European toys and sing-songs; with spheres, orreries, clocks, and musical automations of such exquisite workmanship, and in such profusion, that our presents must shrink for the comparison and 'hide their diminished heads. ${ }^{90}$

At the conclusion of proceedings, Macartney was unsuccessful in obtaining the trading concessions Britain required, and, while many factors contributed to the emperor's decision - the failure to participate in the formal Chinese greeting and misjudging the intrinsic value of the gifts being presented ${ }^{91}$ being but two missteps - the clock became emblematic of this failure. As he acknowledged, among the many artefacts held within the palace, the Emperor's vast collection of timepieces surpassed the British offerings. Martin Adas comments that, at this time, 'observers came to view science and especially technology as the most objective and unassailable measure of their own civilisation's past achievement and present worth ... few disputed that machines were the most reliable measures of humankind. ${ }^{, 92}$ Just as the clock provided a defining identity for Britain's cultural and technical superiority when visiting countries such as Tahiti, so too did it, in this instance, illustrate an image of a disempowered imperialist nation.

[^47]
## Erasmus Darwin's Horologe

The timepiece in its varying forms served as an important instrument in British colonialism, but, at this time, another interrelated colonial science was coming to the forefront. The collecting, nurturing and distribution of plants became a patriotic activity with botanists accompanying every expedition overseas with the hopes of acquiring new and exotic species. The aforementioned voyages of Cook and Macartney were accompanied by botanist Joseph Banks, whose job was to determine technological and scientific knowledge about other parts of the globe and integrate that knowledge within the boundaries of the British Empire. As John Gascoigne notes, 'the advancement of science and the advancement of Britain's imperial interests formed a natural partnership. ${ }^{93}$ With the Royal Botanic Gardens at Kew at its hub, Banks created an institute for exchange that helped the creation of a network of colonial gardens, transferring and cultivating specimens for the benefit of the British Empire. The botanical collections of the era were representative of Britain's vast geographical exploration ${ }^{94}$ and, as Peter Kitson continues, 'horticulture and natural history formed part of the circulation of aesthetics, information, wealth, goods, and other material and cultural

[^48]productions in global maritime trade. ${ }^{95}$ The transference of plants from foreign climates hinted at how natural environments could be successfully displayed outside their usual geographic boundaries, and as plants and seeds were inserted into British landscapes it became possible to think about nature in abstract terms. It was in this environment that Erasmus Darwin wrote The Love of the Plants (1789) as part two of The Botanical Garden, and made the connection between botany and the timepiece. As Janet Browne notes, Darwin intended the poem to be 'a vindication and explanation, both amusing and instructive, of [Carl] Linnaeus's classification scheme for plants', ${ }^{96}$ but more importantly, she said that Darwin's work expresses his 'wide ranging views about society and progress. ${ }^{97}$

The setting of the poem is undoubtedly a garden, as Browne puts it, 'in which exotic species intermingle with indigenous plants ${ }^{98}$ and Canto Two's personification of plants allows the interchange of ideas between one realm, the botanical, and another, the science of clocks. The narrator, or 'Botanic Muse'99, alluded to in the poem as the knowing eye, supplements the poem with additional notes, pointing to 'what Linneus calls the Horologe, or Watch of Flora', before continuing:

And many other flowers close and open their petals at certain hours of the day ... he enumerates 46 flowers, which possess this kind of sensibility. I shall mention a few of them with their respective hours of rising and setting as Linneus terms them. He divides them into meteoric flowers, which less accurately observe the hour of unfolding ... 2d. Tropical flowers open in the morning and close before evening every day; but the hour of the expanding becomes earlier or later, as

[^49]the length of the day increases or decreases. 3dly. Equinoctial flowers, which open at a certain and exact hour of the day, and for the most part close at another determinate hour. ${ }^{100}$

This floral artefact was a Linnaean notion described by Martin Priestman as 'a circular flower-plot designed to show the time of day in purely spatial terms, with the successive opening and closing of its flowers', ${ }^{101}$ and it was on this supposition that the working of the Watch of Flora was described. ${ }^{102}$

In arranging and grouping the species according to their attributes, Darwin encouraged readers to see in his work the interconnectedness of the natural functions of plants and the artificial working of the chronometer, but it was in the subsequent verse he expressed further the orientation towards technological change:

Watch with nice eye the Earth's diurnal way, Marking her solar and sidereal day, Her slow nutation, and her varying clime, And trace with mimic art the March of Time
(Loves, 2. 167-170)
The poetical description contains a portrait of the changing seasons of the earth's chronological rhythms, but, through wordplay, Darwin chooses to bring into this cycle what Maureen McNeil describes as 'the mechanistic progress of the

[^50]organic world.' ${ }^{103}$ 'Watch' at once represents sight, as emphasised by the ensuing reference to 'nice eye', but also the physical manifestation and literal representation of chronology. While the phrase 'March of Time' (170) conjures the image of time passing and of the ordering of nature through the mechanical device, it also represents the underlying notion of imperial progress and links it to this vision of the timepiece.

Maureen McNeil further states, 'Darwin was doubly fascinated by machines and by mechanical genius. Hence he was abreast of the mechanical innovations of his day'. ${ }^{104}$ Among Darwin's circle of 'philosopher friends', as Anna Seward calls them, ${ }^{105}$ his acquaintance with Derby clockmaker John Whitehurst had led to his idea of the clock. Jenny Uglow notes that Darwin 'learned much about instrumentation and invention ${ }^{106}$ From Whitehurst, and it is with this knowledge that he goes on to underscore the idea of the timekeeper by describing the mechanical workings in great detail:

Round his light foot a magic chain they fling,
And count the quick vibrations of his wing.---
First in its brazen cell reluctant roll'd
Bends the dark spring in many a steely fold;
On spiral brass is stretch'd the wiry thong,
Tooth urges tooth, and wheel drives wheel along'
In diamond-eyes the polish'd axles flow,
Smooth slides the hand, the ballance pants below.
Round the white circlet, in relievo bold
A serpent twines his scaly length in gold;
And brightly pencil'd on the enamel'd sphere
Live the fair trophies of the passing year.
(Loves, 2. 171-182)

[^51]In stark contrast to the watch of flora, the natural diurnal rhythms have been completely sifted out of his vision of time and, through the elaborate set of images under the auspices of the clock case, the mechanical workings of springs, wheels and axles, the subordination of the natural world can be seen. The idea of subordination or domination of 'Earth's diurnal way' is further captured through Darwin's use of the 'magic chain' that echoes the 'great Silver Chain' of Gulliver's watch and the 'chains' of the Tahitian elder. If, as Uglow writes, 'Nature, on every hand, offered herself for investigation' then it is with Darwin that ordering 'the vast and complex riches of Nature' ${ }^{107}$ is a priority.

The Love of the Plants can be read as commentary on how industrialism passed into a new phase. As McNeil stresses, 'Erasmus Darwin was not a passive observer of the Industrial Revolution, rather he was involved in many of the changes associated with this economic transformation of Britain.' This was acknowledged in his two major poetic works, 'The Botanic Garden $(1789,1791)$ and The Temple of Nature (1803) that celebrated crucial features of these changes'. ${ }^{108}$ Darwin knew that the mechanical clock produced dramatic changes and, in turn, represented the forces of change. While his poetry highlighted the achievements of science and machines, his reverence for the clock manifested itself with numerous references to clocks. In this sense, Darwin's poetry was a cultural expression of a fundamental shift that marked the assimilation of the clock into eighteenth century English culture.

By highlighting the achievements of science, explorers, botanists and machines, the poem showed the ascendancy of Britain's imperial expansion. Alan Bewell notes that 'its enlarged vision of nature is in keeping with that of a

[^52]nation whose strength increasingly lay in its control and management of global nature. ${ }^{109}$ This is not, as might be expected, or as touched upon previously, through travelling to exotic and faraway climes, but through the introduction of those climes to familiar settings. Plant transfer had never before been undertaken on such a scale and, through the classification of plants, Darwin reflects on how clocks and imperial progress are inseparable. If the clock was indeed an integral component of progress overseas, and equally so the collection and ownership of seeds and plants was tied to the idea of territorial sovereignty, then the marrying of both provided a new image of imperialism that praised the cultural significance of the timepiece.

## Slave to the Clock

The groundwork for temporal reconfiguration - from natural time to mechanical precision - among the outer settlements of the empire had been laid most obviously by the explorers and settlers of Britain's colonial endeavours. Introduction of the clock and of clock time to the indigenous colonial labour would, it was hoped, improve production and preserve order and discipline of its predominantly slave labour. As Mark M. Smith argues, the settlers held a monopoly over the tools of time and 'the grafting on of carefully selected capitalist management techniques to the colonies would prove of considerable benefit to a society concerned with heightening the dual components of modern political economy: increasing productivity and efficiency and also stabilizing an inherently volatile workforce. ${ }^{110}$

[^53]It was against this backdrop that James Grainger wrote The Sugar-Cane (1764), a poem that evokes discourses of conquest, cultivation and science in setting forth his image of the ideal planter-protagonist. Commerce lies at the heart of the poem, but, as Grainger explains over the course of the four books, this is made possible by military might, the industry of the planter and the voyages and investigations of the scientist (preceding Cook, Columbus is in this work invoked as the enabler of transatlantic commerce). In Book IV, Grainger employs ideas associated with conquest to illuminate methods of imperialist mastery, most notably the passage and apparatus of time. The temporal passages in the poem range from the daily rhythms that are signalled through examples such as the 'six times the changeful moon must blunt her horns' (Book I. 453), to the seasonal: 'The cheerfulness and healthiness of the Negroes in crop-time' (Book III. Invocation), and to the yearly: ‘But when the earth Hath made her annual progress round the sun' (Book IV. 162) or 'The planter's labour in a round revolves; / Ends with the year, and with the year begins' (Book II. 46-47).

For Grainger, time is woven into the fabric of the islands and, while these passages sketch an expansive vista of the measures of chronology within the poem, it is in his advice to British planters regarding the humane care of slaves in the invocation of Book IV that the passage of years, weeks and days gives way to the temporal sphere of the clock. He asserts that slaves 'should not begin to work before six in the morning, and should leave off between eleven and twelve; and begin again at two, should finish before sunset' (Book IV. Invocation). In advocating a working day, he maps slavery onto the more familiar terrain of industrial labour. As Shaun Irlam further explains, 'Grainger's poem is a calculated attempt to export to a colonial address this georgic model for framing
the English landscape: namely, to the sugar plantation. ${ }^{111}$
Grainger goes further to use clock time as a means of restricting the liberty of slaves:

Compel by threats, or win by soothing acts, Thy slaves to wed their fellow slaves at home So shall they not their vigorous prime destroy, By distant journeys, at untimely hours, When muffled midnight decks her rave-hair With the white plumage of the prickly vine.

The clock and its attendant ability to order behaviour was being used to regulate slaves, both economically and socially, to limit their marriage possibilities in order to keep the workers fresh for labouring in the field. In conjunction with the 'threat' of the whip, Smith further observed that, if 'used properly, clock time could inspire discipline and obedience in a slave workforce'. ${ }^{112}$ As Grainger notes, clock time became the planter's weapon of choice in their struggle to implement the succession of an industrial measure of labour.

## Conclusion

John Harrison's invention does not materialise until the middle of the eighteenth century, but it nevertheless had a profound effect on the latter half of the era. The early rivalry between European powers in the race for colonial and imperial domination depended to a large extent on each country's technological ability to extend and impose its temporal order on the time-less and uncharted world at large. As Dan Thu Nguyen discusses, 'the first stage of this demonstration of temporal power consisted therefore of the successful use of metric time on the

[^54]seas; the first nation state to discover the longitude at sea would be the first to acquire world-power status. ${ }^{113}$ Peter Galison furthers Nguyen's observation on the development of navigation by bluntly noting that the co-ordination of clocks was driven by 'national ambitions, war, industry, science, and conquest.' ${ }^{114}$ Writers and artists were clearly aware of the nationalist and economic stakes driving the demand for accurate global positioning and incorporated the import and export of the device into their work.

Just as the chronometer aided the British Empire's expansion across the globe, the timepiece also enabled Britain to embark on a cultural exchange between foreign territories. The British engaged in gift giving practices throughout the world in order to receive and maintain diplomatic relations, and, with varying results, the timepiece formed a central function of the ceremony. The exploration of other countries also allowed Britain to engage in another form of cultural exchange resulting in the amalgamation of nature and science. Erasmus Darwin postulated that clocks and clock time were intimately linked to nature, although it was not until the colonisation of other climes and the appropriating of foreign seeds that the eighteenth century was introduced to Watches of Flora. Similarly, Defoe, Swift, Cook and Grainger framed the chronometer as a tool for extending the Empire's reach in two ways. Both as a means to disseminate clock time across the globe and by noting the exercise of imperial power as fundamentally connected to the timepiece. All anticipated to a certain degree Nguyen's claim

[^55]that global standardised metric time's 'hegemonic deployment signified the irreversible destruction of all other temporal regimes in the world'. ${ }^{115}$

[^56]
## CHAPTER 2

The Public Clock
Prior to the eighteenth century devices found on the exterior of buildings to which the population had access were wide-ranging, although in many cases the timepieces were largely independent of central governance and little more than architectural decoration for manor houses and churches. As Alexis McCrossen notes, these early devices were known as 'public clocks' because 'the audibility and visibility of the hour's bells and clock faces make them public regardless of ownership, provenance or location'. ${ }^{1}$ It was not until the beginning of the eighteenth century that a singular, and unified, public clock time started to impinge upon the lives of the community and its workers, with Frank HopeJones and George Bennett Bowell further musing on the importance of an accurate public device: 'is there anything so unjustifiable as to expect every member of the community to keep his own time? ${ }^{2}$

Using Thomas Gray's Elegy Written in a Country Churchyard (1751) as a portal, this chapter will introduce the notion of this transition from natural time to the industrial clock as it occurs publicly, in Britain, during the century. The chapter will then explore in more detail how circadian rhythms of sunrise and sundown were not disregarded, at least while work remained pre-industrial; rather, through analyses of Stephen Duck's The Thresher's Labour (1730), Mary Collier's The Woman's Labour: An Epistle to Mr. Stephen Duck; In Answer to his late Poem, called The Thresher's Labour (1739), Thomas Legg's Low-life: Or, One Half of the World, Knows not how the Other Half Lives (1750), various

[^57]images by William Hogarth, and William Wordsworth's The Prelude (1805), the chapter will show that as the century progressed there was a fundamental change in the significance of time in the work process. Natural time was inevitably suppressed in favour of time that was increasingly visualised as linear, task orientated and ultimately clock orientated, and E. P. Thompson will underscore this discussion. He noted in 'Time, Work-Discipline, and Industrial Capitalism' (1967) that the key for change in the conception of temporality was a 'more exacting labour discipline ${ }^{3}$ through time orientation. Thompson maintained that a clock-dominated environment became the predominant way of life in the century, particularly in the way it aimed at bringing about the secular changes in the rhythms of society. People were responsive to the cacophony of audible and visible signals indicating when to begin or end an activity, and by following work schedules, which restricted actions to certain times of the day, the public temporal structures simultaneously constrained and empowered communities. Thompson declared, 'in all these ways - by the division of labour; the supervision of labour; fines; bells and clocks; money incentives; preachings and schoolings; the suppression of fairs and sports - new labour habits were formed and a new time discipline imposed ${ }^{\prime} .{ }^{4}$ That is to say, work touched by clock time was tied up with hegemony and power, which is central to the connection between time and the economic goal of efficiency and profit.

Traditionally the technologies of keeping time and telling time by the bell and clock were separate; a bell chimed the hours, but it did not determine the time. Similarly the clock face indicated the time but could not communicate this to the majority of workers, worshippers and people living outside the visible range of

[^58]the device. 'Public clocks' brought the two technologies together with an unheralded accuracy in the century, and in this chapter is an umbrella term to describe the several distinct mechanisms, including bells and mechanical clocks, that combine to make the device. Throughout the chapter an important aspect of the public clock's value lies in implicit references within literary texts and as such this chapter will also focus on and explore metaphorical references to the clock and clock time. Similarly the close reading of the text and visual images will show that the use of clocks and time, literally or metaphorically, are not merely rhetorical or casual but are significant markers of the changes being charted.

## Gray, Duck and Collier: From Cock to Clock

Since the beginning of the eighteenth century the timepiece steadily encroached on public life in England, and it is with Thomas Gray's Elegy Written in a Country Churchyard (1751) that the transition from established methods of timetelling and keeping toward the public clock's integration and construction of the temporal framework of the village is introduced. Elegy reveals a picture of night settling down over a lone watcher in the enclosed world of the country churchyard. Moreover, Gray presents the churchyard as a place in which the poet meditates on death, the transience of life and the social differences in life that are completely dissolved, all while under the watchful gaze of the church's 'ivymantled tower'. ${ }^{5}$ The passage of time is carefully established in the opening

[^59]stanzas of the poem. As Gray expresses, the last streak of light fades from the sky,

And leaves the world to darkness and to me, Now fades the glimmering landscape on the sight, And all the air a solemn stillness holds,
(Elegy, 4-6)

Besides the explicit references in these lines, the fading of light and passage of natural circadian time is further implied in the next lines:

Save where the beetle wheels his droning flight, And drowsy tinklings lull the distant folds;
(Elegy, 7-8)

Frank H. Ellis notes that images of sound in the poem now outnumber images of sight, and 'the sounds themselves, the droning of a beetle, the tinkling of distant wetherbells, and the hooting of an owl, produce a decrescendo from the original tolling of bells and lowing of cattle. ${ }^{6}$ Additionally, the looming darkness reduces the visual images of pastoral landscapes to objects of the immediate scene. Early in the poem the speaker observes,

The lowing herd wind slowly o'er the lea, The plowman homeward plods his weary way,
(Elegy, 2-3)
However, as the poem progresses all that is seen through the impaired light are the black mass of the previously mentioned 'ivy mantled tower' (9) and the 'turf' grown graves, or 'narrow cell[s]' (15). The moon is established to have fully risen when the speaker describes how 'The moping owl does to the moon complain' (10), restating the sense of the first stanza that time, albeit natural time, is passing.

[^60]The church stands as an abiding symbol over the surrounding area, ${ }^{7}$ one that is appropriately heralded by the evening bell ringing that marked the country day drawing to a close. This essential note is struck in the first line where the day's passing is sounded with an auditory image: 'The curfew tolls the knell of parting day' (1). 'Curfew' is the time for putting out the home fires ${ }^{8}$ and 'knell' indicates the ringing of a bell to announce a passing or funeral, and through this action the dual purpose and importance of the church bell, that is, to signal the time of sundown and ring on occasion of death. According to Alain Corbin the emotional impact of the 'toll' helped create a territorial identity for individuals living in range of its sound: 'When they heard it ringing, villagers and townsfolk experienced a sense of being rooted in that space ${ }^{9}$ and by extension that time. Elegy muses upon the mundane lives of the common, everyday people of the village, not just the rich and privileged, and this notion is further elicited through the passage of time and the tolling of the bell. 'Th' inevitable Hour' (35), as Gray suggests, not only awaits both rich and poor equally but the difference is illusory as far as time is concerned.

These contrasts are important to the poem as Gray further links the lives of persons past and present and the connection of one's tasks to the methods of old and new timekeeping. Gray did not know the 'forefathers' of the village, as they

[^61]existed; rather he knows them by the re-creation of their lives through the reading of epitaphs on the surviving memorials. This was evident in the flow of temporality and marking of tasks in accordance with the natural sources of time evident in the pastoral tradition of village life. The poet laments the fact that the men and women living in the nearby village no longer wake up by listening to the chirping of the birds, the trumpet sounds made by the cock and their echoes:

The breezy call of incense-breathing morn, The swallow twittering from the straw-built shed, The cock's shrill clarion, or the echoing horn, No more shall rouse them from their lowly bed.
(Elegy, 17-20)
The motion of the daytime is further prompted through the tending of the harvest and ploughing of the 'blazing hearth':

Oft did the harvest to their sickle yield,
Their furrow oft the stubborn glebe has broke;
How jocund did they drive their team afield!
How bowed the woods beneath their sturdy stroke!
(Elegy, 20-25)
Working beneath the 'sturdy stroke' is an implicit reference to the 'stroke' of the clock. This underscores the contrast with the speaker's world where temporality is conveyed by auditory measures that required tasks to be increasingly understood in terms of continuous clock time. As mentioned, the signal emanating from the bell tower indicated 'curfew'. However, as W. M. Newman argues, far from being rung on a subjective timescale of day and night or natural time conveyed by a 'cock's' cry, the time of the ringing was being set to a precise measure of units. He explains that in Stoke Poges, the village in which Elegy is allegedly set, sunset during the autumn season 'is at seven, twilight ends before eight, and night proper begins just before nine. Windsor curfew goes at
eight. ${ }^{10}$ Therefore when the poet describes the 'lowing herd' (2) being moved to the shelter of the farmyard and the end of a day's work and return home for the 'plowman', (3) he is in effect showing the role of the church clock and bell in the rigid temporal architecture of this community.

While the clock in Gray's Elegy was presumptive due to the bell's striking at given times of the day and evening, the poem shows the extent to which clocks and bells were both familiar objects in public spaces and served an important civic function. The poem has temporality infused into its structure; day is 'parting', the glimmering landscape 'fades' and the passing of time is suggestive of the way the speaker perceives his world. Initially the community merely approximates the periodic temporal patterns inherent in the natural world. However, the poem is on the cusp of the rearrangement of public time. The bell in conjunction with the clock ${ }^{11}$ represented a transition from traditional time and came to provide a precise auditory certification that is integral in the construction of the temporal framework of the village. This not only reveals a range of very public time-telling practices that through the church bell signal time, but more importantly, it exerts control over the public environment and brought a widely dispersed and heterogeneous population into one temporal frame.

Unlike the churchyard setting of Gray's poem, time in Stephen Duck's The Thresher's Labour (1730) is primarily construed in terms of a regular calendar of activity. The poem chronicles the typical 'Toils of each revolving Year' ${ }^{12}$ for an agricultural labourer threshing 'Wheat', 'Barley', and 'Pease' in the fields.

[^62]Although he in part invokes the pastoral world of joyful, singing shepherds, Duck extends his poem beyond the conventions of this eighteenth-century poetic tradition, or as William J. Christmas notes, it is in The Thresher's Labour that he 'deftly undercuts this idealization with details of his contemporary agricultural environment and a thresher's working conditions'. ${ }^{13}$ Duck's poem begins with the master gathering his 'threshers' and assigning them their 'stations' for the tasks ahead:

He calls his Threshers forth. Around we stand, 'with deep attention, waiting his command. As he directs, to different Barns we go, Here two for Wheat, and there for Barley two.
(The Thresher's Labour, 19-22)
The regimentation implies the harvest commences under the shadow of impending industrialisation. However, it is in the treatment of temporality in the fields that Duck provides, as James Mulholland describes when surveying the new realities of the country in Duck's work, the 'larger social and economic changes precipitated by agrarian capitalism', ${ }^{14}$

Duck begins his poetic revision of rural labour by emphasising the endless cyclical nature of the thresher's toil: 'Week after Week we this dull Task pursue' (70). The working cycle is also predicated on the changing of seasons and the daily routine from sunrise to sunset. As labourers the men were on call during the daylight hours and it is at the start of the working day that Duck's exposition illustrates the overlapping of linear clock time with natural time:

At a just distance, front to front we stand, And first the Threshall's gently swung, to prove Whether with just exactness it will move.

[^63]That once secure, more quick we whirl them round, [...]
And now with equal force descend from high.
(The Thresher's Labour, 32-35, 39)
The poet depicts the threshing as having a dual purpose; at once he describes the necessary impact from the flail, but Duck also recalls the motion as similar to the workings of the clock. The 'Force increasing' recalls the winding of the timepiece while the intensity and uniformity of the 'equal' swipes once the instrument has been wound evoke the image of a pendulum in motion. However, it is when the task is underway that Duck finally aligns the image of threshing to the public timekeeper:

Down one, one up, so well they keep the Time,
The Cyclops' Hammers could not truer chime
(The Thresher's Labour, 40-41)
The threshers perform their tasks with a clocklike uniformity that marries their actions to the timepiece, and it is with the 'truer chime' that Duck references the audible signal that, as previously shown in Gray's poem, was increasingly becoming synonymous in the eighteenth century with the public clock. This leads E. P. Thompson to note that it is this description of threshing that 'disabuses us of any notion that "mechanical" and repetitive labour must await the coming of industrialisation and the production line. ${ }^{15}$ Duck is suggesting that clock time as an arbiter of work could impose discipline in a workforce transitioning from traditional field labour, under diurnal rhythms, to a temporal framework akin to industrial labour governed by the timepiece.

[^64]Although the threshers maintain a vigorous work pace, Duck complains that the workers cannot take a break without the silence of the flail betraying them to their master:

No intermission in our Works we know;
The noisy Threshall must for ever go.
Their Master absent, others safely play;
The sleeping Threshall doth itself betray.
Nor yet the tedious Labour to beguile,
And make the passing Minutes sweetly smile
(The Thresher's Labour, 46-51)
While 'others safely play', which it can be inferred applies to the workers not bound to an objective time scheme of the clock, there is no opportunity for the exhausted labourers to take repose. Once the working day has commenced the threshers are required to follow a timetable that does not account for subjective interludes. This notion is supported by Eviatar Zerubavel who argues that efficiency goes hand in hand with a conception of objective time, and by following a rigid temporal structure there is a strong condemnation of 'timewasting, which necessarily entails a devaluation of 'dispensable and unnecessary activities. ${ }^{16}$ Duck echoes this sentiment when the tasks of the day have been completed:

The Threshall yields but to the Master's Curse:
He counts the Bushels, counts how much a day, Then swears we've idled half our Time away. Why look ye, Rogues! D'ye think that this will do?
Your Neighbours thresh as much again as you.
(The Thresher's Labour, 73-77)
That the master rebukes the thresher for not making the most of his time embodies a simple relationship, one in which the regulation of work time was of

[^65]critical importance for economic prosperity and in which the employer must make sure the time of the worker is utilised to its maximum potential.

While the thresher's time at work was exploited to ensure the utmost productivity, the control the master exerted over his worker's time extended beyond the temporal boundaries of the field:

Early next Morn I shall disturb your rest, Get all things ready, and be quickly drest. Strict to his word, scarce the next dawn appears, Before his hasty Summons fills our ears. Obedient to his call, strait up we get, And finding soon our Company complete, With him, our Guide, we to the Wheat-field go, He to appoint and we the Work to do.
(The Thresher's Labour, 212-219)
Similar to the instruments in the field the audible signal regulating the start of the working day, in this instance the metaphorical alarm clock that Duck implies through the master's 'Summons', regulates the rise of the labourer and commencement 'to the Wheat-field go' and once again the 'Work to do'. The interest in economic productivity limited the workers private time, but more so, with the commencement of a new clock-regulated work ethos the master imposed temporal restrictions on the labourer both inside and outside of work.

Duck was writing during a period when England was still a predominantly agrarian society, yet the poem prefigured the structure of the working experience that was to become commonplace during England's industrial revolution.

William J. Christmas explains, though, that contrary to the prevalent temporal practices of the era, in the poem 'Duck represents his threshers as hardworking, selfless labourers who embody polite definition of "Industry," as he also implies
the effects the capitalization of agriculture has on the workers. ${ }^{17}$ Duck's account serves to underscore the differing representations of time provided by the changing work situations and their relation to natural rhythms. While it was the daily cycle that to a lesser extent shaped the thresher's world, a structure defined by the clock was becoming more established. It is in portions of Duck's work that moments of struggle against the increased disciplinary control of the workingman are revealed while making the transition from the diurnal, or taskorientated, experience to that of the clock as measured by an employer. This was not a sudden break with past traditions but a gradual overlaying of temporalities and will be examined in further detail. As Mark M. Smith remarks, in the eighteenth century the 'ascendancy of mechanically defined time over natural time was an on-going process that occurred in degrees, not absolutes. ${ }^{18}$

In examining Stephen Duck's The Thresher's Labour, it is important to also consider Mary Collier's The Woman's Labour: An Epistle to Mr. Stephen Duck; In Answer to his late Poem, called The Thresher's Labour (1739), which was written against the backdrop of eighteenth century gender constraints. It explicitly takes umbrage at Duck's portrayal of female ineffectuality during rural harvest time, his talk of the 'Throng / Of prattling Females' $(160-61)^{19}$ who waste time sitting down on the job and chattering at every opportunity, harking back to Zerubavel's notion of objective time doing away with 'unnecessary activities'. Collier paints a somewhat different picture in her response. She refutes Duck's denunciations and locates her narrator within what Steven E.

[^66]Jones has coined the 'double shift', ${ }^{20}$ that is, in the dual roles of farm servant during the day and of overseer of the domestic labours of the house on return from the field. Collier echoes Duck's complaint of hard days of toil in which working conditions are underscored by the industrial timepiece, but extends the grievance to the different temporal spheres of field and housework, which are both salient and competing aspects of the female labourer's working life.

Collier's poem initially sentimentalizes the passing of time to create a harmonious image of work in the field, as the narrator points out, 'many a Summer's day ${ }^{21}$ was 'spent in throwing, turning, making Hay' (50). However, the ideal becomes difficult to maintain when diurnal cycles are contrasted with the repetitive monotony of agricultural toil: Collier further remarks that female workers are in fact 'slaves' to the repetitive routine of the 'tiresome Labours of the day' (12). Temporality is further foregrounded in the opening passages of the poem when the working practices of the female labourer in the field are questioned:

But ne'er could see, what you have lately found, Our wages paid for sitting on the Ground
[...]
As well as you, we have a time to dine:
I hope that since we freely toil and sweat
To earn our Bread, you'll give us time to eat.
(The Woman's Labour. 51-52 / 56-58)
A male labourer may take respite in the daily opportunities for refreshment so when Collier suggests 'as well as you' she is asserting that such a time should also be available to the woman worker. Collier then touches upon the coming industrialisation of time; her use of 'bread' as a precursor to 'you'll give us time'

[^67]is both real and figurative: 'Bread' as a food source for consumption to continue work and 'Bread' as a monetary incentive that will be paid by the hour. Leisurely pursuits are shown to be antithetical to time management in the working day and while nature remained the explicit temporal reference point in Collier's field, in stating 'we have a time' Collier is alluding to an implicit rigid temporal marker of the clock controlling the time for leisure and by extension her daily tasks.

The experience of the female labourer's time belonging to the employer extends beyond the confines of the field to the domestic interior where, ' $\ldots$ our Work but just begun' (106). Home is not only a place to return to after the toils of the field but also an enclosed economy in which the greater part of the work of women was carried out:

When Night comes on, unto our home we go, [...]
So many things for our attendance call, Had we ten hands, we could employ them all.
Our Children put to bed, with greatest care,
We all things for your coming Home prepare:
You sup, and go to bed without delay, And rest yourselves till the ensuing Day, While we, alas! But little Sleep can have, [...]
Yet without fail, soon as Daylight doth spring, We in the Field again our Work begin (The Woman's Labour, 101, 107-113, 115-116)

Collier's reference to the overabundance of tasks a woman's day entails, 'Had we ten hands, we could employ them all', might suggest 'hands' in the sense of individual human hands or in the sense of employees. However, the underscoring of clock time in Collier's work is extended with this pun to the hands of a clock and the anthromorphism of human hands is used by Collier to juxtapose labour with the employment of a growing division of time for work. The merging of the fieldwork and domestic chores reinforces the constant and
repetitive nature of the tasks as one merges into another before it starts over again. Collier states that, 'daylight' is 'natural' time in contrast to the artificial deadline of the husband's return. However, the labourer's 'double shift' is not just concerned with the chores of her own house. As Collier writes, in the preceding day's return from the field it is the 'mistress' and not the husband she must now serve:

Our Work appointed, we must rise and go, While you on easy beds may lie and sleep, Till Light does thro' your Chamber-windows peep, When to the House we come where we should go, [...] Briskly with Courage we our Work begin. Heaps of fine Linen we before us view, [...] Cambricks and Muslins, which our Ladies wear, Laces and Edgings, costly, fine, and rare, Which must be wash'd with utmost Skill and Care. (The Woman's Labour, 146-149, 156-157, 159-

Though ostensibly removed from temporality of the field there is no respite for the worker, with Collier further expressing that, 'Alas! our labours never know an end' (215). The female labourer is simply supplanting this agricultural time with one of housework in the enclosed capsule of the private residence, or, to put it simply, Collier's poetic discourse on work substitutes one sphere of temporality for another.

Barbara Adam echoes Collier's sentiment in The Woman's Labour that women find 'themselves on call twenty-four hours a day' and that at home 'the time of caring, of household management and maintenance $\ldots$ are not so much time allocated and controlled as time lived'. ${ }^{22}$ In contrast to the agricultural labour this is not time operating to strict economic principles:

[^68]For several hours here we work and slave, Before we can one glimpse of Daylight have, We labour hard before the Morning's past, Because we fear the time runs on too fast.
(The Woman's Labour, 164-167)
Temporality in the private residence of The Woman's Labour involves the interplay of objective and subjective aspects. As John Goodridge remarks, 'for Mary Collier and her washerwomen every day brings a fearful race with the clock ${ }^{23}$ and while these clock 'hours' are the denominator used to measure how the women 'work and slave' in the domestic residence, this notion overlaps with the subjective idea of time. Temporality runs on one constant, the hour, yet in the poem the worker is unable to quantify this to a steady objective passing of time as it elapses 'too fast' for tasks to be raced against or completed.

The poem concludes with a conventional bee metaphor of industrial labour, as the narrator pronounces:

So the industrious Bees do hourly strive To bring their Loads of Honey to the Hive; Their sordid Owners always reap the Gains, And poorly recompense their Toil and Pains. (The Woman's Labour, 244-247)

Collier is using the image of the 'Bee' to place the significance of individual struggles into the life of the hive. Typically bees are the male workers and subservient to the queen, but in this instance she is placing the bee as both the women working in the home for her husband, and the labourer working in the field for the 'Owners'. In the latter she is reconciling the differences she has been alluding to throughout the poem between the male and female workers and, as William J. Christmas further notes, this 'allows for a reading of her labour

[^69]related complaints to include the plight of both sexes' ${ }^{24}$ While the passage describes those who wield authority over the workers as 'sordid Owners' with its specific connotations of property and power, it goes further to state that their labourers are 'poorly recompense[d]' for their toil, implying a basic recognition of the commodification of labour through capitalism and industrialisation. By placing both genders under the umbrella of one temporal reference point, as they 'hourly strive', Collier not only anticipates the importance of work-discipline, but also imputes a class and gender consciousness. After all, the husbands are at odds with their wives in the homestead, and workers at odds with the factory owners and their clocks, and both were increasingly central to the discourse of a changing industrial economy.

The Woman's Labour represents a struggle against the changing nature of gendered time in the field, even going so far as to suggest a parity of hours at the conclusion of her poem. When pronouncing to her male co-workers 'Like you when threshing we a Watch must keep' (234), Collier is participating in play on words. She is indicating her attentiveness to the tasks undertaken, and conversely, by substituting the 'Watch' of sight for the 'Watch' of a mechanical timepiece, she is highlighting her desire for an equal rationing of timed activity. Just as Collier made clear the increasing reliance on clock time in the field she also goes further when invoking the inequality of domestic labour. She writes that at the end of the working day, 'we have hardly ever Time to Dream' (135), which as will be examined in the following chapter, indicates the woman's dual roles are again underscored by the subservience to the 'mistress' of the clock.

[^70]
## Becoming a Clockwork Community

The transition from natural time to the industrial clock was not a notion that began in the eighteenth-century. Lewis Mumford argued that orderly life in western culture as professed by the clock first took shape with the formation of a regular clergy in the monasteries of the sixth and seventh century. In this period the day was the basic unit of monastic time with distinctions made 'between Sundays and holy days, regular working days, and fast days'. However, he goes on to say that 'most characteristic of life was the pervasiveness of a daily rhythm of activity. ${ }^{25}$ The rigid daily temporal patterning of monastic life was the fundamental substance of Western monasticism, with almost all events and activities fixed at particular times of the day and recurring at a twenty four-hour intervals. Within this system The Rule of Saint Benedict was its principal canon and regarded as one of the necessary foundations of a desirable social order. Eviatar Zerubavel argues that this was not only 'a key to understand the structure and meaning of everyday life in the monastery, ${ }^{26}$ but also important in understanding the temporal sensibilities. The Rule of Saint Benedict initially sought to impose an artificial temporality on natural temporal patterns. The rules stated the monks should rise
at the eighth hour of the night, so that their sleep may extend for a moderate space beyond midnight ... let the hour of rising be so arranged that there be a short interval after Matins, in which the brethren may go out for the necessities of nature (Ch. 8).

The Benedictine ethic went further to propose the regulation of the divine office should be one of unvarying routine and this was again stressed with the organisation of manual labour. The 'brethren', as the rules further specified,

[^71]must be occupied at stated hours in manual labor, and again at other hours in sacred reading. To this end we think that the times for each may be determined in the following manner ... the brethren shall start work in the morning and from the first hour until almost the fourth do the tasks that have to be done. From the fourth hour until about the sixth let them apply themselves to reading. After the sixth hour, having left the table, let them rest on their beds in perfect silence (Ch. 48). ${ }^{27}$

The monastic day was regulated by the clock's hours indicating when to rise, wash, come to meals and leave the table, as well as when to work and when to sit in council. Though, as Balbir Singh Butola notes, the timepiece had an important 'liturgical significance ${ }^{28}$ for the monastery. As the daily liturgical activities were established for the recital of prayers at allocated times of the day (i.e the Matins, Lauds, Prime, Terce, Sext, None, Vespers and Compline) the mechanical device fixed the 'canonical hours', as they were anointed, to be practiced over a set period of time. With the clock reinforcing regularity and duration in the monastery, the inhabitants came to be regarded as the first formal 'clockwork Community ${ }^{29}$ in the West, leading Butola to conclude, 'the synchronisation of the activities and hours in the life of the monks was so perfect and rigid that it appeared as God-given, inevitable and unalterable'. ${ }^{30}$

While the wheel and weight driven timepieces regulated the monasteries in place of the sundial that was too limited by daylight and weather, its importance lay, as R. W. Symonds described, in being 'an alarm that gave notice to the clock-keeper to strike the bell at each of the canonical hours. ${ }^{31}$ While the tolling bells functioned as aural markers punctuating the daily cycle within the monastery, the audible signals regulating the hours filtered beyond the closed

[^72]space of the monastery walls. According to Harold A. Innis, 'the spread of monasticism and the use of bells to mark the periods of the day and the place of religious services introduced regularity in the life of the West. ${ }^{32}$ As time became a matter of measure, bells announced the hours even as they continued to mark occasions, and by the mid-fifteenth century it was estimated that more than twodozen towns in Great Britain had installed ringing clocks on their civic and church buildings. ${ }^{33}$ The clock-bell was installed in the church tower mainly to make the time signal audible as far as possible and, as Gerhard Dohrn-van Rossum notes, 'new and large bells allowed the time to seep into places where clocks could not be seen. ${ }^{34}$ The bells tolled the canonical hours so there was now only one time belonging to the community at large. This temporal patterning of the bells not only synchronised the daily lives of the clergy and parishioners alike in their work time, their rest time, and their time of prayer but, more so, as Lewis Mumford shows, it also 'helped to give human enterprise the regular collective beat and rhythm of the machine., ${ }^{35}$

A clock was increasingly an essential component of an orderly community and Alexis McCrossen comments that a 'tower without a clock and bells seem[s] like an unfinished edifice ... like a form without life, a body without soul. ${ }^{36}$ While the later fourteenth century witnessed the rise of the civic clock, epitomised in many ways by Edward III erecting public clocks in royal residences at Windsor (1351), The Isle of Sheppey, the Manor of King's

[^73]Langley, and in London at Westminster (ca. 1366-70), ${ }^{37}$ over the course of the century more of the devices began to appear with increasing frequency in the wealthier monasteries and larger churches around the country. It was by the end of the sixteenth century that the majority of English parishes possessed clocks and bells, and their importance to small towns and villages was shown by local budgets from the first half of the sixteenth century. Alain Corbin indicates that 'it was the diversity of uses that accounts for a community's commitment', but more so, 'it was deemed fitting to spend more on constructing a clock tower than relieving poverty or promoting education, ${ }^{38}$ Cities had the greatest share of churches and, by the eighteenth century, timepieces were considered a necessary appendage to their design. ${ }^{39}$ For example, in fulfilling London's mandate for the erection of fifty new churches at the beginning of the century, the plans submitted by Nicholas Hawksmoor sought to mesh the eighteenth-century modernity of a clock face into a traditional architecture commensurate with the ideals of early Christian precedent. Despite the variety of designs that distinguished one church from the other, a diversity that can be seen in Hawksmoor's drawings (Figure 2.1), all plans were imbued with a unity of intent. They shared the precepts for the equivalence of time telling devices, as Pierre de la Ruffinière Du Prey reveals, 'the emphasis on visibility from afar'. ${ }^{40}$ While each spire designed by Hawksmoor was intended to present a 'distinctive silhouette against the sky, ${ }^{41}$ it was anticipated that with the addition of a clock

[^74]face and bell vestry there would be further reason for attention to be drawn toward the church amongst an increasingly dense network of city structures.

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Figure 2.1. Nicholas Hawksmoor designs. Image from Mohsen Mostafavi, Nicholas Hawksmoor: Seven Churches for London (2013).

The regulation of temporality by the church added to religious imperatives stressing that all time belonged to God. Some clergymen argued that this time was immune to molestation by private industrial interests and, more so, industrial time lacked the legitimacy that local time and all its affiliations with God and nature bestowed. However, with the proliferation of public clocks the propensity to conduct, and measure the worth of, human activities by the calculation of hours and minutes became increasingly widespread. In the early industrial communities, Mark M. Smith notes that to rationalise time, 'merchants used God's time by recruiting newly erected church clocks to co-ordinate city business life and proclaim, to the public at large, the times of markets and the like. ${ }^{42}$ Jacques Le Goff adds that the same process for the rationalisation of time

[^75]'was responsible also for its secularization. ${ }^{\text {'43 }}$ While equally distinct and at particular points contingently similar to Church time, the rationalisation of industrial and mercantile temporality largely replaced the Church as both the arbiter of work and order and the ruling temporal indicator.

From the early eras, where clocks and bells indicating the hours evolved in monasteries and spread through the villages, small towns and urban centres, to the eighteenth century, when local knowledge gradually accumulated about where public clocks could be found and which events were subject to the time they meted out, the transformation of the pattern of time can be understood as a process that began with many small steps in various independent spheres of urban life. Benedictines were not the first to introduce strict daily schedules for carrying socially significant events at specified times of the day, but they were the first in the west to habituate clergy to 'clock time' and make it possible for them to account for their every moment and be regulated by strict timetables. Benedictine rule was subsequently adopted by other members of society living and working within an audible distance of the church, yet it was with the growth of the factory system that the clock imposed an order that had previously only been known in the monastery. Social time was being transformed by what Gerhard Dohrn-van Rossum described as 'proto-capitalists'44 to exploit workers, and the self-same worker, who was once summoned to daily prayer, became part of an industrial routine. He or she was now summoned by the factory bell and had his or her life arranged by the factory clock that increasingly constituted the spatial and symbolic centre of urban life.

[^76]
## Legg, Hogarth and Polwhele: For Whom the Bell Tolls

For some time the various church towers of towns and cities had been ringing for more occasions than merely the signalling of prayer or mass. The ringing of church bells upon someone's death or at a funeral was an established custom, as was the chiming when ecclesiastical or secular dignitaries were in town or, as has been shown in Thomas Gray's Elegy Written in a Country Churchyard, the ringing of curfew indicating when to put out the home fires. ${ }^{45}$ In terms of timekeeping the church and local government came to rely more on bells than clocks with E. P. Thompson declaring that in regard to disseminating the time, 'sound served better than sight'. ${ }^{46}$ It summoned listeners to religious services and punctuated their most solemn moments, but more importantly it sacralised its auditory territory which, as Alain Corbin remarks, 'imparted a rhythm to the ordinary functioning of the community. ${ }^{47}$

The lives of people inhabiting towns and cities in England were becoming increasingly reliant on public clocks for a sense of guidance and Thomas Legg's Low-life: Or, One Half of the World, Knows not how the Other Half Lives (1750) relates this dependence to the twenty-four hours of a June day in London. In a book structured by time ${ }^{48}$ the whole can be read as a guide to the people residing in the metropolis. Carolyn Steedman points out it is within the clock's purview

[^77]that the text details the activities of the urban upper and lower classes going about their business: 'all classes, ranks, and degrees of men and women appear in rapid succession ... in the text there are roughly equal numbers of "low" (servants, bar workers, prostitutes, beggars, common soldiers, mechanics, public house keepers, and so on) as there are "high" (ladies, gentlemen, clergymen, officers, and such). ${ }^{49}$

Within Low-life the rising and falling noise fills the streets of the capital throughout the day. ${ }^{50}$ People hammer on doors and argue in the Lanes and Alleys; Watchmen cry the hour, although as Legg notes they are unreliable public timekeepers: 'they cry Past Four o'Clock at half an Hour after Three, being persuaded that scandalous Pay deserves scandalous Attendence, ${ }^{51}$ and the bells of London ring out marking the commencement of religious ceremonies. ${ }^{52}$ With the 'Bells tolling' at 6:00am:
the streets begin to fill with old Women and Charity Children who attend the Service of the Church ... Poor labouring Men who have been pestered with their Wives Uneasinesses the past Night, instead of taking any Rest, are obliged to get up, put on part of their Cloaths, and go (29).

The aural power and reach of church bells could not be overstated by Legg; the bells calling 'Parishioners to Publick Worship' were heard 'all over London, and its adjacencies' (49), which let God's time and the various civic functions it

[^78]served seep through the city into the ears and the minds of all who lived within its audible range. The overreaching sound of the bell could not have originated from one church though; as Steedman points out, although Legg's text bears 'the mark of someone standing on a street corner', to acquire the nuances of sound in London life the reporter would have had to move between 'Fleet Street and Spitalfields, between Covent Garden, the Inns of Court, and Billingsgate and down to Gravesend, and then to the markets of Leadenhall, Clare, and Newgate, ${ }^{53}$ Hence, Legg concludes his work by listing the multitude of churches within London that the reporter has observed on his travels:

> The whole Body of the Watch of this City and Suburbs, with their Staves and Lanthorns, ready to cry the Hour, Past Twelve o 'Clock. Bell-Ringers, consisting of the Eaton and Colledge and Cumberland Youths, Eastern scholars, and others, crouding round the Doors of the Churches of St. Margaret's, Westminster, St. Martin's and St. Giles's in the Fields; St. Clement's Danes without Temple-Bar; St. Dunstan's and St. Bride's in Fleet-street; St. Andrew's on Holburn-Hill; St. Sepulchre's without Newgate; St. Mary-le Bow, Cheapside, St. Lawrence near Guild-Hall, St. Michael in Cornhill, St. Magnus near London-Bridge; St. Olave's, St. Saviour's, and St. George's in the East, Christ-Church, Spittal-Fields; St. James, Clerkenwell, St. Botolph, Aldgate; St. Botolph, Bishopsgate, St. Leonard, Shoreditch; St. Mary, Newington, St. Mary Magdalen, Bermondsey; St. Mary, Rotherhithe ... that they may have a speedy Admittance into their several Belfries to usher in the twenty-second Day of June.' (102-103)

The extent to which the capital was being placed under a temporal blanket in the century is highlighted through the location of the Churches. While the placement of the buildings was initially designed to spur a religious revival in the century, Legg observed they were increasingly linked to the spread of new rhythms and to the requirement that everything be understood in terms of continuous clock time. Through the glimpses of the urban upper and lower classes, Legg's London was a city drawing society into its centre through a social order communicated by its

[^79]bells. In ringing its hourly pronouncements, the clock, which in the text symbolised the power of the church, was to be heard above the cacophony of noise. As Alain Corbin concludes, 'It was the signals emanating from the bell tower that at the same time reflected and shaped this virtually imperceptible process. ${ }^{54}$

In the opening 'Address to Mr Hogarth' Legg writes that Low-life 'has, in a great Measure, owed its Rise to Several Hints, which I have taken from your admirable Pencil... I say, that this Essay owes its Existence partly to your Works'. ${ }^{55}$ As a precursor to Legg, Hogarth was similarly concerned with the passage of time; clocks, bells and time were an indistinguishable essence of many of his paintings. For example, Chairing the Members (1758) by William Hogarth (Figure 2.2), depicts a victory procession undertaken for new members of parliament; the recently elected Tory candidate is carried aloft in triumph at the head of a procession followed by a brass band and a procession of supporters bearing flags and banners while partaking in fatuous and callous behaviour. The modern conception of the mechanical clock is absent from the painting with the public square being served visibly by a hanging sundial, and audibly by the bell featured on the church-come-town hall that communicates the temporal message to the wider community. The notion of visible time is one that Hogarth underscores in many of his images, but the placement of the bell at the centre of the painting hints at how he regards audible signals as the main source, in this image at least, that regulates the avocations of the crowd.

[^80]

Figure 2.2. A picture by William Hogarth, engraved by William Hogarth and F. Aveline, entitled Chairing the Members, 1758, plate 4, The British Museum, London.

Hogarth's thematic uses of the clock and bell as temporal indicators are also present in the 'noisiest' ${ }^{56}$ of all his etchings, The Enraged Musician (1741)
(Figure 2.3). In the print the musician clamps his hands over his ears to drown out the commotion of the street, with his aggrieved expression underlying the nature of his distress; that is, his musical score with its ordered staves and notes is in direct contrast to the unrehearsed ensemble outside. Hogarth visually described the vast arrays of sound heard over London, as Charles Knight elaborates: 'In this extraordinary gathering together of the most discordant sounds we have a representation which may fairly match the dramatist's description of street noises. ${ }^{, 57} \mathrm{He}$ continues, noting that amidst the shout of vendors, barking of dogs, the ballads of the vocalists, clattering of wagon wheels

[^81]and impromptu concerts from street musicians, 'here we have the milk maid's scream, the mackerel seller's shout, the sweep upon the housetop ... and the church bells to fill up the measure of discord ${ }^{3} .{ }^{58}$ There were eighty-three churches in the three square miles within the walls of London but the scene's conspicuous steeple belongs to the Church of St Martin-in-the-Fields. ${ }^{59}$ Hogarth includes a clock face in the church's design but not a visible bell mechanism, although that is not to say bells or their audible signals are omitted from the scene. The hoisted flag on St. Martin's church steeple suggests an important event where its bells were rung; the 'iron tongues of London's churches', as Sean Shesgreen describes them, would have been tolling at intervals alongside the temporal pronunciations with the bell engaged in a 'perpetuity of ringing.' ${ }^{60}$


Figure 2.3. William Hogarth, The Enraged Musician (1741), Tate Gallery, London.

[^82]Hogarth pictures London as a pandemonium of noise where not only is the 'Musician' vying with the world outside his window but the clock is striving to be heard in what Shesgreen further describes as 'all-out war'. ${ }^{61}$ Beyond the internecine conflicts the print depicts a myriad of encounters that can be better understood in their individual relationships. The most explicit clash occurs outside the open window where a class war is being waged between two proponents of the discord, between the 'high' violinist come from overseas ${ }^{62}$ to amuse the aristocracy and the 'lowly' horn player in front of him playing street music for the marketers. The 'musician' is similarly engaged in more implicit encounters although these are less defined by the visual correlatives of power. As previously mentioned, the emanating sound of the church bells signal the time and by covering his ears the musician does not only regard public time as a disturbance, but is also attempting to reject its pronouncement to the market of low-lifes that bustles outside his window.

The transition from natural time to a more oppressive time of the factory clock is shown through Legg and Hogarth's use of the bell, and it is also with the chiming of bells or striking clocks that bells emerge as a potent symbol for the artist to use for dramatic effect. Take, for example, Joseph Addison's article for The Spectator (1711), in which he writes of the dramatic inventions that are made use of by poets. He notes:

Among the several Artifices which are put in Practice by the Poets to fill the Minds of an Audience with Terror, the first Place is due to Thunder and Lightning, which are often made use of at the Descending of a God, or the Rising of a Ghost, at the Vanishing of a Devil, or at the Death of a Tyrant. I have known a Bell introduced into several Tragedies with good Effect; and have seen the whole Assembly in a very great Alarm all the while it has been ringing. But there is nothing

[^83]which delights and terrifies our English Theatre so much as a Ghost, especially when he appears in a bloody Shirt. A Spectre has very often saved a Play, though he has done nothing but stalked across the Stage, or rose through a Cleft of it, and sunk again without speaking one Word. There may be a proper Season for these several Terrors; and when they only come in as Aids and Assistances to the Poet, they are not only to be excused, but to be applauded. Thus the sounding of the Clock in Venice Preserved, makes the Hearts of the whole Audience quake; and conveys a stronger Terror to the Mind that it is possible for Words to do. ${ }^{63}$

Addison is writing principally about the use of the bell or chime on the theatrical stage and the dramatic impact this 'artifice' entails. As Addison notes, In Thomas Otway's Venice Preserved (1682) the telling of time is introduced in Act II, Sc. III. where Spinosa, upon entering, asks 'Has the clock struck twelve?' ${ }^{64}$ This striking of the hour is counterpointed with the noise of the bell in Act V, Sc. II. where Jaffier comments, 'Hark! The dismal bell ... Tolls out for death!' (113) The effect is applicable to the church chimes depicted in various works, for example, in the second verse of the children's nursery rhyme Oranges and Lemons (c. 1744), when the poet states, 'When will you pay me? / Say the bells of Old Bailey', the tolling reveals the social history underpinning the children's rhyme's seemingly innocuous nature. The 'bells of Old Bailey' refers to the bells of St. Sepulchre Church that stood opposite Newgate prison and through the twelve o'clock chimes the poem marks the impending execution of a prisoner at the nearby gallows. The use of a clock to 'assist' the poet is exemplified in 'The Cottage Girl written on Midsummer-Eve' (1786), taken from Poems, chiefly by gentlemen of Devonshire and Cornwall; In two volumes. Vol. 2 (1792). Among the many subjects featured within the volume, Richard Polwhele uses the clock and eighteenth-century superstitions to underscore this pastoral piece. The poem

[^84]opens describing the English countryside where the 'clouds' ${ }^{\text {' }}$ ' brush the 'purpled vale' (4), and the 'misty stream' (5) runs next to the 'wild wood' (6), all under the onset of the 'fainting light' (8) indicating the passing day. This is before the Cottage Girl moves to the church yard where:

Now to relieve her growing fear, That feels the haunted moment near When ghosts in chains the churchyard walk, She tries to steal the time by talk
But hark! The church clock swings around
With a dead pause each sullen sound
And tells, the midnight hour is come
That wraps the groves in spectred gloom!
('The Cottage Girl', 51-58)
This verse introduces a description of a popular superstition; one that William Hone explains is part of eighteenth-century folklore. He describes how at midnight on Midsummer's-Eve any person sitting on the church porch will, 'see the spirits of the persons of that parish who will die that year, come and knock at the church door, in the order and succession which they will die. ${ }^{.66}$ The sound of the church clock adds to the piquancy of the situation; at once it indicates the approaching time and, by sounding the 'midnight hour', 'Aids' the poet in reinforcing the groves' 'spectred gloom'.

As the decades passed, the clock and the chime drove out and rendered obsolete some of the secular and profane uses of bells. Percival Price notes that during the eighteenth century once private clocks became common inside houses 'the need for dials at the top of the public clock tower diminished. On the other

[^85]hand the need for a bell increased ${ }^{3} .{ }^{67}$ This was because, he reasons, towns and cities operated only when all the timepieces in a community were in agreement. Price continues, 'the striking of the public tower clock became the standard for this, because the sound of its bell went out over a wide area and could be heard even it its dials could not be seen. ${ }^{98}$ The chime imposed a continuous time and bell-ringing clocks were the ideal, quotidian reminder and symbol of high authority. Raymond Murray Schafer states that loud noises evoke fear and respect and were the expression of divine power, and this 'association of noise and power has never really been broken in the human imagination. It descends from God, to the priest, to the industrialist'. ${ }^{69}$ As such, the aural power of church bells allowed them to permeate into the city and consequently the ears and the minds of all who lived there. Writers and artists adopted the sounding of the bell as this represented for a community a 'symbol of cohesion'. ${ }^{70}$ It was an instrument whose sound enabled people to assemble at the appropriate time, and it was the indication of a social order founded on the harmony of collective rhythms that constituted an important aspect of eighteenth-century English identity.

## A Tour Through the Marketplace at Three Times of the Day

When Daniel Defoe visited Liskeard in Cornwall on his Tour thro' the whole Island of Great Britain (1724), he commented on the timepiece built into the turret of the town hall. Defoe describes it as a 'fine clock', but more importantly

[^86]he explains it makes 'a fine Conduit in the marketplace'. ${ }^{71}$ He marks the clock as an integral part of the town and further elaborates on the importance of the device while visiting the cloth market in Leeds. Defoe reports that at seven o'clock trading commences, announcing, 'it would surprise a stranger to see in how few minutes, without hurry or noise, and not the least disorder, the whole market is filled. ${ }^{72} \mathrm{He}$ notes that each clothier waits in the shop to take 'his piece' to the nearest counter in the street where, 'like a regiment drawn up in line' and 'upon the market bell ringing.. in half a quarter of an hour' the market is filled and 'the rows of boards covered' (501). Transactions are completed in 'no time at all', although this was a subjective reckoning as he goes on to explain that by nine o'clock the 'Market Bell rings again, upon which the buyers immediately disappear' (120). Defoe describes that within the given time frame of a two-hour period, the ritual takes place with one end in mind: for participants to meet, complete their transactions and disperse. This adherence to a strict temporality is seen as one of the key components, 'being the most strictly observed' (121). In this sense at least, the market clock is regulatory and its purpose is to conduct market activities. As David Trotter concludes, despite being a precursor to factory discipline and its oppressive tenets, the market clock's function is purely economic, without 'political $\ldots$ or religious meaning.' ${ }^{73}$

Marketplaces overseen by the clock became increasingly common during the century and came to feature not just in the writing of noted authors such as Defoe, but were appearing in paintings and prints that portrayed a town or city's

[^87]labyrinthine spaces. The Four Times of Day (1736) is a satirical quartet of images by William Hogarth in which the periods of morning, noon, evening and night are narratives tied to different social spaces around the city. Morning (Figure 2.4) is linked to the Covent Garden market which, as David Bindman highlights, was framed from a street level perspective and 'organised to convey moral confrontations ${ }^{74}$ in a variety of incidents. The scene is set on the west side of Covent Garden piazza in front of the portico of St Paul's Church, where the clock is showing 6.55 am . Lawrence Wright explains that while the structure is not the dominant feature of the image and is itself partly masked by the coffee house situated in front of its steps, it is suitably placed to obscure the horizon where the sun is rising. He discusses this idea further, saying 'the clock in its tympanum underscores the comic displacement of the natural by the artificial, the hallmark of modern life. This similarly shaped mechanical substitute sits where the sun is supposed to rise, blotting out the dawn to become the true herald of the day'. ${ }^{75}$ The moral ambiguity of the market's purpose at this time of day is evident by the contrasting strangers who occupy the space overlooked by the clock, for just as day is beginning for some inhabitants of the piazza, for others the previous night is coming to an end.

[^88]

Figure 2.4. William Hogarth, Four Times of Day - Morning (1736), The British Museum, London.

On the left of Hogarth's rendering are the goods of the market - carrots, onions and cabbage leaves - while behind these items are two boys on their way to school and an assembling crowd waiting as the market stallholders prepare for the day ahead. To the right are a group of beggars gathered round a fire as two aristocratic rakes behind them fool around with coquettishly dressed market girls, who are described by Sean Shesgreen as 'the hardest workers in Covent Garden'. ${ }^{76}$ This is taking place in front of Covent Garden's infamous coffee house owned by Thomas and Moll King where, as Markman Ellis notes, upon opening at 'one or two o'clock in the morning' was run 'very like a brothel,

[^89]frequented by a remarkable variety of people, from the nobility wearing the "Star and Garter", to footmen and market sellers'. ${ }^{77}$ The continuing revelries from the previous night give a sense that just as the rakes are being seduced by Moll's girls, they are also being seduced from respectable time-discipline. At the centre of the picture a well-dressed woman pauses to survey the scene on her way to church, her posture and stare suggest 'a simultaneous fascination with, and recoil from, the activities taking place in front of her eyes, ${ }^{78}$ while her servant-boy follows behind holding what is presumably a bible. The lady is hurrying to an early church service and is the only one in Hogarth's picture whose intention seems unqualifiedly religious. By composing this image of Covent Garden in the early hours of the morning, Hogarth underlines the clock's agency as he brings together both the 'polite' and 'impolite' worlds of the market, showing the confrontation between time patterns of the industrious middling kind, the low prostitutes and beggars, and high aristocratic libertines. As Christine Riding points out, Covent Garden is 'the elegant square with the celebrated flower and vegetable market during the day, and the haunt of prostitutes, rakes and drunkards at night', but more importantly this is the moment, as she continues, 'when these worlds temporarily coexist. ${ }^{79}$

During this decade Hogarth's picture put Covent Garden on the cultural map and prompted a cluster of responses. In Balthazar Nebot's topographical picture, Covent Garden Market (1737) (Figure 2.5), a very different phase of the London market is presented as a counterpoint to Hogarth's painting. Nebot's painting is a

[^90]panoramic image of the piazza and open-air market in the afternoon and features a variety of people going about their daytime business. At this time the vice and immoralities inherent in Hogarth's rendering are distinctly absent; the left of the composition is dominated by the market stalls with the stall holders engaged in trading a variety of flowers and fresh produce which were brought up the river Thames and offloaded nearby. On the right a pair of prize-fighters trade blows in front of an on-looking crowd, and in the foreground a well-dressed couple taking a walk pause as their child gives money to a beggar. St Paul's Church, along with its clock face on the pediment and bell tower to the southern end of the building, dominates the view, and Nebot positions the structure within the affluent town houses as the characterising architectural feature of the picture. The dominance of the clock and the transition from natural time is further established from its position overlooking a fluted column of the Corinthian order in the middle of the square. The column features a sundial on the pinnacle and this was mentioned in Rev. James Barber's mock-heroic poem, The Various Humours of Covent Garden (1738) as a source of timekeeping:

A well-built marble pyramid does stand, By which spectators know the time o' th' day From beams reflecting of the solar ray. ${ }^{80}$

The clock's placement on the church overshadows the presumably antiquated and now redundant method of timekeeping. Additionally in this rendition at least, the purpose of the clock has been appropriated from governing religious practices to one solely regulating the marketplace's activities.

[^91]

Figure 2.5. Balthazar Nebot, Covent Garden Market (1737), Tate Gallery, London.
As Hogarth and Nebot's paintings offered glimpses of the market by the morning and afternoon respectively, a later time was sketched in the 1735 print He and his drunken companions raise a riot in Covent Garden (Figure 2.6). St Paul's church is once again a feature in the background of the square with the time showing on the clock as 7.05 pm . The clock is overlooking the sundial in the centre of the market and the redundancy of the dial is further compounded by its impotency at night. In the print, stallholders have long since packed away their wares to make way for the evening revelry and the relatively genteel nature of the morning and afternoon's trading has been overlaid by disorder. The inscription beneath the clock face echoes the change reading, 'Sic transit gloria mundi sic' or, 'Thus passes the glory of the world' A gang of rakes in tricorn hats now occupy the market with their swords drawn while the watchmen engage them with their staffs. The fighting is no longer for the entertainment of the crowd and is now a scene of nocturnal violence to quell the rakes' rowdy behaviour and signal a shift in ownership of the market square to the nocturnal revellers. Similarly, two working boys replace the two schoolboys of Morning
and the market women are no longer depicted as churchgoers, working girls or visitors but the victims of the drunken assault. This inversion of the market square's official purpose is overseen by the constantly overarching presence of the clock, leading Lawrence Wright to describe the structure as a 'Palladian backdrop to the immorality of modern life. ${ }^{81}$


Figure 2.6. Anonymous, He and his drunken companions raise a riot in Covent Garden (1735), The British Museum, London.

All of these examples suggest a powerful context for the market clock; it orders the times of commerce and overshadows the diurnal rhythms of the day, represented in this instance by the sundial in the centre of the market. This echoes Samuel Johnson's observation on Covent Garden that 'A London morning does not go with the sun. ${ }^{82}$ Defoe outlines the basic functions of the market rhythms in a Tour thro' the whole Island of Great Britain, however his text does not elaborate on the market's functions outside of the early morning

[^92]rituals. This is elaborated on in Morning, Covent Garden Market and He and his drunken companions raise a riot in Covent Garden, which took the evolving timeframe beyond Defoe's description within one location, thereby establishing the clock as an ever present device 'By which spectators know the time o' th' day ${ }^{\prime}{ }^{83}$ Peter Quennell notes that particular emphasis was placed upon the drunken, overdressed and violent denizens of Covent Garden, leading him to describe this control as 'evocative of the spirit of the time' ${ }^{84}$

## Clocking On

Rhythms of life and patterns of work underwent radical and far-reaching changes during the century spanning the industrial revolution. Industrialisation signified the first instance of a breakthrough from an agrarian economy importing manufactured goods to one dominated by industry and machine manufacture. The Industrial Revolution reshaped British identity and, as Jennifer L. Goloboy explains, divided 'labourers from owners and the working class from the middle class ${ }^{85}$ At the heart of the shift was an interrelated succession of technological changes and Lewis Mumford describes the timepiece as a key contributor to this transformation. He notes that as the scale of industrial organisation grew the punctuality and regularity of the mechanical regime tended to increase with it: 'the time-clock enters automatically to regulate the entrance and the exit of the worker ${ }^{,}{ }^{86}$ Discipline for workers was not new and certain tasks had always required the co-ordination of the efforts of many people. In the pre-industrial

[^93]landscape of the seventeenth century there were a number of large workshops in which traditional un-mechanised labour operated with supervision. Yet discipline under such circumstances was not only comparatively loose, the work was also characterised by irregularity. With the introduction of the factory clock it became apparent there was no overseer so demanding as the steady ringing of the timepiece and as David S. Landes contends, in regards to factory discipline, 'It required and eventually created a new breed of worker, broken to the inexorable demands of the clock. ${ }^{87}$

The architecture of factories reflected the new industrial ethos, with buildings at the beginning of the century displaying small clocks on the ridge of the roof, while later in the era bells and clock towers featured prominently. Describing the designs for Matthew Boulton's manufacturing warehouse for metalware, Jenny Uglow calls particular attention to its modern adornments: ‘Boulton decided to build a new warehouse and workshops. Everything was done on a grand scale. The warehouse, which was known as the principal building, was nineteen bays wide, on three floors, with a Palladian front, a clock tower and a carriage drive worthy of a stately home ${ }^{88}$ (Figure 2.7).

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Figure 2.7. Anonymous, Print of Soho Manufactory (1781).
Similarly Barrie Trinder points towards the factory of Josiah Wedgewood, where a 'clock was set in its pediment and it was surmounted by a cupola with a bell in it'. As presumably was the case with Boulton, this was a 'sign of the new discipline he was attempting to create. ${ }^{89}$ Raymond Williams furthers this idea of the visual façade stating that factories were increasing the scale as 'an act of will corresponding to their real and systematic exploitation of others'. ${ }^{90}$ The clock tower, the clock and the bell were chosen for their visual correlation of the outside looking in and for there obscuring of the diurnal rhythms of the day, ' $a$ visible stamp of power, of displayed wealth and command: a social disproportion which was meant to impress and overawe'. This was as Williams concludes, a social declaration of an 'established and commanding class power. ${ }^{91}$ Clocks were not only a characteristic of the exterior décor of factories coaxing employees to work at their given times, but also featured in prominent interior

[^95]positions to further instil the notion of modern practices in the work environment. In Manufacturing of razor in the English Manner (Figure 2.8), the inclusion of the timepiece shows the device to be one of the dominant themes of the factories' economic and social policy. The workers are undertaking their given tasks in the factory production line under the gaze of both the window to the right of the frame that hinted at the diurnal time of day and night, and ran counter to the economic tenets of the factory, and the artificial time of the clock hanging over the factory floor. The clock's position in the centre of the picture underscores its importance to a process that is reliant on economic efficiency, while its size and the way it mirrors the spinning wheel below, which is given a sense of scale by the worker standing on the platform adjacent, provides the sense that work habits have moved on from the irregularity of the pre-industrial era. In Manufacturing of razor in the English Manner at least, the clock is the principal symbol of work discipline, a discipline the factory master attempted to instil into the employees.


Figure 2.8. Anonymous, Manufacturing of razor in the English Manner (1783), Iron Plate Engraving, Deutsches Museum.

The prominence of the clock transformed the nature of the work and made new demands on the working class. Gerhard Dohrn-van Rossum explains that while work time was one of the great themes of social conflict since the beginning of industrialisation, a large part of the struggle 'was over the length of a working day, which under the dictate of the 'economy of time,' had been lengthened in many places when the age of the machine began,. ${ }^{92}$ The time spent toiling increased as the century progressed and as Herman Freudenberger and Gaylord Cummin's study of working habits in the eighteenth century notes, between 1750 and 1800 annual labour input increased from less than 3,000 to more than 4,000 hours per adult male. ${ }^{93}$ With the timepiece and bell regulating hours, older customs could no longer dictate working days. Max Weber maintains that modern capitalism aided by the clock 'succeeded in emancipating itself from its old supporting framework'. ${ }^{94}$ That is, workers who once returned home while it was still light out, now returned in darkness, and employers sought to enforce this fundamental temporal shift with new controls and new penalties.

The framework for these systems is reflected in The Law Book for the Crowley Ironworks (c. 1700), a collation of the regulations listed by Sir Ambrose Crowley governing the administration of his works in Durham. Crowley commanded a workforce of nearly 1,000 and 'pioneered the techniques of shopfloor organisation, discipline and welfare, ${ }^{95}$ that were taken up by industrialists in later generations. Clocks were crucial to the running of Crowley's factory and,

[^96]in its substantial list, the Law Book advises that working time of the factory employees should be supervised from the office of a 'monitor' whose job it is to be 'answerable to the wages' paid. These responsibilities included supervising the working hours, as mentioned in Order Number 103, which states the divisions and length of work required:

To the end that sloath and villainy in one should be detected and the just and diligent rewarded, I have thought meet to create an account of time by a Monitor, and do order and it is hereby ordered and declared from 5 to 8 and from 7 to 10 is fifteen hours, out of which take $11 / 2$ for breakfast, dinner, etc. There will then be thirteen hours and a half neat service, which being multiplied by six is 81 hours, which odde hour is taken off. ${ }^{96}$

To verify this information the Laws decreed the Factory Monitor was to have a special clock featuring a 'minute hand' (93) that was to be the only authoritative timepiece on site. Work regulations issued by various authorities pursued a restrictive policy and one that as a prerogative was abused. Factory owners 'falsified' clocks with the time put forward in the morning and back at night to extend the workday and as E. P. Thompson elaborated, 'though this was known amongst the hands, workers were afraid to speak, and a workman then was afraid to carry a watch'. ${ }^{97}$ Either workers submitted to the prerequisites of the employers and worked the hours prescribed by the owner, or they did not work. Using this device the Monitor was able to record 'all wallers', carpenters', joiners' [and] day labourers' time imployed' (93) to the hour and the minute with the numbers recorded in a ledger for presentation to the accountant at the end of the week. Similar to this clock, the work bell was another tool used to supplement (and further enforce) the time discipline at the factory. The bell

[^97]audibly relayed temporal information to the workers, signalling such tasks as the end of the shift: 'Att bell tolling att 12 all the officers may lock up' (134). While Crowley was largely interested in the production of goods by his works, the Law Book noted his concern with creating an institutional framework for the quantity of production. To extract from the labour as much value as he can with the 'wages he paid' it was reasoned that clocks and the connection between time and the economic goal of efficiency and profit were fundamental to the process within the factory.

The dual concerns of maximising production and preserving discipline were partially resolved by the introduction of the timepiece, with clock time being invoked when owners needed workers to labour most intensively. Considerable efforts were made in the control of working time and this fundamental discipline of the factory and the workers was illustrated in William Wordsworth's The Prelude (1805). Wordsworth's poem sought to understand broadly human nature, and spoke out against the mechanisation of industrial labour and man, stating:

The Guides, the wardens of our faculties, And Stewards of our labour, watchful men And skilful in the usury of time, Sages, who in their prescience would controul
All accidents, and to the very road
Which they have fashion'd would confine us down,
Like engines ... ${ }^{98}$
This is implicitly set against other economies of time that Wordsworth engages with in the poem, for example in Book 1, childhood is framed by natural time when he states 'fair seed time had my soul' (The Prelude, Book 1, 301). The authoritative figures that guide the workforce are here described as 'watchful men', a wordplay that underscores the 'Stewards' as both supervisors of the

[^98]labourers and the monitor of the clock; a device, which the next line further indicates they use with mastery to control production. Wordsworth recognised that controlling time was a significant component of controlling the workforce. The 'Sages' he declared, would have the labourers be nothing more than 'engines' in the industrial process and submit to a rigid factory discipline. For the workers such social change only increased the sense of confinement within their industrial world. David S. Landes, in his study on worker's relation to clocks, states, 'no longer could the spinner turn her wheel and the weaver throw his shuttle at home, free of supervision', instead, 'under the close eye of the overseers ... the factory was a new kind of prison; the clock a new kind of jailer. ${ }^{\text {'99 }}$ Landes' observation echoes Michel Foucault's description of Jeremy Bentham's original model of the Panopticon, specifically the importance of illumination and power over the subjects of the panoptic principles. However, while this model calls for the flooding of space with light to illuminate shadows, Landes shows the same principles of observability that are synonymous with effects of control to be temporal. Instead of the watchtower there is the clock and instead of light there is regularised time.

Industrial time discipline did not remain restricted to the factory as other features of industrial societies conjoined to the new sense of time-consciousness and time-thrift. Many schools prior to the eighteenth century were initially conceived as social institutions for imparting social skills, leading Bernard Mandeville to write in 1723:

Few children make any progress at school, but at the same time are capable of being employed in some business or other, so that every hour

[^99]of those of poor people spent at their books is so much time lost to society. Going to school in comparison to working is idleness, and the longer boys continue in this easy sort of life, the more unfit they'll be when grown up for downright labour, both as to strength and inclination. ${ }^{100}$

Mandeville notes the temporal concern of the modern society while adding that education is regarded as inherently lacking in worth in a commercial society. However, Nigel Thrift's study of schools in the era challenges this notion of wasted time, stating: 'In education many of the new working class elementary schools and Sunday schools were quite explicitly 'abstract machines' aimed, amongst other things, at inculcating the habit of time discipline onto children'. ${ }^{101}$ Eighteenth Century Classroom (1779) (Figure 2.9) is emblematic of this notion that the clock is an important aspect of education. The scene features children of varying ages undertaking a lesson in reading, writing and praying under the watchful eye of the teacher, while the classroom itself features typical symbols of learning, a shelf full of books and chalkboard among other items of note. The clock is prominent on the wall implying that while the children were taught elements of reading and writing, punctuality and obedience to the clock and clock time were also imbedded in the system of education and schooling.

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Figure 2.9. Anonymous, Eighteenth Century Classroom (1779), Unesco World Heritage, Krumlov.

The Law Books of the Crowley Ironworks similarly reveals the factory owner's view of time and its importance in the classroom. Sir Ambrose Crowley points at the 'raising and continual supporting of a stock' of his workmen before citing the 'the teaching of youth' (154) as a matter of great concern. His remark on the nature of the school system in Law Number 97.2 re-iterates the temporal discipline implicit in schooling. In regard to the schoolmaster and schoolchildren, it is stated they are:
to be governed by the following directions: - from the $29^{\text {th }}$ of September to the $25^{\text {th }}$ of March, from 8 in the morning till 12 , and from 1 to 4 in the afternoon; and from the $25^{\text {th }}$ of March till the $29^{\text {th }}$ of September, from 6 till 11, and from 1 to 5 , to be constantly in his school except Sundays and other days appointed by the Church to be kept holy or by proclamation (154-55)

This facet of education was instrumental for the children's development as the clock served to imitate the factory system so that schoolchildren would not have
to learn efficiency lessons in later life. Lawrence Stone elaborates on the school's increasing propensity for training the habits of industry, stating they were used to 'break the labouring classes into those habits of work discipline now necessary for factory production' and also that these institutions served in making workers both more 'tractable and obedient', along with being more punctual in their attendance. He continues, 'putting little children to work at school for very long hours at very dull subjects was seen as a positive virtue, for it made them habituated, not to say naturalized, to labour and fatigue. ${ }^{102}$

The industrialisation of the later eighteenth century and the diminishing use of the diurnal framework of the pre-industrial era were most apparent in the discipline of the factory. Time, time keeping and the control of time came to be seen as the key characteristic of a factory system that, as Paul Blyton explains, was based on 'regularity, synchronization of production and maximization of output. ${ }^{103}$ Factory clocks were imposing from the outside and represented a discernible correlation of power and command that was used increasingly to construct and homogenise the workforce and its processes. Similarly, from the inside their placement on the walls along with the factory bell cajoled, reminded and imposed the new temporality on workers' consciousness. Jennifer Goloboy re-iterates, 'nothing demonstrated the lack of control workers had over the conditions of their labour like the regularly tolling bells of the factory clock. ${ }^{104}$ This in turn called for the restructuring of work habits in other areas of society with ties to the factory. Schools were increasingly expected to inculcate the new

[^101]sense of time and were used to break the labouring classes into those habits of work discipline now necessary for factory production.

## Conclusion

Whether it was a church clock, a factory clock or a market clock, the public timepiece was one of the most salient features of any town or city and, in many instances, its focal point. Through the work of Gray, Duck and Collier the bell was the voice of authority and the means by which temporal announcements were made, giving a greater sense of the imposition of work discipline of the time. Prior to the century the Rhythms of an agrarian society were determined by the length of day and the seasons, with the pace of life quickening in sowing and harvest time and slowing down at other times. Work was traditionally done in accordance with necessity, however a dehumanising machine controlled by the 'master' now superseded the seasonal cycles. With the bell's chimes sounding out over the aerial space and little competition to be heard, the injunctions of authority were hammered home and drove the farm workers through a repeating cycle of hard labour. All the while, ever larger clocks and bells were installed in church towers and in factory towers. During these decades the authority for time shifted from nature to mechanical timekeepers and their owners. Alexis McCrossen remarks that over this period God's time and natural time formed a frequent refrain not abandoned, 'but rather left for Sundays and funeral

Sermons. ${ }^{105}$

[^102]From the early years of the eighteenth century to the beginning of the nineteenth, the country transformed from a predominantly agricultural nation into a burgeoning industrial force. Jenny Uglow notes that during this time 'the universal ferment of chronology that accompanied this shift was as potent as any political revolution, affecting the lives of millions'. ${ }^{106}$ Factory owners sought to impose time and divide the day into equal quantitative units as the managers of the Crowley Ironworks had previously done with relative success, finding clocks and clock time to be both ideal regulatory and disciplinary devices while believing them to be fair and economical. As such an increasing number of workers found themselves employed at jobs that, as Paul Blyton described, 'required them to appear by a set time every morning and work a day whose duration and wage were a function of the clock. ${ }^{107}$

Public clocks were not confined to the industrial setting and with church, market and school clocks increasingly used to regulate and co-ordinate personal, social, and economic temporal activity, there was a notion that the timepiece was a means of expressing concepts of social order and maintaining orderly groups. In Legg, Nebot and Hogarth, public clocks were the social tools used to coordinate social action in public spaces, more specifically, they were the devices that linked the announcement of the hours with control of the everyday time of urban masses. As Alexis McCrossen explains, 'it was largely civic and commercial clocks that made time a material reality. Church and school clocks did their part too, particularly because their bells reached beyond their congregation and classrooms. Aurally and visually these timekeepers presented

[^103]clock time as impartial, as transcendent, and accessible to all. ${ }^{108}$ In overlaying older perceptions of time, standardising usages and surreptitiously integrating communities into a sphere of all-embracing norms, public clocks engendered a sense of the common and equitable ownership of time. However, as Alain Corbin concludes, 'this obscured the fact that time was a contested resource over which some people had more control than others., ${ }^{109}$

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## CHAPTER 3

## The Domestic Clock

The level of interest in eighteenth-century domestic interiors reflected the centrality of the British home to wider debates about gender roles and social and moral values. The material culture of the home choreographed the interaction between people, objects and spaces, providing clues to particular forms of behaviour. In this chapter, I will argue that the clock is a vital component of the eighteenth-century residence, and in the mundane and everyday practices of domestic life, it was used as a governing force to conduct, cajole and communicate with, and between, the home's inhabitants. In this chapter through readings of works by Samuel Richardson, Elizabeth Inchbald, and Robert Dodsley I focus on how the clock is connected to the appropriation of power. I will highlight how the clock functions in two ways: either to introduce proper notions of hierarchical authority in the domestic environment, as in the case of Richardson's Pamela (1740) and Dodsley's The Footman (1732), or to re-assert authority that was undermined by active resistance, as is the case in Inchbald's $A$ Simple Story (1791).

To explore these ideas I will use Barbara Adam and Michel Foucault's critical representations of power structures to underscore the complexity of the clock's place in the eighteenth-century home. Barbara Adam explores the notion of clock time as creating a fabric of normative structures while recognising in the timepiece the endeavour to impose a cultural will on time. Exploring the structures that are formed within the house's framework provides a foundation on which to build an account of the clock as implicit in the narrative of power. Similarly, Foucault's writing on the effects of power is well-documented and his argument that power is not just wielded by the ruling elite through acts of
coercion, rather that it is an invisible persuasive discourse that lies in objects, will be applied to the study of clocks in eighteenth century works.

These domestic relationships will primarily focus on the middling and upper class home. Wealthier members of English society were invariably better positioned to both purchase and display this modern device, while the lack of disposable income in the lower classes necessitated the use of older forms of temporal measurement or public timepieces.

## Winding the Clock

Throughout the eighteenth century no novel embodied English society's changing relationship with temporality more memorably than Laurence Sterne's The Life and Opinions of Tristram Shandy, Gentleman (1759-67). Sterne rejected the idea of life as an ordered progression of behaviour in favour of a 'transverse zigzaggery ${ }^{1}$ of digressions, deviations and interruptions. While Tristram figures as a vehicle for the ambiguous relationship of time and consciousness, this view has been set in motion when Mrs. Shandy asked the famous and unfortunate question in the midst of conjugal ministration as to whether her husband had remembered to perform his other duties: 'Pray, my dear...have you not forgot to wind up the clock?' (5) Much has been written detailing this temporally infused moment that locates the mechanism on the 'back-stairs head' (8). In Laurence Sterne: From Tristram to Yorick, Henri Fluchere argues that the ordering of life was too complicated an activity to be conveyed adequately by a regular succession of time, while A. A. Mendilow writes about the ineffectual nature of

[^105]the unwound device: 'The external, objective, unvarying duration as measured by the pendulum has little place in the novel, except as presenting a contrast to psychological duration, for it has in itself no validity in the sphere of feeling and thinking. ${ }^{2}$ Both Fluchere and Mendilow are offering a well-trodden and largely substantiated argument for Tristram Shandy, echoing John Locke's idiom: the experience of duration from subjective measures supersedes the clock-derived increments of objective time.

However, Theodore Baird counters that behind the seeming disunity of chronological succession there is a carefully implemented temporal schema. His work charts the historical markers in the novel in order to map a calendric succession of dates, but if we use this as a foundation and take the notion further a tighter succession of daily activities is apparent; Trim notes that a fly tormented uncle Toby 'cruelly all dinner time' (91) while Walter takes 'his nap after dinner' (162). Similarly her Ladyship 'will discourse about it after supper' (517) and the corporal adds that the young Beguine 'made me a thin bason of gruel for my supper' (461). In referring to the 'family concernments' (8) of naps, dinners and supper Sterne is showing how clocks constitute a common grammar against which people plot their lives. This will not be explicitly seen during the novel as the clock will never be wound; from its position on the stair head the distance is insurmountable in the time (or space) given. Tristram states: 'Is it not a shame to make two chapters of what passed in going down one pair of stairs? For we are got no farther yet than to the first landing, and then there are fifteen more steps down to the bottom... there may be as many chapters as steps' (225). We can presume the clock would continue to be ineffective both in terms of narrative

[^106]procedure and its pervading influence over Shandy Hall, but if we now look at two pictorial representations, William Hogarth's Frontispiece to Tristram Shandy: Shandy Baptism (1759-61) (Figure 3.1) and The Battle of the Cataplasm (1773) engraving by Henry Bunbury (Figure 3.2), a clearer temporal structure for the timepiece can be gleaned.

Hogarth's Frontispiece takes its cue from the infamous baptism in Chapter 2; Mr. Yorick is holding baby Tristram, Walter is standing opposite, while Susannah is looking on at the proceeding event. Hogarth has placed a few markers from the novel in the scene, the window of Tristram's unfortunate accident is alluded to by its proximity to Susannah, and more importantly the 'large house-clock' (8), is shoehorned in a dark corner of the room. The relocation of the clock to the parlour and its proximity to both Walter and Tristram serve as an ever-present reminder of the disruption of Tristram's conception, although what is of additional consequence is the clock face, or lack thereof. Hogarth's clock echoes Walter's protestation that 'we are so used to minutes, hours, weeks, and months----and of clocks (I wish there was not a clock in the kingdom) to measure out their several portions to us' (151). If, as Gavin Lucas argues, 'the persistent presence of the clock face must have created a very different attitude to the regularization of time ${ }^{3}$ then, by rendering the clock as an ornament while rejecting it as a device for measuring, he is expressing Walter's loathing of the very concept of time ownership. That is, if the clock face were present then Walter would be obliged to regulate the habitual behaviour of Shandy Hall according to objective references.

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Figure 3.1. A picture by William Hogarth, engraved by Thomas Cook, entitled Frontispiece to Tristram Shandy: Shandy Baptism, (1759-1761).

In Bunbury's composition the focus is again on the characters, with Dr. Slop getting ready to throw cataplasm at Susannah who stands behind the cradle in which the infant Tristram lies. As in Hogarth's picture, the clock is relocated in the room and is prominently positioned to constitute as much of a character in the unfolding drama as the figures positioned in front of it. This time, though, far from being a trivial faceless ornament, the composition has a visible reference (reading six o'clock presumably in the afternoon). The clock is once again in Tristram's proximity for temporal effect, but his cot adds an additional layer of meaning to the configuration. By adding a clock face, the question of time was firmly associated with issues of measurement and while alluding to Tristram's bedtime; the clock posited an order in domestic spheres of life. This is an order
that had previously been, and still is if the novel is to be followed, subject to less direct forms of regulation.


Figure 3.2. Henry Bunbury, The Battle of the Cataplasm (1773), Lewis Walpole Library, New Haven.

The clock in Tristram Shandy is presented as a counterpoint to subjective modes of time that place their measurements within various objects that have no timekeeping function. For example, Tristram traces temporality in his writing implements: 'every letter I trace tells me with what rapidity Life follows my pen: the days and hours of it' (498). That is not to say the clock is ineffectual. The gaze of the clock was inscribed in domestic space and by introducing the idea of a temporal schema set to a twenty-four hour unifying timetable, which would make the inhabitants 'in truth a slave' (8) to daily activities, Shandy Hall was now bound to a new mechanism of domestic power.

In Behind Closed Doors (2009) Amanda Vickery provides a physical metaphor to portray the homestead, where the windows were the eyes, the door the mouth and the hearth the breast or womb. ${ }^{4}$ If we were to continue this metaphor to its conclusion the clock would be likened to the home's beating heart, a tool that rationalizes and orders the behaviour of families and without which the regulatory functions would cease. Barbara Adam supports this notion in her work on the effects of time in social analysis where she recognises that just as the clock is the human endeavour to impose a cultural will on time, the possession of a clock was the endeavour of the family to impose a temporal will and measure of control on the household. By placing a clock within the house, socially imposed markers that structure the everyday are quantified, organising communal life to the clock's rhythms.

The clock, therefore, provides a structural base or parameter for the quantitative time that underpins the routine of the domestic house. As Adam further suggests, this visible circadian cycle constitutes a temporal 'framework' around each house within which activities are not only 'organized and planned, but also timed and synchronized' ${ }^{5}$ The routine aspects of daily life such as getting up, having breakfast, cooking dinner, entertaining, and going to bed, for example, can be co-ordinated by the clock, weaving into one framework a temporal fabric of interdependent activities. While the existence of clock time facilitated a sense of standardisation of activity in a given household, the clock's authority also bound inhabitants to a temporal rhythm within the confines of the house. If we apply Adam's theory to the eighteenth-century residence, masters,

[^108]mistresses and children, along with servants, footmen and chambermaids share the unitary framework of time associated with the clock. Yet each have their own individual temporal logic or schedule which was not necessarily compatible with the logic of any of the others. Layer upon layer of such schedules form the structure of the eighteenth-century household as governed by the clock-imposed framework. If we focus on the way the clock is employed in everyday eighteenth-century domestic life, we see not only that it provided the boundary within which domestic life is enacted, it provided information on the breadth and diversity of time shared by people inhabiting the same domestic space. ${ }^{6}$

By exploring how independent structures are formed within the framework of the house, or how domestic life is organised, timed, split and structured, we can look at who has the power to impose the temporal structures and whom they will be imposed upon. By doing so, the clock becomes fundamentally embedded in an understanding of both the normative structures and the interactions of domestic social life, along with the hierarchical relations of power. To that extent control over the clock would make it implicit in the narrative of power; in other words, if power and control are the irreducible aspects of the clock, clock time can be viewed as implicit in defining and reinforcing social identities and boundaries between gender, generation and class.

To better understand this proposition and the function of the clock in the structure of eighteenth-century domestic life, it would be wise to consider Michel Foucault's unified theory and the broader insight the relations between the growing discipline of systemic social practices and the bodies it affected would reveal. Foucault argued that power is not just wielded by ruling elites through

[^109]acts of coercion; it is neither given, nor exchanged, nor recovered, but rather exercised ${ }^{7}$ by an invisible 'disciplinary power' or system of control that no longer required force to make people behave in particular ways. Furthermore, he regarded the eighteenth century as inventing this 'synaptic regime of power, a regime of its exercise within the social body, rather than above it. ${ }^{8}$ Therefore his adage, 'power is everywhere', ${ }^{9}$ suggests that the 'procedures of power that are at work in [eighteenth century] society are much more numerous, diverse and rich. ${ }^{10}$

He poses a number of questions. If power is exercised, what sort of exercise does it involve? In what does it consist and what are its mechanisms? ${ }^{11}$ In moving away from the 'sovereign' areas of power, Foucault indicated a persuasive discourse that lay in the objects and the patterns of social life they were rooted in and, furthermore, that power is both a routine and socialised phenomenon. That is, he refers to the ways in which 'norms' can be embedded beyond a person's perception causing us to discipline ourselves without any wilful coercion from others. If, as Foucault's study contends, 'the automatic functioning of power ${ }^{12}$ could be observed in eighteenth-century institutions such as prisons or schools, when thinking of where power inserts itself into the actions and attitudes of individuals, one of the mechanisms to be considered is the domestic clock and the spaces overseen by the timepiece. Only then are the

[^110]temporal organisation, synchronisation and regulation aspects of time seen as fundamentally linked to control and power.

If power is understood as a collection of embodied institutional representations, time can be seen to be one of the agents of this power and the clock, as an agent of time, must be considered as a deeply ideological object that both sustains and reproduces an entrenched social organisation of power. What the ownership and use of the clock within the domestic setting imparted was power over the household, for people to do their business according to its temporal instructions, conferring a conditional and contingent power to fashion households to conform to institutional 'norms'. These invariably created and sustained hierarchies that are replicated through the relationships that are temporally established between the clock, domain and their respective inhabitants. Setting tasks against the clock and setting the clock itself could calibrate temporally classified social tasks against mechanised time.

## Clockmakers and the English Household

Prior to the eighteenth century few households were in possession of a clock. If we look at production, Brian Loomes notes that in London toward the end of the seventeenth century registered clockmakers of the burgeoning Clockmaker's Company numbered less than sixty, ${ }^{13}$ while W. T. R. Pryce and T. Alun Davies's study of clockmaker Samuel Roberts notes that in Wales in 1700 only ten clockmakers were plying their trade. ${ }^{14}$ Similarly J. B. Penfold's study of the clockmakers of Cumbria shows that in the same year twelve clockmakers were

[^111]operating in this region. ${ }^{15}$ Clocks were built to order and production was limited on average to one clock per clockmaker per month, in a study of consumer behaviour in the eighteenth century Jan de Vries notes that timepieces were mentioned in less than ten per cent of probate inventories of English properties in 1700. ${ }^{16}$ In a society and time where the majority of employment was taskorientated labour, Pryce and Davies observes that 'there was no obligation to check the time and hours of work. ${ }^{17}$ With little need to follow a rigid temporal scheme, time then, was not given a premium and any cursory chronological needs were taken care of by the striking of Church clocks that were invariably widely heard.

As the century progressed a remarkably rapid increase in clock ownership was diffusing through British society and as E.P. Thompson suggests, the increased demand for the device was bound with the emergence of industrialisation. ${ }^{18}$ The synchronisation of labour led to a temporal awareness among the eighteenthcentury population, while the resulting emergence of a wealthy middle class fostered a desire to emulate the fashion of the gentry. This demand was fuelled by an influx of eminent clockmakers from Europe joining a growing number of English artisans around the country. In 1806, Philipp Andreas Nemnich observed that 'precision time keepers are nowhere better or more perfectly made than in London', ${ }^{19}$ but not all fine clock-makers could 'bare to work there'. ${ }^{20}$ Instead, tiring of life in London and the restrictive practices of the Clockmaker's

[^112]Company, craftsmen spread out to the country to join a burgeoning rural industry.

Kenneth Ullyett has noted that there were considerable gaps in the chronicles of the clock craftsmen, partly through failure to keep records and partly through the change in clock-making from fine craftsmanship to mass production, so exact figures are unfortunately unavailable. He has estimated that in the mid to late eighteenth century the freeman of the Clockmaker's Guild of London numbered in the thousands while, if we consider Cumbria and Wales again as representative models for rural areas, in the Cumbrian region 12 clockmakers were recorded in the 1730s increasing to 30 in 1740, 38 in 1750, 50 in 1760, 54 in 1770 to its peak of 60 in $1780 \cdot{ }^{21}$ In the same period the clock making trade in Wales grew to exceed one hundred and seventy clockmakers ${ }^{22}$ and inventories mentioning clocks increased to thirty four per cent. ${ }^{23}$ In her study of the Beau Monde, Hannah Greig briefly looks at the type of device adorning townhouses of the city and indicates that clocks were an integral part of the competing strategies of distinction that demarcated the metropolitan elite of the capital. Greig notes that upon returning to the capital from summer hiatus in the country, 'new things modish and modern, perhaps a clock, a telescope, or a Chippendale chair, were delivered and unpacked', ${ }^{24}$ further explaining that these items were 'showy, grandiose, and grotesquely expensive' ${ }^{25}$

Certain features came to exemplify this 'modish' device. While there was a time when the passing of hours was marked by a bell, in the eighteenth century

[^113]chimes were no longer considered sufficient and a clock face was no longer seen as incongruous. Gavin Lucas relates this notion of domestic clocks being produced in appreciable quantities to an 'increasing shift from a predominantly aural to visual perception of clocks. ${ }^{, 26}$ While acknowledging that in formal terms no single element essentially defined the clock he quickly asserts that the construction and shape of the dial are among the essential and lasting components. The increase in consumption of clocks mirrored the gradual increase in the size of the dial across all models over the century. Through the proliferation of markings for the various subdivisions, and by knowing the time 'now' with the stress on the hour and minute, the household moved from an awareness of clock time to the ability to read it. More so, the shift related to the greater demand for synchronised labour in the household and it undoubtedly related to the ideology of power.

During the century, there was an epochal shift in a relatively short span of years that supplanted older cultural forms with new temporal technologies. That is not to say longstanding diurnal rhythms were abruptly extinguished. Instead, there was an extended period of co-existence in which natural time was slowly subsumed into the new clock-defined processes. ${ }^{27}$ Varying styles of domestic clocks were for the first time within reach of a large portion of society and grew to be a ubiquitous feature in a great majority of households. The message the clock conveyed through its layered modes of construction and representation helped foster a cultural temperament towards new and more stringent concerns with time. Perhaps more significantly, though, those who owned newly accurate timepieces had the ability for the first time to chart the hours of their own daily

[^114]lives. It allowed the owner to take account of their daily schedules, heightening a pre-existing, although through the early part of the century, somewhat vague, notion of clocks and clock time that affected the resulting social conditions of the century. As we will further examine, during the century a technology of power emerges that introduced a method of regulating behaviours that had previously been subject to less direct forms of control.

## Keeping Time

In the satirical Low-life: or one half of the world, knows not how the other half live (1755), Thomas Legg acknowledges the importance of the clock as an artefact in the eighteenth century. Low-life describes how temporal disciplines coerced and directed human behaviour in the domestic setting to give a portrait of a typical Sunday in London within a carefully scheduled routine. Legg finds that those who reside in the house 'have left no Hour unemployed', ${ }^{28}$ and starts his observations at one to two o'clock in the morning. The family is either 'fast asleep' (11) or engaged in carnal matters. Legg describes Husbands, 'who after an Hour's Conversation in Bed... are willing to end all Disputes with their loving Wives, by performing Family duty' (13) and, from four till five o'clock, 'Young People, lately entered into the Bonds of Matrimony, playing as they lie in Bed, in order to bring on a Good-Morrow' (25). In the morning, household duties are attended to; from five till six o'clock servants are 'heating the Ovens, cleaning down the Windows, kneading of Dough, \&c in order to go to Baking', (27) and from seven till eight o'clock they are 'laying out Linnen, brushing Cloaths, and getting Shoes cleaned for their Master' (36). In the same hour, 'Mothers and

[^115]Nurses of young Children... are hushing and coaxing the Children under their Care to sleep, that they may have Time to clean themselves and their respective Habitations' (37), while apprentices attend the 'cleaning of Shoes, Knives, Forks, \&c' (38). It is only between nine and ten o'clock that the masters of the house rise as Chambermaids go about 'dressing their Ladies' (44), while from twelve till one o'clock 'Common Servants in a great Bustle in their dark dirty Kitchens' (58) prepare dinner.

After dinner is finished, the servants, from two till three o'clock, begin washing up the plates, dishes and cutlery: 'Cleaning out their Kitchens; and doing whatever Act of Housewifery is necessary in the Family' (66), while 'People who have sat smiling on each other all Dinner, and fancy they cannot stay till Evening' (61) are 'fast asleep on Settees or in Easy Chairs, by way of taking a Nap after Dinner' (69). Legg notes that as the evening draws closer, servants are receiving orders from their 'Mistresses (who are just awakening from their Afternoons Naps) to put on the Tea-Kettle, and then begin to shell Peas for Supper' (71), while the masters of the house, from five till six o'clock 'give a fresh Attack to the Liquor' (79). Nursemaids of young infants 'are feeding them, putting on their Night Dresses, and hushing them to sleep, that they may enjoy a peaceable Hour before they go to Bed' (87), while an hour later, from eight till nine o'clock, servants and women 'who are to be up very early to washing and lighting Fires under their Coppers' are 'thinking of going to Bed’ (97).

Legg's work adds to an existing catalogue of designated activities in the polite homestead as allocated by the divisions of time. In The Parkers At Saltram 176989: Everyday Life in an Eighteenth-Century House (1970) Ronald Fletcher
reveals that for the Parkers, breakfast was taken at nine o'clock, continuing that, 'it was a pleasant thing to sit over toast and chocolate' and 'to spend an hour over newspapers, or letters, or papers from Westminster'. ${ }^{29}$ This was before starting leisure activities that occur at 'ten o'clock or ten-thirty', where, 'each member of the party goes off on their own pursuit - hunting, fishing or walking ${ }^{\prime} .^{30}$ Conversely, John Baker's diary records the entertaining activities of the evening, in which he recounts the visit of 'Mr Walter the Exiseman and his wife and daughter: making their call at seven in the evening, they first drank tea and played cards with the housekeeper; and then, after she had retired, they "supt with the servants," taking their departure at about a quarter past eleven. ${ }^{31}$

Legg offers a snapshot of the systematic representation of an increasingly common language offered by the clock. Each task is accorded a unique position within the time grid, and it is within this grid that the master, servants and guests are bound into a common schedule. Furthermore, in every hour Legg is conveying a chronological discourse about distinct cultural practices within a defined spatial and temporal setting, practices that invariably overlap at points but remain exclusive domains for certain cultural groups. The management of the house, the instructions for meals, the entertainment, cleaning and other domestic matters were in the hands of a domestic clock, and all people, rich or poor, male or female, master or servant, had their routines formed by the timepiece and by the rhythms it disclosed.

## Changing Time

[^116]Anne Hughes noted in her journal that she served dinner 'as soon as they came back from morning service, ${ }^{32}$ A subjective timeframe, or at least one that was taken from an external source, often provided the necessary reference for the commencement of a conventional domestic activity. However, as the century progressed and domestic clocks became ever present in the polite interior, the division of hours increasingly determined social customs. Prior to Legg's text, The Four Times of Day: Morning 1739 (Figure 3.3) by Nicolas Lancret focuses on two figures conversing while at breakfast. Shadowed by the maid, the woman sitting on the left is serving tea to her guest, a gentleman who is distracted by the woman's state of undress and her forthcoming nature. The partial dress of the ladies suggests the meal being undertaken, but the clock hanging on the wall behind the sofa, which reads nine o'clock, further compounds this notion.


Figure 3.3. Nicolas Lancret, The Four Times of Day: Morning (1739), The National Gallery, London.

[^117]We have seen the master of the house chooses the time of domestic activities according to his needs and desires, however the overall structure is influenced by the social rituals of the community at large, in which class, fashion and geographical location were important factors. James Boswell recounted the habits of a London mercer who had settled in Durham, mentioning that even though the mercer dined at three o'clock, presumably necessitated by the acclimatisation to country habits, he remarked at 'how little and how poor he would seem to a fashionable man in London who dines between four and five. ${ }^{33}$ This was similarly illustrated in the revised edition of Samuel Richardson's Pamela in which certain alterations were made in later printings to reflect the changing tempo of the century. A. S. Tuberville echoed the sentiment of Boswell's mercer, stating that 'dinner in a fashionable household would not begin until four or five, while supper could take place even after midnight', before continuing that, 'in previous editions Mr. B dined at two and had supper at eight; the later times here reflect changing fashion in the 1750s. ${ }^{34}$ In this way the eighteenth-century clock was used to move conventional domestic activities out of synchronicity with the regular culturally constructed rhythms of society and re-configure them according to explicit instructions of the individual household. The clock therefore connected with, and influenced, the idea of life within a modern interior. By doing so it became a markedly divisive tool, helping to enforce social identities according to hierarchies of class, gender, power, and authority and, as we will see, the most coerced by its effect were the serving class.

[^118]
## Serving Time

If relations of power permeate the time frames within which we organise social life, the clock was, therefore, more than a representation of power; it was a physical structuring device that had the power to individuate people and to direct their activities to a common goal. In clock households hours were regulated to establish and maintain domestic order and efficiency, but there was an underlying assumption that whoever controlled the clock, and therefore the time, had a punitive authority over the domestic space. When prescribing institutional norms in the domestic setting, particularly in the large households where the specialisation of function was carried furthest and the distinctions were most marked, ${ }^{35}$ the clock was under the control of the master or the mistress of the house, and therefore, that power could be exercised over servants, siblings or guests alike. He or she had the power to issue instructions, and the inhabitants in carrying out their wishes, had to abide by the strict clock-stipulated time scheme.

Domestic servants had little control over the time structuring of their lives. In The Domestic Servant Class in Eighteenth Century England (1956) J. Jean Hecht examines the basic contractual nature between master and servant. He points to the mutual contract of service in which the master hires his servant and the servant is required to minister to all the needs of family and guests, to look after the house, but perhaps more importantly, to do the master's business. Moreover, to work within the house and under the domestic timepiece, Hecht reasons, servants were expected to relinquish their own personal time. Specifically, while in service, servants were often required to forfeit their leisure time and cede all

[^119]waking hours to the schedule as delineated by the clock, and the strictest obedience was expected. ${ }^{36}$ This echoes the sentiments of Thomas Broughton in his Serious Advice and Warnings to Servants (1763), where his readers were warned: 'when you hired yourselves you sold all your time to your masters'. ${ }^{37}$ Bridget Hill cites the factory system as one of the reasons for the totality of domestic servitude. She noted that in early industrial society employers saw factory hands as enjoying a dangerous freedom, as the factory workers were no longer completely under their employer's control. At the end of the working day they went home to their own house and families, and more importantly had a clearly defined beginning and end. As Hill further explains, 'the reaction of such employers to their domestic servants was to attempt to re-impose control over them and to regulate their lives in every aspect. ${ }^{38}$ James Townley highlights the perpetual temporal servitude to the clock in his satirical work on the underclass High Life Below Stairs (1775), where he laments, 'What Wretches are ordinary servants that go on in the same vulgar Track ev'ry Day! Eating, working, and sleeping! ${ }^{39}$ By inserting a clock into the field dominated by polite society, a servant's working day was no longer defined by tasks to be done but by hours that had clearly defined and temporal restrictions. The bulk of a servant's life was confined to the household, and the entire servant's time from the moment he was engaged, belonged to the master or mistress of the house, and therefore the clock. Bridget Hill reiterates this by pointing out the extent to which servants were expected to yield their time. She advises that, while some servants may accompany their master or mistresses wherever they went, many 'remained

[^120]invisible, only rarely leaving their households and venturing into the outside world. ${ }^{40}$

Because of their position in the domestic sphere, servants were well situated to convey the social implications and apprehensions of the hierarchy as prescribed by the rhythmic co-ordination of the clock. In Servitude: a Poem written by a Footman (1729) Robert Dodsley depicts not only the role of servants and their behaviour, but acutely conveyed the parameters of the servant and master/clock relationship. He reiterates Broughton's notion by advising, 'theirs is our Time', before continuing, 'active obedience Justly they require'. ${ }^{41}$ An immediate rapport between time and compliance is established and once underway he reflects on the appointed, stringent and rhythmic relationship of the regular hourly denominations of clock time, 'one hour for this, and one for that ordains', before warning of complacency: 'nor lets th' appointed Time slip idly thro his Hands' (19). The tension between master and servant is evident when warning of the immutable concern about failure to complete tasks within the allotted time frame: ‘Tho' full emply'd we never are confus'd', Dodsley wrote, before continuing:

If any unexpected Thing arrives... His best Excuse is-Sir, I had no Time... But trust me, Brothers, this is idle Chat Such lame Excuses won't the Fault attone, Masters expect to have their Business done.
(Servitude, 20)
Dodsley has taken care to highlight that servants are at the unconditional behest of their 'masters', who importantly, 'expect to have their business done' (20). Their business is domestic duties, performed in accordance with a rigid

[^121]adherence to time-specific tasks, and the servant class must not upset the temporal framework of the house.

In Dodsley's later poem, The Footman. An Epistle to my Friend Mr. Wright (1732), he describes how a footman 'spends [my] time' during a working day in London and once again weaves clock time into the fabric of domestic service.

The Footman's day begins by cleaning up from the previous night's entertainments:

To cleaning Glasses, Knives, and Plate, And such-like dirty Work as that
(The Footman, 10-11)
All of the early morning tasks are performed before the Mistress of the house rises markedly later, which he mentions: 'Down comes my Lady's Woman strait'. For the third verse Dodsley steps outside the temporal confines of the household to perform 'services' and gather 'news' before returning in time for dinner. On the declaration of dinnertime being 'nigh' he goes about preparing the table,

> To lay the Cloth I now prepare, With Uniformity and Care; In Order Knives and Forks are laid, With folded Napkins, Salt and Bread The Side-boards glittering too appear, With Plate, and Glass, and China-ware. Then Ale, and Beer, and Wine decanted, And all Things ready which are wanted,

(The Footman, 30-37)
In his writing, the footman marks every task and activity in preparation for one of the important ritual activities of the house and it is here we begin to see distinctions between the upper classes and the servants. While the dining area is being prepared, Dodsley mentions that the mistress is attending to 'some few Ceremonies' in preparation. The different schedules or spheres, as Barbara Adam
defined them previously, were starting to converge under the clock's general framework. Perhaps the most important evidence of clock time's domination is revealed during dinner:

Whilst I behind stand silent waiting.
This is the only pleasant Hour Which I have in the Twenty-four;
With ready Salver in my Hand,
And seem to understand no more
Than just what's call'd for, out to pour;
(The Footman, 43-48)
The temporal register of this verse in The Footman contains a vantage point that produces a significant hierarchical perspective; time is stressed as an inflexible unit and while the convention of dinner is undertaken, the Footman's task is to simply stand and listen for the hour, and to 'pour' with 'salver in hand' when required. We can also surmise a distinct lack of leisure time if the only 'pleasant Hour' in his day is eavesdropping at mealtime and this offers another subtle example of the servant's totality of servitude. While the clock is not overtly mentioned in the poem, it does preside covertly in the background. The characters, forced by the compulsion of clock time, act on the basis of preordained knowledge, but as the Mistress employs time for her own pleasure, the Footman submits to the grinding of hours.

Peter Gaskill notes that in the early part of the eighteenth century, families were 'bound together by the strong link of affection'. ${ }^{42}$ However, as the century progressed newspapers were full of letters from angry, indignant, or sorrowful employers complaining of what had changed in their households. ${ }^{43}$ In searching for the reason why servant-master relationships were reported to no longer

[^122]function, we can look in part to the clock, controlling each task with mechanical precision and strict hourly regulation. As Legg alluded to, this allowed servants to be treated as components, a cog or cogs within the greater machine of the house. Returning to Sterne, Walter Shandy expresses this sentiment when he reflects, 'Our family was certainly a simple machine' before continuing, 'though it was a simple machine it had all the honour and advantages of a complex one' ${ }^{44}$ The disconnection and mechanisation of man is an important focus for Karl Marx in The Poverty of Philosophy (1847) where he asserts that under capitalism workers are 'a mechanical part incorporated into a mechanical system' and that 'time is everything, man is nothing; he is at most the incarnation of time. ${ }^{45}$ The new and hardening line between employer and servant class was clear to see, and with no time for old-fashioned paternalism as will be glimpsed in Samuel Richardson's Pamela, where the subordination of man to the machine and the old paternalistic relationship between master and servants is giving way to a strictly impersonal one. Bridget Hill summarises the nature of this relationship by stating the masters' 'aim was to extract as much work as possible' ${ }^{46}$ Dodsley's poem epitomised the totality of servitude in the new relationship between master and servant, a relationship that was marked by the domestic clock.

## On the One Hand Female Domesticity

Just as men dominated an eighteenth-century polite society that underlined a burgeoning industrial economy, women from the artisanal class became

[^123]increasingly distanced from the workplace, moving into a life of domestic dependency. In The Working Life of Women in the Seventeenth Century (1919) Alice Clark notes that the wives of craftsmen and manufacturers made a significant contribution to the family business since the home and workplace were usually one. However, with production leaving the domestic sphere in the late seventeenth and early eighteenth century, the rapid increase of wealth permitted the wives of prosperous men to withdraw from productive activity and descend into a life of 'graceful indolence'. ${ }^{47}$ This view of the middling classes reflected a desire for order with each gender having an appointed place in the changing social world.

It was widely accepted that eighteenth-century men and women's domestic lives were defined by starkly contrasting and increasingly rigid gender roles, exemplified by an increasing separation or confinement of men and women to distinct spheres.

Implicit in this notion is the evaluation of masculine and feminine roles. In Women in the Eighteenth Century: Constructions of Femininity, Vivien Jones analyses a section of Edmund Burke's Philosophical Enquiry into the Origin of our Ideas of the Sublime and the Beautiful (1757) to highlight cultural assumptions about gender differences. Jones distinguishes the feminine virtues of family and nurture from the more sublime virtues of authority that were associated with masculine qualities. Therefore, as Jones notes, a moral evaluation of inequality is reached whereby the masculine discipline of a husband or father is valued over the feminine wife or mother's indulgence, the 'softer virtues' become 'the subordinate virtues', and the 'complementary' gendered roles give

[^124]way to 'hierarchy'. ${ }^{48}$ This idea is expressed further in The Duties of a Married Female (1740), where Wetenhall Wilkes writes that the expectations of a wife, 'in every degree and state of life, can be no less than love, fidelity, and obedience to all his lawful desires, and prudent counsels; so that, according as she is disposed, in herself, to perform these duties'. ${ }^{49}$

Samuel Richardson's Pamela (1740) raises several issues relevant to gender, obedience and power in regard to the clock and spheres of temporality. Margaret A. Doody notes in her introduction to Samuel Richardson's novel, 'Richardson was always fascinated by the power politics of small groups, especially families, and the gestures which manifest power struggles and emotional tensions. ${ }^{50}$ As in the earlier discussion of Tristram Shandy, this is a discourse that reveals an individual's subjective experience and, as in Sterne's novel, the clock is a pervading presence in the home.

In Pamela the timepiece is mentioned as a peripheral object. During her evening escape attempt, 'the clock struck twelve, just as I got out' ${ }^{51}$ and 'the clock struck nine, when the wicked woman came up again' (223). Pamela's activities can be placed within a common sequence of linear progression. Moreover, within the framework some flexibility is possible and it is not uncommon for the entries to be laced with time references that acknowledge a defined schedule of mandatory routines and procedures: 'I am called to go to bed by Mrs. Jervis; for it is past eleven' (92), 'I did not rise till ten o'clock' (97), 'He ordered dinner to be ready by two' (296). The emphasis on time in Pamela

[^125]reveals more than a detailed schedule of events; rather, the letters and journal disguise a conspicuously arranged passage of hours that contains the struggle central to Richardson's carefully planned construction, the struggle between Mr. B and Pamela that underwrites the power of the male elite and the helplessness of feminine domesticity.

Pamela's writing is one of the tasks that she finds time for, however hurried or snatched it is, but embedded in the activities comprising the wife's duty was a notion that the numbers of idle hours had to be carefully supervised. Mr. B asks a rhetorical question of Pamela: 'you are very good, my dearest girl' he said, 'But how will you bestow your time' (298). To this she replies, 'But do you think, in such a family as yours, a person whom you shall honour with the rank of mistress of it, will not find useful employments for her time' (299). By suggesting a rigid temporality, she is situating the clock as a tool by which feminine virtues are controlled and the hierarchal balance is sustained. Mr. B does in fact draw up rules and regulations and enjoin them on Pamela so as to lay 'down the rules for the family order' (393):
'I shall, in the usual course,' said he, 'and generally, if not hindered by company, like to go to rest by eleven. I ordinarily now rise by six, in summer: you will, perhaps, chuse to lie half an hour after me. 'Then you will have some time you may call your own, till you invite me to breakfast with you: a little after nine. Then again you will have several hours at your disposal, till three o'clock, when I shall like to sit down at table. You will then have several useful hours more to employ yourself in, as you shall best like; and I would generally go to supper by nine (394)

Whether a woman was content in marriage relied in large measure on her ability to resign herself to the traditional roles of matrimonial conventions. That is, once the contractual foundation of marriage is met she is bound by the principle of satisfying her husband's desires. As a maid, Pamela rejected the notion that she
was the property of Mr. B and was encumbered only by the less rigid habitual restraints of her lady, where tasks such as needlework on 'the fine linen of the family' (14) occupied her day. However, upon marriage she is aware that her power is ultimately subject to his authority and that it will in fact be her 'duty to obey my husband' (218). Through the rigid chronological scheme organising the company she will keep and the duties she will perform, Mr. B assumes the right to define Pamela as a wife rather than as a maid. As Margaret A. Doody outlines, Mr. B simply wants love but finds that difficult to acknowledge, as he feels threatened by a woman unless he can control her or mould her into a chaste and passively domestic image of femininity. ${ }^{52}$ In this instance the image suggests, as Thomas Gisborne lamented, she will live a life of subdued and 'trifling employment'. ${ }^{53}$

In Desire and Domestic Fiction Nancy Armstrong argues that while eighteenth-century women might gain superiority over men in moral terms, even the most ambitious women desired nothing more than economic dependency upon the man who valued her for her qualities of mind. Furthermore, Pamela provides a clear example of this moral contradiction as her persecutor undergoes a moral conversion and asks Pamela for her hand in marriage. ${ }^{54}$ Outwardly Pamela resists Mr. B's initial attempt to exercise his control but inwardly she is not free of her social conditioning. It has influenced the way she acts and thinks and she has been conditioned by the gender assumptions of her age, that is, the inevitability that she will consent to marriage and as Mr B. states, 'yield to a

[^126]force you cannot withstand' (63). By doing so Pamela is interwoven with the clock that maintains the powerlessness of the subject of its demands.

## On the Other Hand Domestic Patriarchy

The home was seen as the place where a husband's deepest needs were met and, as John Tosh notes, the house was a man's 'possession or fiefdom'. ${ }^{55}$ His engagement with the domestic space was largely shaped by the management of his duties as husband and the management of his leisure activities that required his authority to be firmly established. According to Karen Harvey this was excised through various routes including the necessary prerequisite of wealth, and the coercive power of love. ${ }^{56}$ But these inherited conceptions of patriarchy in culture and custom were in themselves not enough for the middling household of the modern eighteenth century. At its centre more flexible and capillary models of implementation and control were seen to reinforce men's authority in the family. For example, William Hogarth's Marriage à-la-Mode: 2, The Têtê-àTêtê (1745) and Pierre-Louis Dumesnil's Interior With Card Players (1752) are two pictures that exploit furnishing types and polite activities to emphasise a mismatch between the inhabitants.

In Hogarth's painting, The Têtê-à-Têtê (Figure 3.4), the husband and wife are transposed to a domestic social setting and the objects that surround the wife, the tea set on the table, the cards and book on the floor and the pocket mirror she is holding onto are signifiers of the feminine sphere. On the opposite side of the table the viscount is slumped in a chair and in the same way the objects in his

[^127]vicinity are testament to the varying aspects of his masculinity (or lack thereof). A broken sword lies at his feet indicating his impotence in his marriage that is further implied by his wife's extra marital affair. More importantly, the Rococo style clock hanging on the wall over his head provides the true symbol of his underlying power in the household. Although the viscount and his wife's lassitude are out of sync with the time of day the clock shows, in this instance just after midday, by showing a specified time Hogarth intimates a potentially ordered household. The proximity of the timepiece to the viscount rather than his wife stresses the control of the domestic space, however tentatively held, is his to orchestrate and is therefore a distinctly masculine sphere.


Figure 3.4. William Hogarth, Marriage à-la-Mode: 2, The Têtê-à-Têtê (1745), The National Gallery, London.

In contrast to the dishevelled interior of The Têtê-à-Têtê, the drawing room presented in Interior With Card Players (Figure 3.5) captures the relaxed
ambience of a respectable evening's entertainment. The household is presented as one of refined harmony and balance, the clock on the wall tells us that it is just past six o'clock in the evening and each family member has congregated in the drawing room. The servant stokes the fire; two figures sit on the couch in - we surmise - a flirtatious exchange, and the most prominent figure, the young master, gazes over the female figures engaged in conversation and games. By placing the clock outside the feminine circle the clock mirrors the isolation of the male figure and the juxtaposition between the inner circle of the group playing cards. The watchful gaze of both the clock and young master convey sufficiently the unifying bond of masculine power and timepiece.


Figure 3.5. Pierre-Louis Dumesnil, Interior With Card Players (1752), The Metropolitan Museum of Art, New York.

Both pictures reflect how the conceptions of the clock and temporality have been unwittingly tied up with notions of patriarchal authority and added yet
another layer to an already multi-layered conception of masculinity. Returning to Richardson's Pamela, the timepiece's authority is similarly related to the male subject: Mr. B rose at six, breakfasted at nine, sat for dinner at three before going to supper at nine in the evening. The legitimisation of his dominion over the home ensured his family and guests 'will not grudge me my regularity', so that 'good old-fashioned rules' may be revived. That is, when one considers what time they shall go to dine, 'they will only say, "His dinner-time is over"; and so they'll reserve me for another time"" (394). The clock has been removed from the symbolic positioning of the paintings and planted in the backdrop of the home where Mr . B is granted his power and impetus to order his time and actions for his self-gratification. In doing so he expects fidelity and attachment from his domestics, family and guests, in that they make his interests their own.

Under the operation of domestic power the clock was deputed to ensure that patriarchal order be kept, but that is not to say these instructions were always obeyed. Looking at Elizabeth Inchbald's A Simple Story (1791), Michel Foucault's adage can be recalled, 'if you intervene in too discontinuous manner, you risk allowing politically costly phenomenon of resistance and disobedience to develop in the interstices', or to put it simply, 'where there is power there is resistance, ${ }^{57}$ The book begins with the story of Miss Milner and ends with that of her daughter, Matilda, and the stories are linked by the conflicting relationship with Dorriforth, the husband of one women and the father of the other. For the purposes of the argument I will focus on the troubled relationship between Miss Milner and Dorriforth, which over the course of the novel changes from austere

[^128]guardian to doting lover. During this time she changes her kind disposition while trying to gain affection, replacing it with a growing restiveness.

Much of the criticism addressing Inchbald's novel focuses on her treatment of gender constraints and the power women wielded in her narration of aristocratic life. Jo Alyson Parker, for example, sees the two halves of $A$ Simple Story as indicative of the two levels of power attainable by women, one of active resistance and one of passive submission. She believes that Inchbald struggled with the social expectations of women and therefore both questions and affirms dominant beliefs to reveal their contradictions. ${ }^{58}$ Catherine Craft-Fairchild further contends that there are 'defects in the patriarchal system' that force 'readers to examine the foundations, assumptions, and implications of masculine domination. ${ }^{59}$ This brief synopsis of the critical reception suggests $A$ Simple Story explores the complexities of men and women's relationships and interactions that point to the female characters' powerlessness in a patriarchal society. As will now be considered, while Inchbald deliberates a new more permissive social order that hints at women's parity with men's authority and power, the clock is used to reaffirm social, cultural and sexual codified roles.

Like Pamela before, the characters in A Simple Story are accommodated within a patriarchal system in which obedience is a prerequisite and over whom proprietorship was exercised. However, Inchbald changes Richardson's formula and allows Miss Milner to exercise her female privilege in order to demonstrate how profound the limits to that power really are. As Michelle Massé explains, Dorriforth is presented as 'a representative for the deep structure of patriarchal

[^129]exchange systems ${ }^{60}$ and his domestic sphere of temporality illustrates this dominion over the home. Inchbald establishes the material and social practices of both Dorriforth and the family: 'at half after ten the family... met at supper' (183) and 'servants pass about the house, and the clock had struck six, Miss Woodly went to the breakfast room' (187). Dorriforth and Miss Milner's social contract affirms that in exchange for the love that will let Miss Milner participate in the interpersonal sphere, her passivity of domestic power will be tendered. As Haggerty explains further, Dorriforth's 'love gives her the power to transgress normative boundaries, but it also ensures that certain other limits are securely in place. ${ }^{.61}$

However, as Michael Braddick and John Walter note in their work on the dynamics of early modern societies, 'behavioural conformity does not necessarily signal ideological commitment to the stated order' ${ }^{\text {. }}{ }^{62}$ While Dorriforth has set the normative times of ceremonial affairs by the clock, Miss Milner displays a wilful resolve to disobey them. She rejects his rules to attend, ironically, a midnight masquerade, leaving Dorriforth to lament her disregard for the clock: 'At what time am I to expect her at home? ... she durst not stay all night' (160). It is not until 'day-light' (161) when Miss Milner returns and until this point in the novel she has given ever-vigilant attention to Dorriforth's whims insofar as they are communicated to her via the clock: all ceremonies have been attended 'at the usual hour' (30). This was not unexpected: 'a family without subordination - a house without economy - in a word, a wife without discretion,

[^130]had been perpetually present to (Dorriforth's) mind' (142). Her defiance is an explicit assertion of autonomy against his patriarchal notions and George Haggerty describes the episode as 'merely an attempt to test her independence... in an implicitly homosocial patriarchy' ${ }^{63}$ Just as the novel is about the abjection of the female in a patriarchal culture, it equally explores the deep-rooted masculine structures of power and the perseverance of these structures.

Miss Milner's wayward behaviour had dual repercussions. It removes her from Dorriforth's defined sphere of control and more importantly it also removes him from the normative sphere he has constructed for himself. He is alarmed when his servant offers to stay up and play cards: "I will not leave you till she comes home; and though I am not used to sit up all night-" "All night!" repeated his lordship' (161). To disobey Dorriforth is to disobey the clock and his response to her authorial challenge is further elicited by the marring of time:

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'At what time am I to expect her home?' said he.
'Perhaps not till three in the morning,' answered Mrs. Horton.
'Three! Six, more likely,' cried Sandford.
I can't wait with patience till that time,' answered his lordship with a most anxious sigh.
'You had better go to bed, my lord,' said Mrs. Horton, 'and by sleeping, the time will pass away unperceived.'
'If I could sleep, madam,' returned he (160).
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In the shadow of the clock Inchbald's novel attaches time to the foundations of patriarchal control. The two are inseparable and ultimately resolute with Miss Milner's defiance of the conventions of the house only reinforcing the arbitrary disruption of a larger domestic pattern. Lewis Mumford in Technics and

Civilization (1934) explains that, 'the clock is not merely a means of keeping

[^131]track of the hours, but of synchronising the actions of men ${ }^{64}$ and the ownership of time was non-negotiable.

The domestic authority of men was the linchpin of a system of order in the household and to attack the dignity and deportment of superiors had potentially radical consequences that prompted a stern response. On her return Dorriforth admonishes his fiancée: ‘do not suppose, I mean to upbraid you; I am, moreover, going to release you from any such apprehension for the future' (163). He structures their relationship in a way that does not allow her both love and power and while Miss Milner sobs despairingly in hopes of being forgiven, the threatened order of banishment immediately re-establishes the habit of order itself. He must re-assert the earnest regulation of time-sequences to avoid, as the narrator proclaims, 'the horror of domestic wrangles' (142). Not to act in this case would have deep domestic implications, of which an explicit re-ordering of the underlying power relations of the domestic interior would be likely. The polite eighteenth century could not subsist without due subordination and a hierarchal model of management.

Men accrued authority from their control of clocks and clock-time. Moreover, relations between men and the clock were important to the construction and maintenance of male authority and any attempt to understand eighteenth-century ‘domestic patriarchy’ must first deal with time, which for the domestic interior was largely secular, systematic and habitual and related most obviously to regulation and control. The clock translated the movement of time into a movement ordered by the master's whims and while 'men remained the

[^132]intellectual, moral ... centers of the household, ${ }^{65}$ clocks were a powerful tool of male power and domestic subordination.

## Life Below Deck

As this chapter has been arguing, the eighteenth century was an age where an increasing number of people lived in residences that were instructed by a timepiece. During this period clocks became a decisive element in the social arrangements of people's living area and this control extended beyond the traditional home into other private spaces. While the first chapter examined how the 'Imperial Clock' helped the British Empire expand its dominion across the globe, and while the years of global oceanic exploration fostered designs for improved ship clocks for better longitude fixes, regular life on board the ship was temporally regulated in ways akin to domestic spaces. Individual voyages varied in length, from trips lasting several weeks to voyages that took several months, with extended voyages broken up into journeys between intervening lands. Ships usually kept the general time of the port to which they were moored, but as Peter Earle remarks, once the ship had left port, 'ships at sea were their own wooden worlds' ${ }^{66}$ Paul Glennie adds that during the voyage, 'a completely enclosed temporal bubble came into existence for its duration' ${ }^{67}$ In this respect life on board a ship was much like serving in a household, with life insulated physically and socially from the world of socialised living under the oversight of the public clock.

[^133]Marcus Rediker explains that the organisation of labour on each ship began with the master or captain: 'the master was the commanding officer. He possessed near-absolute authority. His ship was virtually a kingdom on its own' ${ }^{68}$ This 'absolute authority' extended to control over the clock and, under the captain's watch, the setting of time was a decisive element in the social arrangement and organisation of work on the vessel. As Brian Lavery exclaims, 'duties had to be carried out at specific times with those undertaking more intensive tasks, such as pumping, having to be replaced regularly. ${ }^{, 69}$ The clock and timekeeping enveloped the demands of routine in the enclosed world of the ship. Dudley Pope outlines daily life in the royal navy. When in port a typical day began at $6.15 \mathrm{a} . \mathrm{m}$. with the order:
'watch below clean lower deck', followed by 'lower boats, wash round ship's side and coil down ropes', when any dirty marks on the hull were cleared off, 'breakfast' (half an hour from 7.15 a.m.), 'divisions' at 9.30 (when the men paraded under their officers), 'clear decks and up spirits' at 11.30, when the first half of the grog was issued, dinner which listed an hour from noon, 'pump water and serve out' at 2 p.m., clear decks at 4.15 p.m., which marked the end of the working day, supper at 5 p.m. and 'coil up ropes and sweep decks', the last task of the day, the time of which depended on sunset. Down hammocks was usually piped at $8 \mathrm{p} . \mathrm{m}$. followed almost immediately by 'ship's company fire and lights out'. The officers had another two hours use of the purser's candles; the last order of the day, at 10 p.m., was 'gunroom lights out. ${ }^{70}$

Once at sea, though, according to Paul Glennie and Nigel Thrift timekeeping became 'an all-enveloping grid, and time was more intricate, more concentrated, and more complex. ${ }^{71}$ The setting of the clock was the duty of the captain and first officer, and while some sailors owned pocket watches, the master clock

[^134]controlled the allocation of time on board the ship. The allocation of duties was intensified at sea, with the clock being integral to the ship's safe running. A sufficient number of men had to be available on deck at any hour of the day or night and as such the crew adhered to a watch system set by the master of the ship, which was equally divided into two groups with each alternately working 4hour shifts that encompassed a 24 -hour period (Figure 3.6).


Figure 3.6. An example of the arrangement of the naval watch system. Image from Brian Lavery, Nelson's Navy: The Ship, Men and Organisation, 1793-1815 (2013)

Until the later stages of the eighteenth century, both the navigation of a ship and the regulation of time on board were defined by solar position. While the sun provided the ultimate temporal authority, sandglasses and pocket watches ${ }^{72}$ were used as intermediaries for the minutia of time telling, although sandglasses were

[^135]unreliable on an unstable ship. The precision of the watch helped the efficient management of a large body of men, and as Brian Lavery further describes, timekeeping devices that marked the passage of time were supplemented by the ringing of the 'watch bell' at regular intervals. A 4-hour watch was divided into eight equal periods of half an hour and these were indicated by a number of strokes on the ship's bell, ‘five bells meant that two and a half hours of the watch had elapsed, and eight bells meant that the watch was over'. ${ }^{73}$ In an age where most people in England lived in small, clustered communities, the eighteenthcentury sailor inhabited a similar residence bound by the same temporal principles. The watch and the ringing of the bell formed a ship-board time system that proved to be an indispensable instrument of organisation and control, as well as a symbol of authority for the captain who controlled the watch. Seafarers had an allegiance to temporal measurement and, in turn, temporal measurement became deep-rooted in embodied practices, initiating a process whereby labour was carefully co-ordinated and synchronised.

## Conclusion

This chapter has been concerned with demonstrating the value of the close but divisive relationship of the domestic clock to the power structures inherent in eighteenth-century residences. While the domestic clock did not in itself draw great attention to the mention of hours in the works discussed, and this was indicative of how quickly clock time became naturalised in the novelistic realm, its impact was nevertheless profoundly felt. The consumption of the timepiece, the position within the household, even the detailed minutia of the construction

[^136]during the eighteenth century became indistinguishable from the clock's ability to cope with the governance of a multiplicity of activities within the house.

The nature of the timepiece allowed the likes of Richardson, Hogarth and Sterne to nestle a multitude of instructions within the clock that coerced activities according to rank, position and gender. These works came to embrace both the modernity of the clock and the proclivity toward stringent ritual behaviour within the polite elite's domestic residence. Similarly, just as private residences were using clocks and clock time in specific ways, this extended to other isolated and private self-contained communities. Once at sea the ship became a capsule for temporal frames that were delivered from the on-board clock, and as Paul Glennie and Nigel Thrift note, there was a strong awareness of clock time, 'arising from both normal shipboard routine and the shipboard use of clocks and watches. ${ }^{, 74}$ By inserting timepieces into the text authors were participating in, as well as alluding to, not only a redefinition of the social nature of domesticity but also in the construction of identities within the complex pattern of power relations in domestic social order and the domestic experience of the eighteenth century.

[^137]
## CHAPTER 4 <br> The Pocket Watch

Clocks designed to be worn on the body date from the early sixteenth century, yet pocket watches became prominent items amongst the social elite only during the early eighteenth century, and, as the era progressed, were purchased by an ever-wider range of social groups. In the last quarter of the century, David S. Landes estimated that ' 200,000 pocket watches were being produced a year in England', ${ }^{1}$ with Hans-Joachim Voth surmising that there were 'from 1.4 to 3.1 million watches in England at this time, equivalent to one watch for every 1.8-4 adults'. ${ }^{2}$ The increasing prevalence of personal timepieces during the century facilitated the process by which time-telling became personalised and privatised; as Landes argues, the existence of portable timepieces was 'a major stimulus to the individualism which was an ever more salient aspect of Western civilisation. ${ }^{3}$ This was directly reflected in the literature and imagery of the period; just as time-consciousness and time-measurement became predominant cultural concerns, the references to the watch build a picture of how the timepiece changed character as it changed hands.

In the following chapter, the pocket watch will be understood in relation to the cultural environment that increasingly celebrated fashion, social status and selfpresentation. Moreover, it will explore the culture of the criminal economy that grew in conjunction with the ever-changing refinement of sartorial luxury. Although goods considered as luxury items in the eighteenth century varied widely over time and between social groups, the pocket watch was widely

[^138]regarded from its introduction as an item of want and value. In his work, The Circulation of Luxury Goods in Eighteenth-Century Paris: Social Redistribution and an Alternative Currency, Laurence Fontaine mentions the timepiece alongside other objects of note, stating that 'for some people luxury was represented by a pair of stockings or a cheap watch; for others it meant diamonds, curious or even an abundance of those same objects which were held in esteem by the poor. ${ }^{3}$ Louis-Sebastian Mercier goes further to describe the watch as an object of luxury; he was appalled by the spread of luxury in the city: 'has neither bed-sheets, nor towels nor undershirts; but he has a repeater watch'. ${ }^{5}$ In this context, the pocket watch will be presented as an emblem of consumption and commodity culture. As will be examined, they are goods that circulate, change hands, move up and down the social scale, are displayed, exchanged, pawned, stolen and taxed, and take on different meanings in different social contexts. Additionally, such an approach will present an idea of the eighteenth century class struggle by focusing on the power the pocket watch conferred to the wearer, and this includes the appropriation by the poor as it related to the timepiece.

Daniel Defoe's Moll Flanders (1722) will open up this argument as Moll's descent into crime draws upon conventional imagery towards women and the poor, and reinforces social hierarchy through the presentation of dress. However, the pocket watch allows Moll to transcend rank and gender restrictions, and, as will be explored, it is the tool that allows Moll to briefly convey sentiment and family affections before resuming its role it as a material signifier of commodity

[^139]fetishism. In order to situate the works within the wider context, a brief history of the pocket watch will then be provided, looking at the development and early usage of the device and its general application in the eighteenth century.

To better look at the conventions of the pocket watch as it grew over the century, the chapter will be divided into separate, interrelated sub sections. Texts such as John Gay's The Beggar 's Opera (1728), and pictures such as Cruelty in Perfection (1751) and A Rescue or the Tars Triumphant (1768) by William Hogarth and John Collett, respectively, along with examples of prosecutions from the Old Bailey archives, will form the foundation of my discussion of the pocket watch in regard to crime. The advent of the personal timepiece modified the forms of criminal activity, and this was mirrored in the works mentioned, as the watch turned into an item that was explicitly targeted for criminal attention. The chapter will then turn to the pocket watch as a sartorial embellishment and as an important facet of fashion and dress that underlined the external signals of status. To understand the timepiece as a sartorial ornament, this section of the argument will be divided by gender. By looking at fashionable dressing and the pocket watch in regard to the male figure, connections can be drawn with notions of cultural power, both over gender and class divisions, while, for the female wearer the pocket watch was increasingly indicative of sensibility. This will be explored through an analysis of the portraits of Thomas Gainsborough, Mary Meeke's The Sicilian, A novel in four volumes (1798), Francis Nivelon's The Rudiments of Genteel Behaviour (1737) and Carington Bowles' print The Modern Harlot's Progress, or Adventures of Harriet Heedless (1780). The chapter culminates by examining the it-narrative The Adventures of a Watch! (1788) and the caricature The Honest Pickpocket (1797). Both works highlight
how the pocket watch embedded itself in literature and imagery of the century, and in the case of The Honest Pickpocket, how it came to be viewed through a satirical lens.

Thorstein Veblen's The Theory of the Leisure Class (1899) will underpin my analysis, as it argues that people try to gain and signal status through enactments of personal identity. He contends that 'conscious consumption' reorganised the social and symbolic arrangements that had previously existed between economic classes, and, in order for wealth and ownership to be recognised, they had to be transformed into a recognisable symbol and concurrently put on display. Fashion is at the forefront of this process since, as Veblen continues, 'apparel is always in evidence and affords an indication of our pecuniary standing to all observers at the first glance. ${ }^{6}$ Not only is dress the sole form of consumption that permits individuals to enact methods of distinction directly onto the body, but individuals are also able to evaluate and finally produce the co-ordinates of their individual and social identity. Although a seemingly minor aspect of this display the pocket watch is, in the context of the eighteenth century, at the forefront of consumption. The device highlighted the taste of the wearer as well as his or her relationship to society's prevailing aesthetic standards.

## Moll Flanders' Wicked Trade

In Moll Flanders (1722), Daniel Defoe highlights London's criminal economy at work and gives the reader a wry commentary on its associated pitfalls. The story's protagonist, Moll, has to make her way without many of the resources available to much of the population: she is devoid of family, upbringing,

[^140]education, social position and material wealth. In Moll's world, survival is the foremost object of her existence, and her motivations and means of achieving this are primarily economic ones. Dress served as a prism through which men or women were viewed and the pocket watch was an important aspect that served to reinforce social authority. Just as Defoe links Moll's survival with her criminal tendencies, so too is the watch associated with Moll as an item of intrinsic value.

Time in Defoe's novel is initially antithetical to Moll's plight. Her story begins in Newgate prison where, as a newborn infant to a mother 'doing time', ${ }^{7}$ Moll is taken from her care and left in 'bad Hands' (10). She notes, when recalling her early years, that this all occurred 'near the first Hours' (10) of her life. As Moll grows up, her lack of an economically secure position in society is a further opportunity for Defoe to explore the correlation between time and money. Early on, Moll finds work as a servant on a large estate, and, while attending her duties, attracts the attention of the household's elder son. After their initial romantic encounter, he placates Moll with a small sum of money; 'five Guineas' were placed in her hand that Moll then admits to being 'more confounded with ... than I was before with the Love' (22). The affair progresses consistently in these terms and, later, the older brother confirms his 'thousand protestations of his passion for me' with a larger sum, 'almost a Handful of Gold' (23). While Moll initially 'thought of nothing but the fine Words, and the Gold' (23), she then continues, 'I spent whole Hours in looking upon it; I told the Guineas over and over a thousand times a Day' (24). Just as for the elder son, money was displacing love as the operative standard in their relationship, so too has the counting of money become Moll's de-facto measure of time. This

[^141]association of love, money and time is not a matter of accidental juxtaposition. Rather, by making the point that Moll is covetous and temporally aware, Defoe is not only showing just how she becomes so, but also how her mind is being conditioned to work.

When Moll declares, 'I had been trick'd once by that Cheat call'd LOVE, but the Game was over; I was resolv'd now to be Married, or Nothing, and to be well Married, or not at all' (50), she is embarking on a career as a wife which repeatedly privileges prudence and economics over passion. As Amit Yahav observes in his work on durational time in Defoe's novels, Moll's domestic relations are now measured 'mostly in terms of objective, quantifiable, and public benefits'. ${ }^{8}$ Although love as a motivating force for companionship does not disappear completely, she is lured to potential partners primarily by the provision of wealth, the most extended example of which is in Moll's relationship with Jemy, her Lancashire husband. Despite confessing, 'I really lov'd him most tenderly' (123), this union is relatively short-lived as the marriage is terminated when it was discovered that neither had 'the money the other supposed him or her to have'. ${ }^{9}$ After the annulment, Jemy absconds, leaving behind him what little he has of worth to cover Moll's travel expenses back to London; 'ten Guineas, his Gold Watch, and two little Rings' (121). While Moll made use of her dwindling finances to project the illusion of wealth, as she explains, 'I ventur'd that, for all that the People there, or thereabout knew of me, after he had enquir'd, was that I was a Woman of Fortune' (110), Yahav further points to Remy's 'glittering show ... of fine things' (114) for luring Moll.

[^142]The pocket watch must have been 'a useful prop in Jemy's original show' ${ }^{10}$ by which Moll's 'eyes were dazl'd' (114). In Remy's courtship of Moll, the watch did not signify prudence, as the showing of durational time was not its intended purpose. Rather, he uses the social and cultural value attached to the device to both artificially elevate his status as a moneyed individual, a trick that Moll would herself later adopt as a pickpocket, and as a form of recompense in lieu of actual money.

Pocket watches become a staple of Moll's criminal pursuits and serve to underline her transition from professional wife to master pickpocket. Her advancing age prompts the move into a life of crime, and it is at this point where her accomplice, the 'Governess', teaches Moll the so-called 'wicked Trade' (160). The craft she was taught consisted of 'three sorts ... Shop-lifting, stealing of Shop-Books and Pocket-books' and, more importantly, the activity that Moll would excel at, the 'taking off Gold Watches from the Ladies Sides' (159).

Moll's proclivity for stealing watches was such that soon, 'she put me to Practise.' As Moll recounts:
she had shewn me her Art, and I had several times unhook'd a Watch from her own side with great dexterity; at last she show'd me a Prize, and this was a young Lady big with Child who had a charming Watch in the very moment that she jostl'd the Lady, I had hold of the Watch, and holding it the right way, the start she gave drew the Hook out and she never felt it; I made off immediately ... this was my first Adventure in Company; the Watch was indeed a very fine one, and had a great many Trinkets about it, and my Governess allow'd us 20 1. for it (159).

Moll explains this theft, remarking: 'to think of the poor disconsolate Gentlewoman who had lost so much... I cou'd never find in my Heart to make any Restitution' (163) so had now cast off 'all Remorse and Repentance' (163).

This exploitation of the woman's condition foreshadows her pseudo maternal role

[^143]in the theft from the young Lady Betty later in the story, and serves to highlight the changing significance of the device. When Moll pines over the watch left by her absent husband, she uses the timepiece as substitute for her sense of duration. She explains, 'I Sat me down and look'd upon these Things two Hours together', and continues ' I fell into a vehement Fit of crying... and thus I pass'd the Afternoon; till about seven a-Clock' (122). The watch Jemy leaves profoundly moves Moll, but not because she has any economic or practical use for it at the time; it is a sentimental object that functions purely as a symbol of Jemy's esteem. Later, as she embarks on stealing a Gold watch among 'several other things of Value' (163), these feelings for Jemy had dissipated and Moll 'was harden'd now beyond the Power of all Reflection' (163).

Moll's life of crime is by now established and so too is the bounty she is stealing, as she explains:

I was now in good Circumstances indeed, if I could have known my time for leaving off, and my Governess often said I was the richest of the Trade in England, and so I believe I was; for I had 700 1. by me in Money, besides Cloaths, Rings, some Plate, and two gold Watches, and all of them stol'n, for I had innumerable Jobbs (199).

The clustering together of pocket watches among Moll's other valuable possessions is an indicator of the device's worth to her, as both a monetary reward for her crimes and as an aid to mimicking persons in the higher social stratum. For example, when she is caught attempting to rob a goldsmith's shop, the 'alderman' is satisfied of her innocence when he accepts, by a superficial show of elegance, that she has the money to pay for the merchandise:

My Attorney gave me Notice to come to this Meeting in good Cloaths, and with some State, that the Mercer might see I was something more than I seem'd to be that time they had me: Accordingly I came in a new Suit of second Mourning, according to what I had said at the Justices; I set myself out too, as well as a Widows dress in second Mourning would admit; my Governess, also furnish'd me with a good Pearl Neck-lace,
that shut in behind with a Locket of Diamonds, which she had in Pawn; and I had a very good gold Watch by my Side, so that in a Word, I made a very good Figure (197).

This is the first episode in the novel that shows Moll transgressing social boundaries. As Shani D'Cruze points out, 'Moll's ability to dress above her rank and to masquerade as a "gentlewoman" created significant opportunities for fraud and deception. ${ }^{11}$ This is particularly stressed when Moll, preparing for a day of thievery, remarks that, to avoid suspicion, 'we always went very well Dress'd, and I had very good Cloaths on, and a Gold Watch by my Side, as like a Lady as other Folks' (167). More than making a 'good Figure', Moll uses the watch as part of her disguise to blend in with the 'abundance of fine Ladies in the Park' (202). When 'walking in the Mall' (202), this enabled her to interact with 'a little Miss, a young Lady of about 12 or 13 Years old' (202), who was worth a 'great fortune', and, as Moll noticed, 'had a fine gold Watch on' (203). She further reiterates the similarities of dress before explaining the machinations of her craft:

I was very well dress'd, and had my gold Watch, as well as she... when on a sudden we see the Guards come, and the Crowd run to see the King go by to the Parliament-House. The Ladies run all to the Side of the Mall, and I help'd my Lady to stand upon the edge of the Boards on the side of the Mall, that she might be high enough to see; and took the little one and lifted her quite up; during which, I took care to convey the gold Watch so clean away from the Lady Betty, that she never felt it, nor miss'd it (203).

Wearing a gold pocket watch at such a relatively young age perhaps best exemplifies the extravagance of the high classes, and Moll is quick to understand the semiotics of class. Her material aspirations are connected with increasing her status, at least superficially, and the donning of the gold watch immediately

[^144]procures her the respect of the gentlewoman and nobility. As Moll later mentions, 'I found that the very sight of it immediately furnish'd me with very different treatment' (268).

Moll's career as a criminal comes to an end after being caught and convicted of stealing silk. While being held in Newgate prison under a death sentence, Moll wins a reprieve from the gallows, and, like her mother before her, is granted a lesser sentence of transportation to Virginia. This journey initially brings with it encouragement that, despite her misfortune, the lifestyle of the 'gentlewoman' she strived for can be fulfilled. As she recounts, her remaining riches consisted of some 'very valuable things, as particularly two gold watches, some small Pieces of Plate, and some Rings; all stolen Goods; the Plate, Rings and Watches were put up in my Chest with the Money', and it was with this fortune she 'launch'd out into a new World' (244). Soon after the journey has commenced, she acknowledges that the stock she is able to bring is, as 'every one knows an unprofitable Cargoe to be carryed to the Plantations' (244) because money and the like are 'not of much use where all things are bought for Tobacco' (242). Moll is discarding the items that had value in her previous life of crime, as she acknowledges the changed social and cultural value of the watch. On this journey, the timepiece is no longer an item of intrinsic value to her, rather it is now a redundant emblem of a past life.

After arriving at her destination, Moll is reunited with her estranged son Humphrey, who has grown up into 'a handsome comely young Gentleman in flourishing Circumstances' (251). Moll is gifted an income by Humphrey, 'the same dutiful and obligating Creature as ever', and she further explains that he 'treated me now at his own house, paid me my hundred Pound, and sent me
home again loaded with Presents' (266). She reciprocates with the gift of her 'Gold watch', and as Moll remarks, 'I told him, I had nothing of any value to bestow but that, and I desir'd he would now and then kiss it for my sake; I did not indeed tell him that I had stole it from a Gentlewoman's side, at a MeetingHouse in London; that's by the way' (263). Having negligible material or sartorial value in the Americas, the pocket watch is once again returned to its function as a sentimental object, this time for Moll's child rather than from her estranged husband. ${ }^{12}$ The son, though, accepts and reframes the symbol of affection in terms of monetary value, 'the Watch should be a Debt upon him, that he would be paying, as long as I liv'd' (264). As Denis Donoghue states, by gifting Moll with money 'he knows the way to Moll's heart', ${ }^{13}$ and in turn Moll apparently knows the way to his. When she returns to Jemy, her final husband, who has also been transported for his crimes, Moll explains that she no longer has her watch. She waits for him to express his disappointment before, 'pulling out the Deer skin Purse', where she announces, "here my Dear ... is the gold Watch"' (339). Ann Louise Kibbie remarks that, with the help of her son, the earlier emphasis on the uselessness of money in the new world seems to be contradicted, for, in a final act, 'Moll has transformed the watch into money. ${ }^{14}$

As Ellen Pollack describes, Moll Flanders represents the accuracy and workings of 'a culture in which goods are sovereign and social power is a function not exclusively of heritage but also of the ability to acquire capital. ${ }^{15}$

[^145]From the initial affair where Moll makes it clear how avarice and riches become fused, her history is one where mercenary motives supersede emotional, sexual and moral ones. Among the linens, silks and lace that were routinely acquired, the pocket watch is the item that held particular significance for Moll. In the novel, value and ornament are the two most important facets of the watch, and Moll uses both to further her rise out of poverty. She does not distinguish between the pocket watch and money, and, for her, it is primarily an asset to be traded in when the market is right. Similarly, the pocket watch held equal value for sartorial purposes as, similar to her accumulation of wealth, it helped elevate her to the vaunted position of gentlewoman.

## Back in Time

Since the most rudimentary methods of timekeeping were implemented there has been a demand for smaller and more accurate watches that could be carried about the person. The earliest compact timepiece - the portable sundial - was developed in the late Middle Ages, but, as with all forms of the watch, mechanisation supplanted the movement of the sun as the pre-eminent method for telling time. Nuremberg clockmaker Peter Henlein designed the first portable mechanical watch in the sixteenth century, and, among the significant innovations of note, he changed the motive power of the watch from a weight to a spring. Not only did replacing the driving weights with a long ribbon of steel tightly coiled round a central spindle help to maintain the motion of the mechanism, but it also created a more compact motor, which allowed small timekeepers to be readily transported from place to place. ${ }^{16}$ These watches were scarcely distinguished

[^146]from small table clocks, and, when describing their appearance, F. J. Britten notes that they have limited aesthetic appeal: 'the case was a cylindrical box, generally of metal, chased and gilt, usually with a hinged lid on one side to enclose the dial'. This iteration of the device had only an hour hand, as anything more would have been a misleading superfluity. As Britten added, 'the lid was $\ldots$ as a rule, pierced with an aperture over each hour, through which the position of the hand might be seen. ${ }^{17}$

Henlein's instruments were both imprecise and unreliable, and subject to unpredictable motions. Further, the design was crude, heavy and cumbersome, which rendered the device unsuitable for the pocket and, as such, could only be worn around the neck or suspended from a belt or girdle. The mechanism was a niche product, and as Landes describes, was 'meant primarily to impress and impose, not to tell the time. ${ }^{18}$ Contemporary paintings of the era gave this impression, such as in Hans Eworth's portrait of Lord Darnley and his younger brother. (Figure 4.1) The portrait shows the Darnley children standing in a sparsely decorated room, with its emphasis fixed firmly on both of them. However, while Charles Stewart, who at the time of the painting was six years old, is dressed in a gender-neutral gown, the elder Lord Henry Darnley is attired in more ostentatious dress designed to promote his manliness and, by extension, power. Lord Darnley's outfit is constructed of black fabrics and is embellished with traditional symbols of wealth. In keeping with the high fashion of the day, he wears a tight-fitting doublet and pumpkin shaped trunk hose, a gold ring on his little finger, holds a white embroidered handkerchief and gloves, and most

[^147]importantly, has a circular gold-coloured watch on a cord around his neck.


Figure 4.1. Hans Eworth, Henry Stewart, Lord Darnley and his brother Charles Stewart, Earl of Lennox (1563), The Royal Collection Trust, Windsor.

The character of the pocket watch transformed further in the late seventeenth and early eighteenth century, in part with the invention of the hairspring, which made it feasible at this point to show minutes as well as hours. By equalising the back and forth swings of the balance wheel, deviations of time were cut to around five minutes a day, and two hands became standard craft. It was at this point that miniaturisation occurred in the units of time as well as for the vessel that kept it. In his diary, Samuel Pepys attributes his new fascination with the timepiece to its improved reliability:

Lord! to see how much of my old folly and childishnesse hangs upon me still that I cannot forbear carrying my watch in my hand in the coach all this afternoon, and seeing what o'clock it is one hundred times, and am apt to think with myself, how could I be so long without one; though I remember since, I had one and found it a trouble, and
resolved to carry one no more about me while I lived. ${ }^{19}$
Echoing Defoe's Lady Betty, Pepys berates himself for his childish fascination with the watch, as to him the device was still a novelty.

The emulation of royalty and dignitaries' dress in popular society can, in part, be similarly linked to the evolution of the device. For example, while seemingly unrelated, in the late seventeenth century, King Charles II's penchant for waistcoats was largely responsible for introducing and promoting the practice of wearing a portable device in the pocket. In order for the watches to be worn in conjunction with this new fad, they had to shrink in size; the casing soon became round, flattened and the chain that was once used to hang the watch around the neck shortened and used to secure the device to the vest of the wearer. While ladies continued to wear their watches suspended from chatelaines, Britten exclaims 'the convenience of the "fob" to those who carried watches ... was soon apparent, and its adoption speedily became general with men. ${ }^{20}$ At this point, the act of winding the watch up, along with looking at the time, was in itself a theatrical display, one that emphasised the watch as an indicator of class, and the introduction of the fob served to heighten this practice.

The popularity of the pocket watch only increased as the century progressed, and, as persons of all social strata increasingly sought watches, they were produced in ever-larger arrays of form and colour to meet demand. ${ }^{21}$ George Frederick Kunz explains that, despite achieving a greater degree of accuracy,

[^148]watches were now more than ever being designed primarily to excite admiration or wonder. He indicates that, 'not only were painter and sculptor artists in those days, but every handscraftmen sought to give to the soul of his work a befitting body that should gladden the eye and refresh the senses at the same time it was performing its useful part. ${ }^{22}$ Settling in London, the Debaufre family was one such example of pioneering clockmakers who, early in the century, sought to innovate and improve the look of the device rather than its accuracy. Late in the seventeenth century, Peter and Jacob Debaufre, along with Nicolas Fatio de Duillier, were granted a patent for jewel bearing - which is the application of jewels to the pivot holes of watches and clocks - and, in 1704, the firm announced that, for the first time, jewelled pocket watches were to be seen and sold at their shop. As the century progressed, the sartorial qualities of the device became ever more important in its construction, leaving Britten to remark that, as fashion moved away from the plain silver and gold decoration of the previous century, 'so rock crystal and other stones were often converted into cases, which were cut in the form of crosses, stars, shells, and other extraordinary fancies. ${ }^{23}$

Among the many intricacies of display and decoration the timepiece offered, other methods were increasingly used as the century progressed to enhance the watch case and dials. It gradually became common practice to insert a thin pad in the outer case that consisted of circular material adorned with fancy needlework that would have lines of verse emblazoned upon it. Take for example these lines placed in a watch dating 1780 :

Take this token which I give thee, It is one from friendship's shrine, Place it where thou'lt think upon me,

[^149]When it meets those eyes of thine FORGET ME NOT.

The notion of the watch as a token of esteem is keeping with the tradition of the century which, as previously discussed in regard to Defoe, was more an object of sentimental value. From the inception of the mechanical timepiece, there was a demand for smaller clocks that could be carried about the person, although, as Landes states, technology in the early days limited demand 'to princes, courtiers and the richest of the bourgeois. ${ }^{24}$ In the early years, tools and material limited miniaturisation; however, as methods of assembly improved, the way to portability and relative accuracy was opened. Similarly, the development of the watch as ornament or jewel, with primacy given to the container rather than the contents, found its highest expression in watches of the eighteenth century. Once the fashion of wearing watches took hold, artisans vied for convenience and smallness, and, at the turn of the eighteenth century, pocket watches that had been the conspicuous consumption and privilege of an exalted few were now made available to a widening circle. As Landes concludes, for the first time the watch and clock trade of the eighteenth century were 'moving in directions dictated by differences in needs, in taste and ... of these lines of development, the most important in the long run was the pursuit of precision - the effort to build ever more accurate and reliable instruments. ${ }^{25}$

## No Time for Crime

'He that a watch would wear, this he must do, pocket his watch and watch his pocket too'

[^150]As Tom Brown's aphorism indicates, an important aspect of the pocket watch's manifestation in eighteenth century culture was intimately linked to the criminal economy. A number of works were produced in this era that explore crime and society, but it is with John Gay's affinity for street-wise pickpockets in The Beggar's Opera (1728) that the timepiece is positioned as an important and increasingly valuable artefact at the centre of the criminal underworld. Gay's opera tells of vagabonds under the control of Mr Peachum, 'the underworld fence and thief-taker, ${ }^{26}$ and, from the opening scenes, the criminal's preoccupation with the pocket watch is established. The play begins with Peachum 'sitting at a table with a large book of accounts before him' (43), but the accounts being inspected are not those of an honest businessman; rather he is conducting a 'register of the gang.' Peachum marks 'Crook-fingered Jack' as one of the most profitable thieves in his service and, in recounting the goods Jack has stolen, he states: ‘let me see how much the stock owes to his industry; one, two, three, four, five gold watches, and seven silver ones. A mighty clean-handed fellow!' More than in Defoe's Moll Flanders before, the pocket-watch is positioned both as a lucrative source of income for the criminal underclass, and one that, in this instance, becomes the hallmark of an accomplished thief.

A similar scenario transpires in Act I, scene VI, between Mrs Peachum and her servant, Filch. While talking to Mrs Peachum, Filch recounts his futile attempt to steal a gold watch:

I had a fair tug at a charming gold watch. Pox take the tailors for making the fobs so deep and narrow! It stuck by the way, and I was forced to make my escape under a coach. Really, madam, I fear I shall be cut off

[^151]in the flower of my youth, so that every now and then (since I was pumped) I have thoughts of taking up and going to sea (52).

Filch's statement makes clear that pocket watches were increasingly becoming a difficult item for the criminal class to procure, especially to a thief of questionable abilities. Once a viable target had been identified ${ }^{27}$ the watch had to be stolen, and the introduction of the fob inadvertently made the watch more difficult to obtain without being noticed by the victim or onlookers. This did not deter thieves, with Filch asserting that they would 'risk anything for money', even though he fears 'being cut off in the flower of my youth' (55).

The significance of wearing a watch is seen in Act I, Scene VIII, where Peachum further reiterates what is seen as the primary purpose of the device. While discussing Macheath's marriage to his daughter Polly, Peachum orders her to attend to the customers that have just arrived in the front of his shop:

I hear customers in t'other room. Go, talk with'em, Polly; but come to us again as soon as they are gone. But, heark ye, child, if 'tis the gentleman who was here yesterday about the repeating watch; say, you believe you can't get intelligence of it till tomorrow. For I lent it to Suky Straddle, to make a figure with tonight at a tavern in Drury lane (58-59).

The repeating watch chimed the hours and, in this exchange, it becomes evident that rather than find the original owner and return the stolen watch for a reward, as many in Peachum's profession do, he has lent the mechanism to a colleague for a short time. This was presumably to aid his acquaintance's entry into different social circles, and, similar to Defoe and the repeated thievery of the watch in his novel, the timepiece's status was valued more than accuracy. The goods Peachum receives are the fashionable goods he and his family aspire to

[^152]own. Later in the play, his wife mimics the pastimes of society with her planned 'party of quadrille' (I.iv.42-3) and, most tellingly, his daughter Polly aspires, as she states, 'to make the most of myself and of my man too', in the manner of 'fine ladies' (I.vii.1-2). It can be surmised from Peachum's previous notion of the baubles and dress that allow thieves to integrate into high society that his daughter is referring (at least in part) to the wearing of a pocket watch.

Personal timekeepers were regarded as one of the, if not the most, sought after items for thieves to steal in the early part of the eighteenth century, and Gay's The Beggar's Opera serves as a good indicator of the value placed on the mechanism. The watch's size made it relatively easy to appropriate for a person with the right ability, while the materials that make up the mechanism provided the thieves with an adequate source of income, one that most were willing to give their lives for in punishment. Additionally, the donning of a pocket watch served a dual sartorial purpose in Gay's text; it was both an item that had the ability to make someone stand out as a means of displaying their wealth for all to see (also making them a potential mark for robbery) and an item that allowed members of the lower echelons to mingle with their social superiors, a position to which the Peachums readily aspired.

As the century progressed, pocket watches were increasingly being recognised as items of monetary value by owners and thieves alike. For example, the 'will and inventory of Edmund Pilkington, Yeoman, 24 February 1755' shows that Pilkington valued several costly items of household goods, the most valuable items of furniture being a clock and dresser, 'each valued at $£ 410$ s' which were 'outdone by the value of Pilkington's wearing apparel and watch, valued at $£ 5$ '. More so, the pocket watch was providing a source of investment was easily
exchangeable. During a court appearance in February 1734, Mary Beaumont testified that she did not own a watch for its timekeeping capabilities, rather, as she explained when implicating William Collins in the theft of her device: 'if I or my husband should be taken ill, we had nothing else that we could make a little money off ${ }^{28}$ They were items that could easily be exchanged for money, a notion later expressed by John Carl Flugel. He confirms the worth and significance of personal adornments, stating that, among the many motives indicated by a person's apparel, an important feature is having to hand 'wealth in a more readily exchangeable form that may be carried in the shape of an ornament. ${ }^{29}$ Laurence Fontaine further explains this notion; the circulation of the watch is generated by fashion's need to renew itself and by a basic need for money, 'whether it be to help to acquire the latest stylish objects or for some other reason entirely ... jewellery and fashion items circulated as though they were paper money' ${ }^{30}$

In an economy where work and life were precarious, and money was scarce for the working class, people pawned objects continually when money was urgently required. The second-hand market for pocket watches was thriving and pawnshops offered a readily available means of exchange for immediate money, as is seen in the advertising billhead on John Flude's Pawnbroker and

Silversmith (c. 1760) (Figure 4.2). The shop on the trade card has two doors; an open door on the left, which was the public entrance, and a closed door on the right that which intended for the more propertied class of clients. Both had the standard pawnbroker's trademark, three balls with the words 'Money Lent' on

[^153]the frame, and between the two doors were goods indicative of what a pawnshop would accept and deemed worthy of display. These items included a pitcher and candlestick holder, a number of gowns, an apron, and in the display cases a variety of jewellery and watches. ${ }^{31}$


Figure 4.2. Anonymous, $18^{\text {th }}$ century trade card of John Flude, goldsmith, (c. 1760), The British Museum, London.

Pawnshops had little difficulty obtaining new items that would have sold easily once the requisite time for unredeemed pledges had passed and the large portion of watches in the window display testifies to the ease with which they were both obtained and sold. As Gay shows in The Beggar 's Opera with Peachum's shop, this also offered an opportunity for articles to be accepted with few if any questions, which led to many shops specialising in fencing stolen wares.

[^154]The organised thefts of pocket watches were widespread and crime during the century was steadily increasing with one London newspaper remarking, 'So many... robberies happen daily that "tis almost incredible." ${ }^{32}$ Records show the particular penchant for the theft of timepieces, with John Styles indicating that the 'proportion of Old Bailey trials involving stolen watches increased continually from the 1700 s to 1770 s', continuing that by the 1770 s, 'more than a tenth of the cases tried at the Old Bailey involved the theft of a watch. ${ }^{33}$ Reports were numerous, such as Joseph Montisano and William Tavis, who were convicted for theft and burglary. Their statement notes that, 'Joseph Montisano alias Joseph Day, and William Tavis, were both indicted for breaking open the dwelling House of David Martin, in the Parish of St. Bartholomew the Exchange, and taking from thence a Gold striking Watch, ${ }^{34}$ value 35 1. a Gold Chain set with Agat Stones, value 10 1. a Gold Hook 5 1' ${ }^{35}$ Or Elizabeth Clemtree who 'was indicted, for Feloniously Stealing a Watch, with a Silver Box and Case, value 51. the Goods of Nicholas Roberts, on the $10^{\text {th }}$ Day of Septem'. ${ }^{36}$ As the records highlight, Day, Tavis and Clemtree stole the time-telling mechanism, as well as procuring the ancillary trappings, chains, hooks and stones, that make up and add value to the pocket watch. Similarly, criminals who used timekeepers as props in their robbery attempts were appearing in court more frequently than ever before as part of more elaborate confidence schemes. Hannah Greig reasons that this fraud hints at some of the criteria people believed underpinned

[^155]membership of fashionable society, as it 'rested primarily on the successful performance of external signals to status' ${ }^{37}$ One example of this crime was committed in April 1725 by Hestor Gregory upon John Cockerell. Gregory attempted to deceive the victim into relinquishing a sizeable debt using a disguise that helped her appear to be a moneyed individual of the upper class. As the Old Bailey records show:

John Cockerell deposed to this Effect: About the Middle of April last. I went to the House of Mrs. Eccleton in Lombard street, to speak with her Mother Mrs Gregory, (the Elder of the Defendants.) My Business with her was to demand a Debt that was due to me ... she had something to propose to me that might be very much to my Advantage. - Sir, (continued she) are you disposed for Matrimony? Do you want a good Wife with a great Fortune? If you do, I can introduce you to a very agreeable young Lady that is lately come from Barbados. She has a vast plantation there, with a Hundred Negroes upon it: Her Estate is worth 1000 or 1100 1. a Year. She likes England so well, that she's resolved to live here and marry, if she can meet with a Gentleman of a suitable Fortune ... I went accordingly and found her drinking Tea with the two Defendants. She was dress'd in a rich Brocade, with a Gold Watch and Diamond pendants. ${ }^{38}$

In another case, John Stafford English was indicted as he 'falsly did pretend to one James Roe, of London, cooper, that he was then engaged with Captain Rogers, to go on a voyage in the Austrian, East Indiaman, as the Captain's steward; and did then and there, falsly and designedly, ask him to lend him his watch, that he might appear like a gentleman as he used to do ${ }^{39}$ As the century progressed and watch ownership became more achievable for much of the population, it became evident that the timepieces were easy to steal and highly profitable once they were successfully sold.

[^156]
## Crime Watch

The growing threat of watch theft featured prominently not only in literature throughout the era, but in the visual arts as well. Christine Riding indicates in her work on Hogarth that, in the eighteenth century, the public were fearing 'for their persons, their property and their commercial interests, ${ }^{40}$ and that works of visual art 'from the 1720s onwards underline a mounting sense of crisis. ${ }^{41}$ Old Bailey records show that during the eighteenth century female thieves were responsible for roughly one fifth of pocket watch related crimes; ${ }^{42}$ however, as Paula R. Backscheider declares in her work 'The Crime Wave and Moll Flanders', despite this disparity, 'some of them received as much attention ... as notorious male murderers' ${ }^{43}$ Backscheider continues that women have long been associated with specific types of transgressions, namely prostitution and pickpocketing, and it is in eighteenth century imagery that their criminal identities were often identified with the pocket watch.

The watch can symbolise both status and criminality and the most famous fictional eighteenth century thief and prostitute is Mary (Moll) Hackabout from William Hogarth's A Harlot's Progress (1732). In plate one of six (Figure 4.3), Moll has arrived from the countryside to the Cheapside's Bell Inn, modestly attired, and, as indicated by the scissors and pincushion hanging below the purse on her arm, seeking employment as a seamstress or domestic servant. She stands in front of Elizabeth 'Mother' Needham who is inspecting Moll's youth and

[^157]beauty (emphasised by the rose displayed on her bosom), and it is apparent Needham has an alternative career in mind for Moll. The uniform she dons mirrors the style worn by the fashionable metropolitan elite, including a prominently hanging pocket watch which is intended to disguise her immoral motives and help elevate her in the mind of the onlookers, in this case Moll. Needham's watch has an additional purpose that subtly portends Moll's imminent fall, as the timepiece implies Needham's intent for Moll's criminal activity. The device has more than likely been stolen and signifies a desirable item that is to be seized at any available opportunity, and, like Needham's primary use of the device, it is a tool for the further acquisition of objects of value.


Figure 4.3. William Hogarth, A Harlot's Progress, Plate 1 (1732), The British Museum, London.

In Hogarth's third plate of the series (Figure 4.4), Moll has fallen to the position of common prostitute and the precariousness of her position is evident in
the surroundings. The tankard in the bottom right hand corner of the frame indicates that the plainly decorated bedroom is situated around Drury Lane, a notorious area in the capital for thieves and prostitutes to reside in. Moll sits on the bed in a state of undress and holds up a fob watch while a group of bailiffs, led by Justice Gonson, has arrived to procure her arrest. The pocket watch is presumably one of the spoils of Moll's crimes and the intended use in this instance is ambiguous. It can be inferred that she intends to offer the device to Justice Gonson as a bribe to overlook her transgressions. However, with echoes of Mother Needham in the first print, it can also be implied that Moll is offering her pocket watch to the officers as proof of her high social and moral standing. As Jennie Batchelor remarks, notable items such as the pocket watch act as a veil that can easily disguise 'the outward and potentially unreliable expression of inner moral essence. ${ }^{44}$ This kind of contrast between low morals and attractiveness had what Jenny Uglow describes as a 'dark allure', and as Uglow continues, Moll's decline echoes a real-life account by a French traveller who ogled a woman who had stolen a gold watch. She notes, 'in 1725 young Saussure was agog to see a woman in fine linen and lace, committed for stealing a gold watch from her lover. ${ }^{45}$

[^158]

Figure 4.4. William Hogarth, A Harlot's Progress, Plate 3 (1732), The British Museum, London.

A rare example of criminal activity featuring the pocket watch, where the female is portrayed as the victim, rather than the perpetrator of the crime, appears midway through the century in William Hogarth's Cruelty in Perfection (1751), plate 3 from The Four Stages of Cruelty (1751) (Figure 4.5). Hogarth's set of prints depict the actions of Tom Nero who, from a young boy inflicting cruelty on animals in the First Stage of Perfection, meets his ultimate fate of public dissection in the fourth and final etching, The Reward of Cruelty. However, it is in the third engraving, Cruelty in Perfection, that his felonious ways have come to an end and the timepiece functions as both a marker for his criminal tendencies and a symbol that his time is up. Nero is being apprehended by a group of farmers in a country churchyard after committing a series of robberies, including the murder of a woman whom he has left lying prostrate on the floor
with her throat slit. There are multiple timepieces featured in the etching, the larger church clock in the top left corner of the frame being the most prominent, while the smaller pocket watches lie in the foreground among a handful of other stolen goods and personal artefacts. By indicating the time to be one o'clock, the church clock places the scene within a rigid temporal framework, although, as Hogarth hides it within the shadow of darkness, he renders it largely inconsequential to the unfolding narrative. In contrast, the pocket watches are lit by the glow of the two lanterns, which indicates their significance to both Nero's identity and the growing concern of the public. The pocket watches are not included in the picture to re-iterate the time and neither are they viewed as sartorial instruments. Rather, they are emblematic of his stolen goods and the proceeds of Nero's misdemeanours, and, along with the pistol lying nearby, have the effect of confirming Nero as a highwayman and criminal. The glow of the lanterns further serves to highlight the worst of Nero's crimes, watch theft and murder, which both carry a provisional death sentence.


Figure 4.5. A picture by William Hogarth, engraved by J. Bell, entitled Cruelty in Perfection, Plate 3, 1751, The British Museum, London.

Although many visual prints depicted crime, it was not until later in the century that crimes involving pocket watches were explicitly represented. John Collett's two engravings, A Rescue or the Tars Triumphant (1768) and Deceitful Kisses, or the Petty Plunderers (1781) were examples that left no doubt as to who the thief was and what was being stolen. In A Rescue or the Tars Triumphant (Figure 4.6), the incident-filled scene is one of disruption, upheaval and unrest, with the print illustrating a clash between the sailors (identified by the baggy striped trousers) and the night watch. As the title would suggest, the brawl has been triggered by the tars' effort to stop the lady and her retinue from being arrested, and the attention is naturally drawn to the centre and right of the composition where this activity is taking place. The wooden-legged tar is clutching the woman and a sailor is manhandling the constable while his
associate lies de-wigged on the cobblestone street nursing a gash to the head.


Figure 4.6. A picture by John Collett, engraved by Butler Clowes, entitled A Rescue or the Tars Triumphant (1768), The British Museum, London.

Next to him is a Middlesex warrant made out for 'J. Seale', indicating the lady being saved is a wanted criminal and this scene is being played out in front of a baying crowd and gallery of amused spectators looking down from the upperstorey windows of a nearby inn. Protruding from the back pocket of the constable is an instructional pamphlet entitled 'The Compleat Peace Officer', which alludes to his inexperience in the role, intimated both by his inability to serve the warrant, keep the peace, and act on the crimes being committed under his nose. While this action might seem to be the primary focus of the print, Caitlin Blackwell contends, 'there is some room for equivocation when we consider the focal point of the scene' ${ }^{, 46}$ The sightline for much of the crowd is

[^159]directed at the unfolding commotion; however, as is the norm in the eighteenth century, a good share of pickpockets most likely frequents any area where there is a gathering of people. This scene is no different, and to the left of the frame one of the sailors can be seen giving a kiss to a portly older woman, who is feigning an insincere protest. Like the rest of the carnivalesque atmosphere though, it serves only as a distraction while the lady lifts the tar's watch from his pocket. It is possible to interpret $A$ Rescue or the Tars Triumphant as an image that turns unsavoury authority figures into the objects of ridicule, although, as Blackwell continues, 'the exact narrative and intended meaning of $A$ Rescue is somewhat ambiguous'. ${ }^{47}$ The tars are clearly undertaking noble actions against the ignoble deeds of the night watchmen; ${ }^{48}$ however, in Collett's image, this is very much a pyrrhic victory. The title is ironic as it suggests that the 'triumph' comes at the expense of being robbed by the very people they are trying to help.

As with A Rescue, Collett's Deceitful Kisses, or the Petty Plunderers (1781) (Figure 4.7) continues with the theme of the female thief, the pocket watch and the sailor, although in a decidedly more intimate setting. Here, the robbery is made explicit and central to the composition; in a bedroom three young women are kissing the sailor and seek to divest the stout man of the few items he has of value. One robs him of his notebook, another is working the ring off his little finger, while the third takes his watch and seals from his fob. On a table to the right are a punch bowl and a wine bottle, but, notably, there is a monkey seated

[^160]on the top of a cupboard holding an open book inscribed, 'Who's the Dupe?' The play was a late eighteenth century farce by Hannah Cowley that further marks the sailor as an unwitting participant in the women's ruse, and the presence of the monkey has additional implications. It served partly as a surrogate for the viewer watching the scene but more so in the context of the frame, as Christine Riding suggests, the monkey is a symbol of 'exoticism and (over) indulgence' ${ }^{49}$ The position of the watch has further erotic undertones; the right hand of the lady is holding the watch and chain that appears to be a surrogate for the sailor's genitals. The implication being that, for prostitutes, the offer of sex could wring a few pence, while the promise of being repaid many times over with the theft of items of intrinsic value could bring significantly more financial reward.


Figure 4.7. John Collett, Deceitfil Kisses, or the Petty Plunderers (1781), The British Museum, London.

[^161]With crime increasing through the century, the images shown depict a crime that had become an important concern in English society. Both Hogarth and Collett associate the watch with the act of crime, but, while Hogarth is implicit in his renderings, Collett shows the crime being committed. Part of the concern with watch crime was fuelled by the growing popularity of the device as a fashionable adornment, and it is with this in mind that the watch will now be looked at more closely in regards to its sartorial function.

## Dressing Time-Gentleman

The adoption of a more modest and sober image, or a 'refined simplicity', ${ }^{50}$ took full shape in the eighteenth century, and it was at this point that the pocket watch became a key component in the subtle projection of wealth and class. For the male figure, fashionable dressing has a long and intricate history with connections to notions of cultural power, as Jane Tynan points out, 'to fashion the self is to participate in the social game. ${ }^{51}$ Traditionally, power often needs a tangible expression and this outlet was given through forms of sartorial display and ornament. Not only was dress used to 'set apart men and women' and 'enhance their glory', but, as J. H. Plumb explains, it was also used to 'touch them with a divinity to which these men who toiled and worked, or bought and sold, could never hope to aspire. ${ }^{52}$ At the turn of the seventeenth century, the magnificence and elaboration of costume, which as John Carl Flugel notes, 'so

[^162]well expressed the ideals of the ancien regime, ${ }^{53}$ soon become distasteful to the new social tendencies. French philosopher and writer Gilles Lipovetsky wrote that the adoption of a more modest and sober image was fuelled in part by the rise of sensibility, and in part by a 'decline in court societies', ${ }^{54}$ and, rather than attempting to exceed the lavishness of their presumed social inferiors, the aristocracy and those of higher rank and privilege embarked on a sartorial repudiating of fashion. The eighteenth century bought with it an emphasis on modest dressing with John Styles noting that, 'plainness was regarded as a distinctive characteristic of normal English dressing, even among the nobility'. ${ }^{55}$ Lipovetsky further explains a repositioning of gender discrepancies inherent in dress: 'up until the seventeenth century men's fashion was more playful than women's; it was not until the great renunciation of the eighteenth century that the masculine mode was eclipsed by the feminine. ${ }^{56}$

With the renunciation of the old ways, a new relationship was propagated between clothing and status. Beverly Lemire argues that the commercialisation of fashion made clothing a commodity, 'access to which was determined through objective criteria', in other words, the ability to pay rather than the subjective criterion of rank. As a result, 'the tide of commerce engulfed the margins of a once exclusive domain and swept the rights to fashion from this select circle to the wider world ${ }^{37}$ and fears were growing that the supposedly natural distinctions of rank and gender might be eroded. So far as clothes remained of importance, the utmost endeavours of a masculine presentation now

[^163]lay, as Flugel continues, 'only in the direction of being 'correctly' attired, not of being elegantly or elaborately attired. ${ }^{58}$ Writing in the latter part of the century, Lord Chesterfield prescribes certain articles of dress that allows him to align with other gentleman of society. In his journal entry, he remarked, 'a gentleman is every man, who with a tolerable suit of clothes, a sword by his side, ${ }^{59}$ and a watch and a snuff box in his pockets asserts himself to be a gentleman'. ${ }^{60}$ The decorative nature of the watch gave a sense that this was a refined object to be displayed, and London labourer James Johnson reiterates Lord Chesterfield's sentiment. When he first tried on an expensive new suit of clothes in 1789, he insisted on 'having his watch' and a 'looking glass', because, with them 'I am a fine gentleman'. ${ }^{61}$ Similarly, portraits within the century started to reflect this view, with the portrait of King George by William Gainsborough embracing this model (Figure 4.8).

[^164]

Figure 4.8. Thomas Gainsborough, Portrait of King George III (c. 1781), The Royal Collection Trust, Windsor.

In Gainsborough's illustration, the two pillars and steps in the background hint at a palatial entrance with the trappings of luxury, but the portrait is notable by the simplicity of King George's dress. The portrait dispenses with the specific accruements attributed to a man of royalty; rather the King wears what is known as the 'Windsor Uniform.' The simple 'Windsor' style includes the hat in his hand, the trademark waistcoat and the trimmings of the now popular gentleman's wardrobe. This includes a ring on his right hand, a sword hanging from his belt, and a seal hanging from a watch chain below his waistcoat, indicating he has a watch in his fob pocket. With the ascension of King George III to the throne, a change in the national costume was effected. The portrait suggests that the King was keen to project a gentlemanly and dignified impression rather than one of
magnificence and splendour that the royalty proffered in previous eras, and the excess of orbs, sceptres, costly jewels and the crown of state ${ }^{62}$ are now replaced by the sartorial restraint of the watch.

As the lower and middle class grew in affluence, the simplification of dress made it easier for the lower ranks to infiltrate the assemblies and promenades of the nobility. George Brummell was one of a number of people who believed that wearing apparel was central to the public presentation of the individual and was famous for his dress. Brummell was born to lower middle class parents and as a young man rose to prominence in London society, although not through the traditional means of attaining wealth or through marriage, but primarily through the wearing of fashionable attire. Richard Dighton's illustration of Brummell (Figure 4.9) is similar in composition to Gainsborough's depiction of King George and, like Gainsborough's portrait, the background echoes their respective financial situations; that is, while the painting of King George offers more than a hint of wealth, Dighton's scenery is considerably more barren. Brummell's attire is comparable though, and hints at the sartorial homogenisation among fashionable males in the century. His cultivated look relies on plain well-fitted cuts, and supplementing this with simple accessories. This includes a beaver top hat, tasselled hessians, a cravat, tailcoat and breeches, and a plain waistcoat that is topped off with the watch fob and pocket watch. If, as Lord Chesterfield states, 'it is by being well dressed, not finely dressed that a gentleman should be

[^165]distinguished, ${ }^{9}{ }^{63}$ Brummell is both able to project an image of the middle class eighteenth century gentleman, while at the same time aping the nobility and gentry


Figure 4.9. Richard Dighton, Caricature of George 'Beau’ Brummell (1805), The Bridgeman Art Library, London.

As the sartorial homogenisation grew through the century, the pocket watch underwent many changes, from its first appearance as a miniaturised clock to an elegant timepiece at the end of the eighteenth century. While every gentleman was expected to have the device on his person, this was in itself no guarantee of standing. Rather, to be accepted in certain social circles, particular emphasis was given to owning and wearing a watch that was both modern and reflected the fashion of that particular moment. Gold watches with subtle and intricate

[^166]decorations were the most desirable, but changing fashion determined the size of the timepiece to be of equal importance. The smaller the device, the more modern and, therefore, more sophisticated the item became. Ernst Harms refers to this influence on dress as the 'element of costume', and, as he explains, 'in the entire realm of dress this element of costume is what gives the general, inclusive stamp, while it has as its opposite the tendency toward the differentiation of social ranks. ${ }^{64}$ As richer individuals could afford to dress in more elaborate and costly materials, the decorative aspects of dress shared a fundamental connection with wealth. John Carl Flugel elaborates on this, explaining, 'in societies where wealth is a matter of pride and a means of obtaining power and respect, it is natural that the wealthy should seek to distinguish themselves in this way. ${ }^{96}$

At the end of the century, Mary Meeke's The Sicilian, A novel in four volumes (1798) reveals the importance of display and position as emphasised by the aesthetics of watch design. The novel tells of 'an English gentleman of the name of Neville ${ }^{96}$ who meets and travels on a grand tour of Europe with the Duke de Ferrara, a man of fortune and notable position in Italy. On their journey, both enjoy the trappings and privilege of wealth, staying in the biggest houses and wearing the finest clothes, causing the Duke to declare, 'what a dreadful thing it is to be suspected of being poor' (54). In volume two of Meeke's work, Neville and the Duke de Ferrara have returned to Britain and are attending a court party held by the Earl of Melton, 'one of the proudest Peers Great Britain can boast of' (61). Amidst the reveries, he produces a pocket watch that at first elicits admiration among the other attendees:

[^167]holding in his left hand an immense gold chased watch, with a dial plate of the same metal: the chain was perfectly adequate to the ponderous burthen it was intended to support, and perfectly corresponded in every respect with the watch. His Grace affected great admiration, and bestowed several well-judged encomiums upon the workmanship, which was certainly exquisite of its kind (154).

The 'whole party' was 'eager to get a peep' (155) at the Duke's 'elegant repeater, set in jewels' (156) which was also described as 'a most magnificent little bauble' (156). One of the attendees, Madam Studeville, further comments on its relative modernity, 'I thought the watch I usually wear small, but it is immense in comparison to this' (156). As the Duke receives admiration from the lower ranks, the Earl of Melton is anxious to see the device. He motions for the Duke to produce the pocket watch, sarcastically saying, 'Will your Grace allow me to look at that small watch?' (172) The Earl then comments, 'some of our young men of fashion would find this an insupportable burthen' before continuing:

If it were mine, I would have it fastened to a pole, and carried after me between two of my servants, as Gulliver's watch was at Lilliput. But, for heaven's sake, where did your Grace pick up such an old fashioned time-piece, and what can induce you to encumber yourself in such a manner?' ... and now burst into a violent fit of laughter (174-175).

In ridiculing the Duke, the Earl invokes Lemuel Gulliver's timepiece. It is in the novel that, as Ginette Emprin writes, Swift 'sets out to disclose the truth about human institutions' ${ }^{67} \mathrm{He}$ cautions his readers against trusting appearances, and, as Emprin continues, 'Swift strives to make him [Lemuel] realise that his grandeur is illusory and that he should know himself ${ }^{68}$ As mentioned in the chapter on Imperial Time, the watch in Swift's text is absurdly large in Lilliput, and the relationship between scale and status is similarly reflected in the Earl's use of Gulliver's Travels for its satirical tone. The watch is a tool that Swift uses

[^168]to reveal man's insignificance and pettiness, and in the gathering of dignitaries, Meeke positions the timepiece as the axis on which the hierarchy of the court is ordered. By rank, the Earl is inferior to the Duke, but by positioning his device as a modern timekeeper that is both smaller in size and more fashionable than the Duke's model, the Earl inflates his own importance while belittling the Duke's.

When Thorstein Veblen remarks, 'a cheap coat makes a cheap man', ${ }^{69}$ he is indicating that not only is clothing conceived to be a reflection of selfhood, but, certain marks of superfluous costliness are indicators of worth. In a 'pecuniary culture', he continues, clothes assert status and the ability to sustain it, the kind of life the wearer displays to the world. The pocket watch, more than any other item, was for eighteenth century males a subtle indicator of wealth and position, suggesting also that high relative income was not as universal as the desire to have a semblance of style. Meeke's text is also a good marker for how the watch was embedded in eighteenth century culture; so much so that it is now, at the turn of the century, a suitable object to be satirised.

## Dressing Time - Ladies

For women as for men, dress and the pocket watch were a marker of wealth, status and gentility. For the female wearer of fashion, the timepiece was also married to the wearer's sensibilities, which, as Jennie Batchelor notes, were 'both an innate virtue and an attainable, refined moral sense that can be cultivated by emulation, self-reflection or appropriate reading. ${ }^{, 70}$ By labelling sensibility 'attainable', Batchelor suggests that it is another commodity acquired

[^169]via material objects and, therefore, can be bought, developed, or cultivated via sartorial means. Early in the century, Francis Nivelon wrote The Rudiments of Genteel Behaviour (1737), and while Nivelon's conduct book offers a detailed blueprint for acceptable manners, which promises to improve the female character, he also shows how dress (including the pocket watch) is an indicator of heightened sensibility. In each of the twelve chapters, a specific mannerism, or 'figure', is described as a suitable method for women of the century to 'attain a graceful Attitude' or 'an agreeable Motion', ${ }^{71}$ including mannerisms such as 'The courtsie', 'To give or receive', 'The bow' and 'Dancing the minuet'. By following the instructions within the book, a person may 'improve therein, in a short Time, and without Difficulty, ${ }^{72}$ and to aid in the readers' learning, a decorative picture featuring a female striking the corresponding pose accompanies each chapter. For example, the accompanying figure to Nivelon's 'Walking' (Figure 4.10) is striking the pose for the consequent action while dressed up in the high fashion of the century; her fine dress is accompanied with a choke necklace, fan and a pocket watch. And, while the woman might seem just to be inserted as a visual aid to embellish the instructions, Nivelon's text reveals a profound purpose for the inclusion. His commentary extends to the appearance as well as mannerisms.
as the Exterior Part of the human Figure gives the first Impression, it will be no unpleasing Task to adorn that with the amiable Qualities of Decency ... which to accomplish, it will be absolutely necessary to assist the body. ${ }^{73}$

Nivelon sees the necessity of manifesting virtue in the external form of dress, and in the accompanying figures the pocket watch is married with good manners

[^170]to aid refinement. As John Styles goes on to say, 'the code of manners known as politeness represented an important means by which the civilising influence of commerce could polish taste and improve behaviour. ${ }^{\text {. } 74}$


Figure 4.10. A picture by Francis Nivelon, engraved by L. P. Boitard, entitled Plate 3, The Rudiments of Genteel Behaviour (1737), The British Museum, London.

While Nivelon makes the connection between manners and modes of dress, it was later in the century that the notion of 'high' was joined with fashion. An approximation of this was shown earlier in William Hogarth's A Harlot's Progress with Needham's attempt to lure Moll; however, it was in novels such as Frances Burney's Evelina: Or the History of a Young Lady's Entrance into the World (1778) that emphasis was placed on how to, as Stephen J. Gores remarks, 'promote the visual as a way of envisioning the self and one's place in social

[^171]ranks'. ${ }^{75}$ On a trip to the opera, Evelina states, 'everybody was dressed in so high a style, that, if I had been less delighted with the performance, my eyes would have found me sufficient entertainment from looking at the ladies. ${ }^{, 76}$ In the text, people are defined by their affiliation to fashion and while the combination of 'high' and 'low' allows Evelina's development to be shown through her ability to discriminate between visual cultures, the notion of 'high' is solely reliant on manners of dress, not sensibility.

John Styles explains that the reliance on dress to communicate class drew on an idea in the century that 'virtuous women who made consumer choices that were moderate and restrained could uphold the morality of a commercial society. ${ }^{, 77}$ The reliability of this classification was open to question. As Faramerz Dabhoiwala points out, there was a 'central paradox' ${ }^{78}$ in the construction of female reputations. While it was assumed that people should be able to tell a woman's status and honour from her dress, the lack of virtue could be far too easily disguised. The sartorial contradiction that dress is both a means of selfexpression, while also acting as a means to create a false self is further expressed by Jennie Batchelor, who argues that 'Dress metaphorises sensibility's paradoxical status as both a genuine moral response externally expressed and a cultivated, possibly fictitious, mode of display worn by the covetous and the

[^172]immoral. ${ }^{.79}$ This can perhaps be best elucidated in reference to plate one of Carington Bowles' print of The Modern Harlot's Progress, or Adventures of Harriet Heedless (1780) (Figure 4.11), which, Faramerz Dabhoiwala argues, 'updated Hogarth's tale and in keeping with later eighteenth century sensibilities gave it a happier ending. ${ }^{, 80}$ Dabhoiwala goes on to note that, within Bowles' imagery, was 'the recycling of particular details' and 'in all these ways, Hogarth's ideas and imagery came to be consciously and unconsciously appropriated, reused, and disseminated ${ }^{3} .{ }^{81}$


Figure 4.11. Carington Bowles, The Modern Harlot's Progress, or Adventures of Harriet Heedless (1780), The British Museum, London.

Bowles' image retains much of Hogarth's original symbolism and shows
Harriet Heedless, having just arrived from the country and intent on finding work
in London, waiting in 'Statute Hall', a room where masters and mistresses went

[^173]to inspect and engage domestic servants. Harriet is standing in the centre of the picture, neatly dressed in a cap, an apron, and with a handkerchief over her bodice, while holding a small box inscribed 'H. H.' She is being looked over by a well-presented lady who wears a Polonaise gown with petticoat, a decorated bonnet and a prominently hanging watch. The costume the lady wears projects an image of cultural refinement and stands out among a roomful of similarly dressed socialites. Just as dress can convey social and moral meanings, in Bowles' print it plays a vital part in Harriet's entrapment. The lady's outfit is a disjunction of her outer self from her morals and, as a result of this deception, Harriet has been tricked into the life of a mistress rather than becoming a servant for a well-to-do family. Hannah More warns of false virtue being manifested in external forms of dress in her poem Sensibility: A Poetic Epistle to the Honorable Mrs Boscawen (1782), where she writes, 'And these fair marks, reluctant I relate, these lovely symbols may be counterfeit'. ${ }^{82}$

The differing symbolic meaning of the same type of watch in relation to the male and female owner can be seen in William Gainsborough's The Morning Walk (1785) (Figure 4.12) and William Hallett's 'last will and testament'. Gainsborough's picture shows the figures of William and Elizabeth Hallett strolling through a woodland landscape dressed in their finest clothes. Elizabeth Hallett wears an ivory silk dress with a black waistband while William Hallett is dressed in a black silk velvet frock suit with the jacket undone. Particular attention is given to the watch loosely hanging from William's pocket that, rather than being tucked in his waistcoat in a more refined manner, is on display for all to see, although not closely enough for the time to be discerned. At first glance,

[^174]the watch is a symbol of William's wealth; it is, according to his 'last will and testament', made of a 'Gold and enamel watch key with diamond', a 'Gold watch chains and seals' and, most importantly, a 'Gold repeating watch'. ${ }^{83}$ The will reveals the timepiece is used as a mask for his dwindling fortunes and one of the few items he holds of value. Hallett was the youngest son of a man of property and a married father of six children, who is 'not full of riches to bestow on them', although to his wife he bequeaths 'to and for her own use and benefit' the gold repeater. It is to be assumed that, after his death, William does not intend for his wife to 'use' the watch primarily as a timekeeper. Rather, the timekeeper's intent seems more a means for display and maintaining her social persona. ${ }^{84}$

[^175]

Figure 4.12. William Gainsborough, The Morning Walk (1785), The National Gallery, London.

## From Hand to Hand

The texts discussed so far have shown that the pocket watch had an ambiguous status, both confirming and concealing moral and class identity. In the final book to be looked at in this chapter the timepiece is fully explored as an item with a multitude of meanings. Published in 1788, The Adventures of a Watch! was part of the it-narrative tradition whereby an object or possession is endowed with human agency to become the novel's primary narrative voice. Igor Kopytoff notes the significance of these narratives, proclaiming they are 'biographies of
things which can make salient what otherwise remain obscure. ${ }^{85}$ The featured objects delineate the way in which possessions inscribe the private experiences of their owners and offer a critical perspective on the circulation of objects in the public sphere. As Liz Bellamy further remarks, an it-narrative 'focuses on the way that an object passes through a diverse range of hands. The protagonist can be sold, lost, found, given, and exchanged and thus come in contact with different social groups. ${ }^{86}$

In The Adventures of a Watch! the narrator argues that a timepiece is every bit as deserving of a story as other notable objects in the narrative tradition: 'bank notes, guineas, nay even Birmingham halfpence, though of very roguish appearance, give the history of their lives... [A] watch is surely as intelligent as any of the above'. He then extols its merits based on the 'high' concepts of eighteenth century style: 'tis no vulgar watch, but a watch of fashion! A gold repeater, elegantly chased! Listen to it attentively! ${ }^{87}$ The watch is aware of its role as a 'repeater', which is noted by Mark Blackwell, who states 'that it collects and retells the stories of the watch's owners' ${ }^{88}$ The acknowledgement of the watch as a 'gold repeater' also positions the device as an item of value on a par with bank notes or guineas. By highlighting the item as a commodity, it is allowed to circulate freely among society's diverse classes and ranks, as the watch itself exclaims, it provides 'an essential service to all' (2).

[^176]The watch begins its journey through society under the stewardship of the Right Honourable William Trueman, and it initially professes, 'I am thoroughly wound up, therefore cannot help going' (3). This eagerness is rewarded as the watch is soon 'lost in wager' and 'passed into hands of my second possessor', Lord Flimsey, who, as the watch further exclaims, is a more 'agreeable owner' (17). The Lord warns the device not to 'regulate my movements' (16); rather he is 'one who knows my value' (17), that is, having been told the watch cost ' a hundred and fifty $\ldots$ a few days past ${ }^{89}$ (15). As an, 'enobled pillar of the state' (18), the Lord has an idiosyncratic view of time as he spends his 'fleeting time ... contributing towards that of a whole people’ (17), but his 'uprightness' was not predominant in his choice for a companion. The watch exclaims that, when it comes to interaction with ladies, those of a 'certain description, being preferred by his Lordship to those of superior rank' (18). The Lord's proclivity for lower class women prompted the next change of hands after a meeting with a 'little rosy cherub' (27) who 'arrested his attention.' This eventually led to the watch being conveyed from its 'present situation, into her own pocket' (30), and from her pocket soon to a Mr. Barabas Moloch, the pawnbroker.

This pattern of downwardly mobile movement from owner to owner continues throughout the novel as the plot exploits the transferable nature of commodities up and down the social scale. From the pawnbroker, the watch is given to Mr. Revel in lieu of an outstanding debt who, being only a man of fair means, uses the device as a tool for emulating his social betters. 'Fashion countenanced vice', the watch explains before continuing 'Mr Revel was therefore no unwelcome guest among the select group of lords and lordlings, wits and witlings, soldiers

[^177]and soldierlings' (76). As Aileen Douglas further remarks, Mr. Revel exemplifies the way in which 'the different stations of Life so run into and mix with each other'.$^{90}$ The watch soon resumes its travels, being gifted to a 'Fair Mistress' though only a few days are passed in her ownership 'before that great and terrible day arrived; - when I was taken in execution, with a number of other valuables, and conveyed to the sheriff's apartments in - street' (84). The device is subsequently auctioned and won by the 'nabob' Philanthropos who, after embarking on an 'oriental tour' and returning to London, fell prey to a pickpocket, making 'as quick a transfer of stock, and with as much dexterity, as any brother of the Alley' (170). The thief having cleverly contrived to 'ease him of that movable, together with chain of gold, and every appurtenance thereunto belonging' (174) deposits the timepiece at a pawnbroker for the sum of 'twenty guineas' (178). Consequently, after 'clapping me in his shew-glass, among a number of other watches, jewels, and splendid ornaments' (182), it once again fell into the hands of 'WILLIAM TRUEMAN, Esquire’ (207).

Aileen Douglas notes, 'society is integrated through the transmission of objects from hand to hand, ${ }^{, 91}$ and, in The Adventures of a Watch!, the timepiece's journey links different parties from the social hierarchy. The device is locked in a cycle of instability, but the erratic movement conveys its popularity in the market that superseded its original function. Its utilitarian function of timekeeping is often ignored in favour of various features, in other words, its value as a commodity or a sartorial accessory.

The it-narrative helped embed the pocket watch as an important object in

[^178]English culture, and as such, featured more imposingly as an object ripe for satire. While pictures such as Sayer and Bennett's Jews Receiving Stolen Goods (1777) use the pocket watch as an ancillary item to satirise crime, it was W. Holland who, in his 1797 picture The Honest Pickpocket (Figure 4.13), explored the centrality of the watch in regard to crime and politics. Towards the latter part of the century, Britain was embroiled in the Revolutionary War and the war with France, and, during the early years of conflict, importance was placed on borrowing to finance these confrontations. ${ }^{92}$ This initially enabled the government to avoid oppressive taxation, but, as the levels of national debt grew, every possible measure to raise money was explored. So called 'assessed taxes' on individual items were imposed on many basic commodities with the government stating, 'Where-ever you see an object, tax it.' In 1797, a levy on watch ownership was imposed and E. P. Thompson noted the differing financial structures of this charge. He states that, 'the taxes were of 2 shillings and sixpence upon each silver or metal watch' and ' 10 shillings upon each gold one, ${ }^{93}$ The widespread ownership of pocket watches in English society was seen by William Pitt and his government as a viable source of income to replenish the country's depleted finances, and by layering the charges for different styles of the timepiece, the government ensured that everyone contributed to the war effort.

Holland published The Honest Pickpocket (1797) against this backdrop of political upheaval, and the picture shows Prime Minister Pitt and John Bull in the roles of thief and victim respectively. On the surface, Holland puts forward John Bull as a plainly dressed man expressing shock at the brazen thievery of his

[^179]pocket watch by Pitt, who, in contrast, has the well-dressed appearance of a dandy. While he lifts the watch with one hand, Pitt is placing the other on Bull's shoulder while pronouncing: 'Don't be alarmed, Johnny, I only want to see whether it is Gold or Silver - you know there is a great deal of difference between Half a Crown and Ten Shillings'. On closer inspection, the print also satirises John Bull with the filching of the device echoing the Chancellor of the Exchequer's belief that, while pocket watches were in part 'certainly articles of convenience', they were more 'articles of luxury ... generally kept by persons who would be pretty well able to pay. ${ }^{94}$ The figure's underlying appearance echoes this observation with Bull's stout appearance indicating gluttony in stark contrast to the slim figure of the prime minister.


Figure 4.13. W. Holland, The Honest Pickpocket (1797), The British Museum, London.
After nine months, the tax was repealed and replaced by the introduction of

[^180]income tax in 1798. However, while it was in place, Holland's The Honest Pickpocket satirically commented on the exploitative nature of the British government and helped capture the mood of late-century Britain amidst a period of oppressive taxation. The trope of politicians as thieves is, to an extent, a reprise of Gay's Beggar's Opera; however, the tone of the picture and the audacious image of daylight robbery better reflect the distrust the British people felt towards the edicts of government. As seen in The Adventures of a Watch, the continual motion of pocket watches as they passed from owner to owner made the recording of ownership problematic, and, therefore, the collection of revenue became an increasingly unsuccessful endeavour. It can be speculated that the relative scarcity of the devices in visual imagery during this period was indicative of the owner's desire to hide their possessions, unlike the ostentatious display of the device earlier in the century.

## Conclusion

The chapter reveals a number of important facets of the pocket watch other than the mere quantification of time. Prior to the eighteenth century, watches were imprecise, unreliable and cumbersome, and as such, worn only by the few persons of wealth and standing who could afford such impractical instruments. It was not until the beginning of the eighteenth century that the pocket watch began to show hours, minutes and, increasingly, seconds. As the device became a familiar and ubiquitous commodity in everyday life, it was used to communicate more than mechanical time or simply promote chronometric consciousness in fiction and art. Daniel Defoe was one of the first authors to feature pocket watches, although, as Peter Wagner mentions, Defoe depicts 'the presence as
well as the various social functions of clocks and watches in everyday life'. ${ }^{95}$
Just as pocket watches were representative of criminal activity, the device also enabled a re-ordering of the nature of societal divisions within the eighteenth century. Subtle signifiers of class representation were being explored, as Neil McKendrick shows, the pocket watch was to 'delight the eye, to exhibit one's taste and to assert one's wealth. ${ }^{96}$ As seen through the works of Mary Meeke, Francis Nivelon and Thomas Gainsborough, the device was a means for upper class males living in the shadow of sartorial restraint to subtly display their standing. For the female of high fashion, the pocket watch was an essential accoutrement that highlighted manners, while, for the lower classes, the pocket watch was a chance to mimic high fashion as a means of visual recognition for elevating their social status. Throughout the chapter, it is explained how the watch acquired gender-specific and class-based implications over the course of the century; it was less 'the time' than 'the times'.

[^181]
## CONCLUSION

The advancement of horology leading up to the eighteenth century showed a clear progression from approximation to precision, whereby the measure of time no longer varied by season, and the clock turned unequal hours into equal ones. Timepieces, in all their iterations, became deeply embedded in the fabric of eighteenth-century life. They were now not simply being observed or listened to, but increasingly being obeyed, discussed and written about. My approach in this thesis has been to elucidate the important cultural role of the timepiece in this period by reading works of literature and art within the context of an increasingly time-conscious society. No critical study has covered this topic with such a wide range of writing, or with my dual focus on text and imagery, and my attention to the often-overlooked role of timepieces, clocks, and time opens up new ways of seeing familiar texts. The thesis showed how the perception of time modernised and expanded, and how different temporal cycles overlapped and competed. Each chapter showed how timepieces created a new or distinctive type of time, and it is worth recalling them here. To begin with, my analysis of Defoe's The Life and Strange Surprising Adventures of Robinson Crusoe (1719) and Swift's Gulliver's Travels (1726) in Chapter 1 framed the chronometer as a tool for extending imperial power and western clock time across the globe. Continued examination of the timepiece, through works such as Gillray's The Reception of the Diplomatique and his Suite at the Court of Pekin (1792) and Darwin's The Love of the Plants (1789), revealed that the device also provided the British Empire with a defining identity when participating in cultural exchanges. Clocks were vehicles of imperial time, allowing Britain to impose its temporal order on the 'timeless', and its
hegemonic deployment helped subjugate other temporal regimes, including other Europeans, around the world.

In Chapter 2, through a reading of Gray's Elegy Written in a Country Churchyard (1751), Duck's The Thresher's Labour (1729) and Collier's The Woman's Labour (1739), I established the church bell as an important voice of temporal authority and the means by which temporal announcements were made. By examining Legg's Low-life: Or, One Half of the World, Knows not how the Other Half Lives (1750) and Hogarth's Four Times of Day - Morning (1736), the public clock was shown to be a tool for co-ordinating social action in public spaces, and linked the announcement of the hours with control of the everyday time of urban masses. Finally, as the clock and bell became a salient feature in many towns and cities, the examination of The Law Book for the Crowley Ironworks (c. 1700) highlighted how industrial time's authority was imposed over natural cycles that previously conducted patterns of life and work.

In Chapter 3, I examined two of the most popular novels of the era, Richardson's Pamela (1740) and Sterne's The Life and Opinions of Tristram Shandy, Gentleman (1759-67), for their representation of the clock and clock time, and the effects this had on domestic life. In both novels we see how clocks regulated activities and this, in turn, reinforced wider notions of the implicit hierarchical spheres that formed according to rank, position and gender. The social activity within domestic space was similarly shaped by the clock, which was a direct aural and visual correlative of power, one that images such as Lancret's The Four Times of Day: Morning (1739) and Hogarth's Marriage à-laMode: 2, The Têtê-à-Têtê (1745) used to legitimise the dominant party within the room. Finally, through close reading of Meeke's The Sicilian, A novel in four
volumes (1798), Nivelon's The Rudiments of Genteel Behaviour (1737), and Gay's The Beggar's Opera (1728) in Chapter 4, I explored how the pocket watch provided an insight into the gender-specific and class-based structures inherent in representations of time in eighteenth-century English literature. The timepiece was a proxy for wealth and entitlement that led images such as The Honest Pickpocket (1797) and Collett's Deceitful Kisses, or the Petty Plunderers (1781), to lampoon the rich and explore the devices reordering the nature of societal divisions.

The thesis' extensive research across the eighteenth century opens the opportunity for further avenues of investigation in later periods. For example, timepieces in the nineteenth century were produced in increasing quantities, responding to, as well as prompting, epochal shifts in horology. The most notable changes were tied to the introduction of the railway system and key to the interconnected network, as Luchien Karsten explains, was the timetable, which 'introduced and seriously integrated the infrastructural provisions of the railroads. ${ }^{11}$ The increasing adherence of public clocks to Greenwich Mean Time in order to accommodate a rigid timetable inevitably led to temporal hegemony throughout towns and villages that, until this time, relied on setting their own time.

Instead of dwelling on this familiar topic of railway time, I want to end by briefly referring to two Romantic-era texts, one literary and one visual, which critique in different ways the association of clock time with social and political control. The first is by Isaac Robert Cruikshank, who embraces the orderly symbolism of the clock in his satirical print, The Time Piece! \& Cunning Jack $O^{\prime}$

[^182]Both Sides (1820) (Figure 5.1). The image was prompted by the proceedings in the House of Lords, where King George IV attempted to divorce his wife and therefore prevent her ascendancy to the throne. Cruikshank taps into the increasing homogeneity of time to show the political workings of the crown and state configured in the mechanism of history. The dial face is the central focus of the image, and instead of numerical counters it reads 'KING, LORDS, COMMONS' in reference to the foundations of the British constitution. Similarly, the hands are replaced with a kneeling Caroline of Brunswick who is pointing with one arm to a crown resting on the dial, and the other to the word 'COMMONS'. The inevitable movement of time here is signalling that history (as time) has moved away from King and Lords towards the Commons. Reformers took up the Queen's cause as it was an opportunity to embarrass the King and expose him as behind the times, and Caroline, as Cruikshank indicates, is the mechanism of this change.


Figure 5.1. Isaac Robert Cruikshank, The Time Piece! \& Cunning Jack O' Both Sides (1820), The British Museum, London.

The rest of the image, as Dror Wahrman notes 'reproduced starkly the oftnoted political polarisation of those years; a point driven home time and again by the symmetrical antitheses'. ${ }^{2}$ On one side of the dial, standing on a cornucopia filled with coins are representatives of the government offering Caroline a bagful of money. In this action Cruikshank is acknowledging the Whigs' demand in 1814 that her allowance should be increased to reflect her growing popularity amongst the public. Mirroring the political figures are the radicals who stand on the cap of liberty, but rather than present monetary rewards they are seeking to

[^183]capitalise on Caroline's situation. ${ }^{3}$ Armed soldiers and French sans-culottes with daggers occupy the two opposing arms that support the device, with the French political group standing on the 'Pandora's Box' that the Queen's situation will open. Similarly, at the top and bottom of the clock perching on the dial face and in the pendulum are the figures of John Bull and George Canning respectively. As the title suggests, Canning is holding the balance of the parties despite the metaphor indicating the mechanical and unstoppable nature of clock time contributing to the sense of radical momentum. His opposite, John Bull who is straddling the device is acting as the ultimate arbiter overseeing the constitutional mechanism. The magistrate's wig is one of the symbols that highlight his authority while the clock he sits on, as has been shown throughout the thesis,with its association of social and political power, is the other. By using the timepiece to express the workings of the state, Cruikshank highlights how the device has become so embedded within culture that it can be powerfully deployed as a satirical vehicle. However, not everyone in the Romantic period saw the dominance of clock time as a positive development.

Nineteenth century Romantics who favoured horological archaism over modern efficiency disliked the ubiquity of the timepiece, and further research would do well to acknowledge this growing discontent. For instance, William Hazlitt's essay, 'On a Sundial' (1827), looks back to the pre-industrial past, with Hazlitt exclaiming: ‘I have never had a watch nor any other mode of keeping time in my possession', ${ }^{4}$ preferring instead 'to take no note of time' (45). This can be taken as an allusive gesture, recalling the eighteenth-century French

[^184]philosopher Jean-Jacques Rousseau, who, in Book Eight of The Confessions (1749), recalled how the success of his first Discourse gave him the joy of disposing of the watch, among other burdens. Hazlitt refers to this episode when recounting the anecdote of a French lady and her repeater watch. This act from Rousseau, as with Hazlitt, was 'to symbolise worldly renunciation' and with this action he was 'refusing to let his life be structured by social demands'. ${ }^{5}$ As Hazlitt states, this would allow us to 'compose our lives of bright and gentle moments' (45), presumably unencumbered by the imposition of the clock and clock time. It was not just the intrusiveness and rigidity of mechanical time that Hazlitt derides in his essay, but also its ancillary and ritualistic function. Hazlitt observes that the timepiece 'seems made for anything but to tell the hour' (48), before continuing:

I dislike a watch... that comes to me like a footpad with its face muffled, and does not present its clear, open aspect like a friend, and point with its finger to the time of day. All this opening and shutting of dull, heavy cases... is not to husband time, but to give trouble (49).

His disregard for the 'pomposity and self importance' (49) of owning a fashionable clock critiques the marriage of time and entitlement laid out in the preceding century. The indication of one's worth through a timepiece and the theatrical ceremony of telling time are recognised by Hazlitt as having little value. This he regards as an act of 'quackery and impertinence, even in our attempts to calculate the waste of time' (49).

Just as the essay rejects the hegemony of clock time, it also reflects on the auditory nature of the public timepiece. Along with the time telling function of the church bell, that 'diffused through the hamlet ... at the close of day' (53),

[^185]Hazlitt remarks that it is also a tool for announcing executions, in the Beggar's Opera (1728), and indicates the funeral of a soldier in Venice Preserved (1682). The cultural power of telling time is how the clock regulates social and legal rituals, and, as Hazlitt suggests, you do not necessarily have to see the time to know it, or to know what is being announced or signalled. In other words, he is intimating that customary time is more deeply ingrained in the imagination than quotidian time. Hazlitt goes on to acknowledge that bells are 'the mouth-pieces of time; that [clocks] not only point it to the eye, but impress it on the ear' (50) and further states that:

Time thus speaks to us in an audible and warning voice. Objects of sight are easily distinguished by the sense, and suggest useful reflections to the mind; sounds, from their intermittent nature, and perhaps other causes, appeal more to the imagination (50).

After denouncing the visible aspects of the timepiece, Hazlitt accepts that the audible chimes of the bell have the ability to reconfigure the clock in the mind of listeners, from a visible obtrusion to one that provides a 'cheerful accompaniment' (52) to time. Hazlitt goes further and connects the bell to nationalist notions of racial hierarchy and imperialist authority: 'Foreigners', he notes, 'are strangers to the sound of village bells' (52). The chimes are the arbiters of time and those familiar with its temporal structures are situated in a privileged position while placing the other, or the unfamiliar 'foreigner', a stage of lesser development. The progress of others can be measured by the harnessing of time, and as Thomas Bender notes, 'concepts like primitiveness, backwardness, and underdevelopment rank areas and people of the world on a seemingly naturalized timeline, ${ }^{6}$

[^186]The value of this essay, especially for this thesis, is that it attempts to reconnect with notions of time before the eighteenth-century horological revolution. Hazlitt proves to be a valuable witness to, and critic of, the ascendency of clock time and the timepiece. The sundial is the nostalgic symbol of the pre-industrial age, one that was superseded once there became a pressing need for the finer division of time. Paul Glennie and Nigel Thrift explain that during the early modern period, 'clocks shifted from being purely proxies or intermediaries for what a sundial would show, were it not cloudy, to being themselves the source of times to which causal powers could be ascribed ${ }^{\prime} .{ }^{7}$ This thesis has charted this transition, and moreover, shown the profound effect the timepiece had on the century, as it was undoubtedly 'the key machine of the modern industrial age. ${ }^{8}$

[^187]
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    ${ }^{59}$ The Journals of Captain James Cook on his Voyages of Discovery - II: The Voyage of the Resolution and Adventure 1772-1775, ed. J. C. Beaglehole (Cambridge: Hakluyt Society, 1969), July-Sep 1772.
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    ${ }^{65}$ Michael Talbot, 'Gifts of Time: Watches and Clocks in Ottoman-British Diplomacy, 16931803', in Material Culture in Modern Diplomacy from the 15th to the 20th Century, ed. Harriet Rudolph and Gregor M. Metzig (De Gruyter Oldenbourg, 2016), 59.
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    ${ }^{69}$ Catherine Pagani, Eastern Magnificence and European Ingenuity: Clocks of Late Imperial China, 69.
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    ${ }^{71}$ Kangxidi Yuzhi Wenji, (Literary works of the Kangxi emperor), 4 vols. (Taiwan: Xuesheng shuju, 1966), 2428. Cited in Catherine Pagani, Eastern Magnificence and European Ingenuity: Clocks of Late Imperial China (Ann Arbor: University of Michigan Press, 2004), 63.

[^40]:    ${ }^{72}$ The next chapter will show the move to industrialisation was predicated on the harnessing of time by the clock, to shape working practices and efficiently organise workers. As Kangxi mentions in the poem the clock is similarly undertaking this task, in this instance with the automaton of the timepiece replacing the 'red caps' work.
    ${ }^{73}$ Peter J. Kitson, Forging Romantic China: Sino-British Cultural Exchange 1760-1840 (Cambridge: Cambridge University Press, 2013), 133.
    ${ }^{74}$ Zheng Yangwen, China on the Sea: How the Maritime World Shaped Modern China (Boston: Brill publishers, 2012), 160-161.
    ${ }^{75}$ Markman Ellis, Richard Coulton and Matthew Mauger, Empire of Tea: The Asian Leaf that Conquered the World (London: Reaktion Books, 2015), 71.
    ${ }^{76}$ Benjamin A. Elman, On Their Own Terms: Science in China, 1550-1900 (Cambridge: Harvard University Press, 2005), 207.

[^41]:    ${ }^{77}$ Catherine Pagani, Eastern Magnificence and European Ingenuity: Clocks of Late Imperial China, 81.
    ${ }^{78}$ Peter J. Kitson, Forging Romantic China: Sino-British Cultural Exchange 1760-1840, 21. This is more than likely the same device that Lord Macartney viewed during his embassy to China: 'At one end I observed a musical clock that played twelve old tunes, the 'Black Joke', 'Lillibullero', and other airs of the 'Beggars Opera'. It was decorated in a wretched old taste, with ornaments of crystal and coloured stones but had been, I dare say, very much admired in its time. On the dial appeared in large characters, 'George Clarke, Clock and Watch Maker, in Leadenhall Street, London'. George Macartney, An Embassy to China: Being the Journal Kept by Lord Macartney during His Embassy to the Emperor Ch'ien-lung, 1793-1794, ed. J. L. CranmerByng (London: Longmans, 1962) 355.
    ${ }^{79}$ Juan Qing Gaozong yuzhi shi. Cited in Guo Fuxiang, 'Qianlong huangdi yu Qinggong zhongbiao de jianshang he shoucang (The Qianlong emperor and the enjoyment and collection of Qing palace clocks), Gugong wenwu yuekan 13, no. 9 (1995), 77. Taken from Catherine Pagani, Eastern Magnificence and European Ingenuity: Clocks of Late Imperial China, 67.

[^42]:    ${ }^{80}$ Cao Xueqin, The Dream of the Red Chamber, trans. H. Bencraft Joly. Urbana, Illinois: Project Gutenberg. Retrieved February 21, 2016, from www.gutenberg.org/ebooks/pg9604. Book 2, chapter xlv.

[^43]:    ${ }^{81}$ Ibid, Book 1, chapter xi.
    ${ }^{82}$ Maxine Berg, 'Britain, industry and perceptions of China: Matthew Boulton, "useful knowledge" and the Macartney Embassy to China 1792-94.' Journal of Global History, Vol. 1, No. 2 (July., 2006), 272.

[^44]:    ${ }^{83}$ H. B. Morse, The Chronicles of the East India Company trading to China 1635-1834 (Oxford: Oxford University Press, 1926), 215.
    ${ }^{84}$ Catherine Pagani, Eastern Magnificence and European Ingenuity: Clocks of Late Imperial China, 71.
    ${ }^{85}$ James L. Hevia, Cherishing Men from Afar: Qing Guest Ritual and the Macartney Embassy of 1793 (London: Duke University Press, 1995), 103.

[^45]:    ${ }^{86}$ Maxine Berg, 'Britain, industry and perceptions of China: Matthew Boulton, "useful knowledge" and the Macartney Embassy to China 1792-94', 282.
    ${ }^{87}$ Draper Hill notes that Gillray's The Reception was actually produced just as the diplomatic mission was leaving England. And though Gillray may have known through the press the gifts to be included on the mission, the scene presented, though wonderfully prophetic of the Chinese reaction, is entirely fanciful. It was 'a remarkably accurate prediction of the impression which Lord Macartney's mission to China in the years 1792 to 1794 was destined to make on the Emperor Chien Lung.' Draper Hill, Fashionable Contrasts: Caricatures by James Gillray (London: Phaidon Press, 1966), 32.
    ${ }^{88}$ Frederick Wakeman, Jr. The Fall of Imperial China (New York: Free Press, 1975), 101.

[^46]:    ${ }^{89}$ Benjamin A. Elman, On Their Own Terms: Science in China, 1550-1900, 220.

[^47]:    ${ }^{90}$ An Embassy to China: Being the Journal Kept by Lord Macartney During His Embassy to the Emperor Chalen-Lung, 1793-1794, ed. J. L. Cranmer-Byng (Hamden, Conn: Archon Books, 1963). Diary, in Lord Macartney's Embassy, ed. J. L. Cranmer-Byng (1963), 125.
    ${ }^{91}$ Peter Kitson believed that it would have been more beneficial to offer the emperor items of utilitarian value. He exclaimed, 'Macartney failed to present the manufactures and the less glamorous technical scientific presents, such as the air pump, pulleys, and chronometer, relying instead on the time honoured Jesuit policy of grandstanding astronomical instruments and clocks'. Peter J. Kitson, Forging Romantic China: Sino-British Cultural Exchange 1760-1840, 147.
    ${ }^{92}$ Michael Adas, Machines as the Measure of Men: Science, Technology, and Ideologies of Western Dominance (New York: Cornell University Press, 1989), 34.

[^48]:    ${ }^{93}$ John Gascoigne, Science in the Service of Empire: Joseph Banks, the British State and the Uses of Science in the Age of Revolution (Cambridge: Cambridge University Press, 2011), 112.
    ${ }^{94}$ Researchers at the Chelsea Physic Garden report 'of approximately 300 new plant species introduced between 1735 and 1768', (The Legacy of Peter Collinson, Eighteenth Century Plant Enthusiast, private circulation). Jenny Uglow noted the extent of botanical specimens recovered from voyages of discovery in the superseding years, stating that: 'When the naturalists Joseph Banks and Daniel Solander travelled with Captain Cook on his voyages to the South Seas from 1768 to 1771, they brought back 1,000 new species of plants.' Jenny Uglow, The Lunar Men: The Friends who made the Future, 1730-1810 (London: Faber \& Faber, 2002), xv. The efforts of Banks and Solander were part of an unprecedented period of transatlantic movement and as Stephanie Volmer suggested, the migration of plants blurred 'the line between foreign and local spaces, between the discovery of new worlds and the creation of new worlds through the activity of planting.' Stephanie Volmer, Planting a New World: Letters and Languages of Transatlantic Botanical Exchange, 1733-1777. Thesis. Rutgers University, 2008, 22.

[^49]:    ${ }^{95}$ Peter J. Kitson, Forging Romantic China: Sino-British Cultural Exchange 1760-1840, 135.
    ${ }^{96}$ Janet Browne, 'Botany for Gentlemen: Erasmus Darwin and "The Loves of the Plants."' History of Science Society, Vol. 80, No. 4 (Dec., 1989), 594.
    ${ }^{97}$ Ibid.
    ${ }^{98}$ Ibid, 605.
    ${ }^{99}$ Erasmus Darwin, The Loves of the Plants (London: J. Johnson, 1789), Canto 1, Line 31. Subsequent references will be shown by Canto and Line only.

[^50]:    ${ }^{100}$ Erasmus Darwin, The Botanic Garden; A Poem, in Two Parts. Part I. Containing The Economy of Vegetables. Part II. The Loves of the Plants. With Philosophical Notes, 66-67.
    ${ }^{101}$ Martin Priestman, The Poetry of Erasmus Darwin: Enlightened Spaces, Romantic Times (Farnham: Ashgate Publishing Limited, 2013), 87.
    ${ }^{102}$ The passage goes on to list the most common of the numerous plants forming the Watch of Flora and their blossoming time. Leontodon taraxacum, Dandelion, opens at 5-6, closes at 8-9. Hieracium pilofella, mouse-ear hawkweed, opens at 8 , closes at 2 . Sonchus laevis, smooth Sowthistle, at 5 and at 11-12. Lactuca fativa, cultivated Lettice, at 7 and 10. Tragopogon luteum, yellow Goatbeard, at 3-5 and at 9-10. Lapfana, nipplewort, at 5-6 and at 10-1. Nymphaea alba, white water lily, at 7 and 5. Papaver nudicaule, naked poppy, at 5 and at 7 . Hemerocallis fulva, tawny Day-lily, at 5 and at 7-8. Convolvulus, at 5-6. Malva, Mallow, at 9-10, and at 1. Arenarea purpurea, purple Sandwort, at 9-10, and at 2-3. Anagallis, pimpernel, at 7-8. Portulaca hortensis, garden Purlain, at 9-10, and at 11-12. Dianthus proliser, proliserous Pink, at 8 and at 1. Cichoreum. Succory, at 4-5. Hypochaeris, at 6-7, and at 4-5. Crepis, at 4-5, and at 10-11. Picris, at 4-5, and at 12. Calendula field, at 9, and at 3. Calendula African, at 7, and at 3-4. Erasmus Darwin, The Botanic Garden; A Poem, in Two Parts. Part I. Containing The Economy of Vegetables. Part II. The Loves of the Plants. With Philosophical Notes, 66-67.

[^51]:    ${ }^{103}$ Maureen McNeil, Under the Banner of Science: Erasmus Darwin and his Age (Manchester: Manchester University Press, 1987), 159.
    ${ }^{104}$ Ibid, 21.
    ${ }^{105}$ Ralph B. Crum, Scientific Thought in Poetry (New York: Columbia University Press, 1931), 113.

    106 Jenny Uglow, The Lunar Men: The Friends who made the Future, 1730-1810 (London: Faber \& Faber, 2002), 97.

[^52]:    ${ }^{107}$ Jenny Uglow, The Lunar Men: The Friends who made the Future, 1730-1810, xv
    ${ }^{108}$ Maureen McNeil, Under the Banner of Science: Erasmus Darwin and his Age, 8.

[^53]:    ${ }^{109}$ Alan Bewell, ‘Erasmus Darwin's Cosmopolitan Nature.' ELH, Vol. 76, No. 1 (Spring., 2009), 21.
    ${ }^{110}$ Mark M. Smith, Mastered by the Clock: Time, Slavery and Freedom in the American South (Chapel Hill: University of North Carolina Press, 1997), 95.

[^54]:    ${ }^{111}$ Shaun Irlam, '"Wish You Were Here": Exporting England in James Grainger's The Sugarcane.' ELH 68.2 (2001), 380.
    ${ }^{112}$ Mark M. Smith, Mastered by the Clock: Time, Slavery and Freedom in the American South, 5.

[^55]:    ${ }^{113}$ Dan Thu Nguyen, ‘The Spatialization of Metric Time. The Conquest of Land and Labour in Europe and the United States.' Time \& Society, Vol. 1, No. 1 (1992), 30.
    ${ }^{114}$ Peter Galison, Einstein's Clocks, Poincare's Maps: Empires of Time (New York: W. W. Norton \& Company, 2003), 38.

[^56]:    ${ }^{115}$ Dan Thu Nguyen, ‘The Spatialization of Metric Time. The Conquest of Land and Labour in Europe and the United States.' Time \& Society, 33.

[^57]:    ${ }^{1}$ Alexis McCrossen, Marking Modern Times: A History of Clocks, Watches, and Other Timekeepers in American Life (Chicago: The University of Chicago Press, 2013), 6.
    ${ }^{2}$ Frank Hope-Jones and George Bennett Bowell. Municipal Synchronous Clocks (London: Lightning, 2013). Cited in Hannah Gay, 'Clock Synchrony, Time Distribution and Electrical Timekeeping in Britain 1880-1925.' Past and Present, 181, No. 1 (2003), 114.

[^58]:    ${ }^{3}$ E. P. Thompson, 'Time, Work-Discipline, and Industrial Capitalism.' Past \& Present, No. 38 (Dec., 1967), 78.
    ${ }^{4}$ Ibid, 90.

[^59]:    ${ }^{5}$ Thomas Gray, Elegy Written in a Country Churchyard (1751). Taken from Complete Poems of Thomas Gray: English, Latin and Greek, ed. by Herbert W. Starr, and J. R. Hendrickson (Oxford: Clarendon Press, 1966), 41. Subsequent references to the edition will appear after the quotations in the text.

[^60]:    ${ }^{6}$ Frank H. Ellis, ‘Gray's Elegy: The Biographical Problem in Literary Criticism.' PMLA 66, No. 6 (Dec., 1951), 990.

[^61]:    ${ }^{7}$ Many critics have readily accepted the churchyard resides in the village of Stoke Poges; however, this is a fallacy. Biographical evidence cannot interpret or ground the work in reality and furthermore, 'the author' could not possibly have been present on the scene described in the poem. For the scene is literary, not topographical. The church and churchyard of St. Giles in Stoke Poges, Buckinghamshire, were by no means a 'neglected Spot', and were barely within sound of the Windsor Castle bells. This is imperative as St. Giles church had only an inconspicuous tower devoid of a bell or clock. Frank H. Ellis, 'Gray's Elegy: The Biographical Problem in Literary Criticism', in Twentieth Century Interpretations of Gray's Elegy, ed. Herbert W. Starr (New Jersey: Prentice-Hall, Inc, 1968), 59.
    ${ }^{8}$ Curfew was applied in the eighteenth century to an evening bell long after the law for putting out the fires ceased.
    ${ }^{9}$ Alain Corbin, Village Bells: Sound and Meaning in the $19^{\text {th }}$-Century French Countryside (Oxford: Macmillan Publishers Ltd, 1999), 95.

[^62]:    ${ }^{10}$ W. M. Newman, 'When Curfew Tolled the Knell', in Twentieth Century Interpretations of Gray's Elegy, ed. Herbert W. Starr (New Jersey: Prentice-Hall, Inc, 1968), 20.
    ${ }^{11}$ St. Giles church of Stoke Poges had neither a clock nor bell tower although Windsor would have been a likely origin for these audible signals. Windsor Parish Church in the eighteenth century featured both a public clock and bell tower.
    ${ }^{12}$ Stephen Duck, The Thresher's Labour (London: Merlin Press, 1989), 1. Subsequent references to the edition will appear after quotations in the text.

[^63]:    ${ }^{13}$ William J. Christmas, The Lab'ring Muses: Work, Writing, and the Social Order in English Plebeian Poetry, 1730-1830 (Newark: University of Delaware Press, 2010), 81.
    ${ }^{14}$ James Mulholland, '"To Sing the Toils of Each Revolving Year": Song and Poetic Authority in Stephen Duck's "The Thresher's Labour."" Studies in Eighteenth-Century Culture, Vol. 33 (2004), 154.

[^64]:    ${ }^{15}$ E. P. Thompson, Introduction to The Thresher's Labour (London: The Merlin Press, 1989), viii.

[^65]:    ${ }^{16}$ Eviatar Zerubavel, Hidden Rhythms: Schedules and Calendars in Social Life (London: University of California Press, 1992), 51.

[^66]:    ${ }^{17}$ William J. Christmas, The Lab'ring Muses: Work, Writing, and the Social Order in English Plebeian Poetry, 1730-1830, 82.
    ${ }^{18}$ Mark M. Smith, Mastered by the Clock: Time, Slavery, and Freedom in the American South (London: The University of North Carolina Press, 1997), 133.
    ${ }^{19}$ Stephen Duck, The Thresher's Labour (London: Merlin Press, 1989), 8.

[^67]:    ${ }^{20}$ Steven E. Jones, Satire and Romanticism (New York: St. Martin's Press, 2000), 44.
    ${ }^{21}$ Mary Collier, The Woman's Labour: An Epistle to Mr. Stephen Duck; In Answer to his late Poem, called The Thresher's Labour (London: Merlin Press, 1989), 49. Subsequent references to the edition will appear after quotations in the text.

[^68]:    ${ }^{22}$ Barbara Adam, Timewatch: The Social Analysis of Time (Cambridge: Polity Press, 1995), 95.

[^69]:    ${ }^{23}$ John Goodridge, Rural Life in Eighteenth-Century English Poetry (Cambridge: Cambridge University Press, 1995), 53.

[^70]:    ${ }^{24}$ William J. Christmas, The Lab'ring Muses: Work, Writing and the Social Order in English Plebeian Poetry, 1730-1830, 127.

[^71]:    ${ }^{25}$ Lewis Mumford, Technics and Civilization (New York, 1963), 18.
    ${ }^{26}$ Eviatar Zerubavel, Hidden Rhythms: Schedules and Calendars in Social Life, 32.

[^72]:    ${ }^{27}$ Ibid, 34.
    ${ }^{28}$ Balbir Singh Butola, 'Clocks, Watches and Timepieces: The Ace Bio-Political Tools.' Sociology Mind, Vol. 4 (2014), 16.
    ${ }^{29}$ Ibid.
    ${ }^{30}$ Ibid, 17.
    ${ }^{31}$ R. W. Symonds, A History of English Clocks (London: Penguin Books, 1947), 9.

[^73]:    ${ }^{32}$ Harold Adams Innis, The Bias of Communication (Toronto: The University of Toronto Press, 1991), 72.
    ${ }^{33}$ Alexis McCrossen, Marking Modern Times: A History of Clocks, Watches, and other Timekeepers in American Life, 127.
    ${ }^{33}$ Alain Corbin, Village Bells: Sound and Meaning in the $19^{\text {th }}$-Century French Countryside, 26.
    ${ }^{34}$ Gerhard Dohrn-van Rossum, History of the Hour: Clocks and Modern Temporal Orders, Trans. Thomas Dunlap (Chicago: The University of Chicago Press, 1996), 197.
    ${ }^{35}$ Lewis Mumford, Technics and Civilization, 13.
    ${ }^{36}$ Alexis McCrossen, Marking Modern Times: A History of Clocks, Watches, and other Timekeepers in American Life, 127.

[^74]:    ${ }^{37}$ R. Allen Brown, 'King Edward's Clocks.' Antiquaries Journal 39 (1959), 283-86.
    ${ }^{38}$ Alain Corbin, Village Bells: Sound and Meaning in the $19^{\text {th }}$-Century French Countryside, x.
    ${ }^{39}$ Until the fifteenth century clock and bell towers were not built but rather fitted into the existing church or cathedral towers but, by the eighteenth century, the craft of making turrets or church clocks had developed quickly. R. W. Symonds, A History of English Clocks, 15.
    ${ }^{40}$ Pierre de la Ruffinière Du Prey, Hawksmoor's London Churches: Architecture and Theology (Chicago: University of Chicago Press, 2000), 119.
    ${ }^{41}$ Ibid, 82.

[^75]:    ${ }^{42}$ Mark M. Smith, Mastered by the Clock: Time, Slavery, and Freedom in the American South, 63.

[^76]:    ${ }^{43}$ Jacques Le Goff, ‘Merchant's Time and Church Time in the Middle Ages', in Time, Work, and Culture in the Middle Ages, trans. Arthur Goldhammer (Chicago: University of Chicago Press, 1980), 29.
    ${ }^{44}$ Gerhard Dohrn-van Rossum, History of the Hour: Clocks and Modern Temporal Orders, 271.

[^77]:    ${ }^{45}$ Emily Cockayne notes the irony of tolling the bell to indicate curfew as: 'curfews were not intended specifically to limit noise, but this would have been an inevitable consequence marking off periods of noise from periods of relative quiet. While limiting the amount of noise, the curfew would have also created a symbolic boundary, with sounds heard during curfew arousing heightened suspicion'. Emily Cockayne, Hubbub: Filth Noise \& Stench in England 1600-1770 (London: Yale University Press, 2007), 108.
    ${ }^{46}$ E. P. Thompson, ‘Time, Work-Discipline, and Industrial Capitalism', 64.
    ${ }^{47}$ Alain Corbin, Village Bells: Sound and Meaning in the 19 ${ }^{\text {th }}$-Century French Countryside, xi.
    ${ }^{48}$ Despite the temporality dictating the rhythms of daily life Legg's work does not explicitly feature an external or visible clock; rather, the text is made up of sounds and actively reconfigures the temporality of sight to one of sound.

[^78]:    ${ }^{49}$ Carolyn Steedman, ‘Cries Unheard, Sights Unseen: Writing the Eighteenth-Century Metropolis.' Representations, Vol. 118, No. 1 (Spring., 2012), 37.
    ${ }^{50}$ Carolyn Steedman notes that in aggregate, the noisiest hours are from midnight to 1:00 a.m. on Sunday morning, noon to 1:00 p.m. on Sunday afternoon and 9:00 to 10:00 on Sunday evening. The quietist hours are from 3:00 to 4:00 a.m. on Sunday morning and from 2:00 to 3:00 p.m. on Sunday afternoon. Ibid, 43.
    ${ }^{51}$ Thomas Legg, Low-life: Or, One Half of the World, Knows not how The Other Half Lives (London, 1750), 20. Subsequent references to the edition will appear after quotations in the text.
    ${ }^{52}$ In contrast to the Watchmen's low pay affecting the telling of time, the wealthy could equally influence public time-telling. Emily Cockayne highlights how an ailing Lady Arabella Howard was able to strike a deal to 'stay the ringing of the five o'clock Bell' from her local church in Hammersmith. She was able to 'purchase her Quiet' and therefore silence time. Emily Cockayne, Hubbub: Filth, Noise \& Stench in England, 1600-1770, 113.

[^79]:    ${ }^{53}$ Carolyn Steedman, ‘Cries Unheard, Sights Unseen: Writing the Eighteenth-Century Metropolis', 46.

[^80]:    ${ }^{54}$ Alain Corbin, Village Bells: Sound and Meaning in the $19^{\text {th }}$-Century French Countryside, 11. ${ }^{55}$ Thomas Legg, Low-life: Or, One Half of the World, Knows not how The Other Half Lives (1750), v.

[^81]:    ${ }^{56}$ Sean Shesgreen, Images of the Outcast: The Urban Poor in the cries of London (Manchester: Manchester University Press, 1988), 112.
    ${ }^{57}$ Charles Knight, London: Vol. 1 (London: Charles Knight \& Co., Ludgate Street, 1841), 140.

[^82]:    ${ }^{58}$ Ibid.
    ${ }^{59}$ John Nichols and George Steevens, Biographical Anecdotes of William Hogarth (London: J. Nichols, 1781), 213-214.
    ${ }^{60}$ Sean Shesgreen, Images of the Outcast: The Urban Poor in the cries of London, 110.

[^83]:    ${ }^{61}$ Ibid.
    ${ }^{62}$ Ibid, 103.

[^84]:    ${ }^{63}$ Joseph Addison, The Spectator, No. 44, Friday, April 20, 1711, 164.
    ${ }^{64}$ Thomas Otway, Venice Preserv'd (Taken from Representative English Dramas from Dryden to Sheriden (New York: Oxford University Press, 1914), 90. Subsequent references to the edition will appear after the quotations in the text.

[^85]:    65 'The Cottage Girl written on Midsummer-Eve' (1786). Taken from Poems, chiefly by gentlemen of Devonshire and Cornwall in two volumes; In two volumes. Vol. 2, ed. Richard Polwhele (London: Fletcher, Oxford, and Merrill, 1792), 107. Subsequent references to the edition will appear after quotations in the text.
    ${ }^{66}$ William Hone, The every-day book: or, The Guide to the Year: Relating the Popular Amusements, Sports, Ceremonies, Manners, Customs, and Events, Volume 2 (London: Ward, 1825), 851.

[^86]:    ${ }^{67}$ Percival Price, Bells and Man (Oxford: Oxford University Press, 1983), 174.
    ${ }^{68}$ Ibid, 174.
    ${ }^{69}$ Raymond Murray Schafer, The Soundscape: Our Sonic Environment and the Tuning of the World (Rochester: Destiny Books, 1994), 76.
    ${ }^{70}$ Alain Corbin, Village Bells: Sound and Meaning in the $19^{\text {th }}$-Century French Countryside, 290.

[^87]:    ${ }^{71}$ Daniel Defoe, A Tour Thro' the Island of Great Britain: Divided into Circuits or Journies, Volume 1 (London, 1778), 395.
    ${ }^{72}$ Daniel Defoe, A Tour Through the Island of Great Britain: Divided into Circuits or Journies. Volume 3 (London, 1778), 501. Subsequent references to the edition will appear after the quotations in the text.
    ${ }^{73}$ David Trotter, Circulation: Defoe, Dickens, and the Economics of the Novel (London: The Macmillan Press, 1988), 1.

[^88]:    ${ }^{74}$ David Bindman, Hogarth and his Times (Berkeley: University of California Press, 1997), 99.
    ${ }^{75}$ Lawrence Wright, Clockwork Man (New York: Horizon, 1969), 109.

[^89]:    ${ }^{76}$ Sean Shesgreen, Hogarth and the Times-of-the-Day Tradition (London: Cornell University Press, 1983), 115.

[^90]:    ${ }^{77}$ Markman Ellis, The Coffee House: A Cultural History (London: Weidenfeld \& Nicolson, 2004), 112.
    ${ }^{78}$ Mark Hallett, 'The view across the city: William Hogarth and the visual culture of eighteenthcentury London', in Hogarth: Representing Nature's Machines, ed. David Bindman, Frederic Ogee and Peter Wagner (Manchester: Manchester University Press, 2001), 148.
    ${ }^{79}$ Christine Riding, Hogarth (London: Tate publishing, 2007), 119.

[^91]:    ${ }^{80}$ Rev. James Barber, Tom K---g's: of, the Paphian grove. With the Various Humours of Covent Garden, the theatre, $L---d M$-ton's, \&c. A mock-heroic-poem in three cantos (London: J. Robinson 1738), 6.

[^92]:    ${ }^{81}$ Lawrence Wright, Clockwork Man, 109.
    ${ }^{82}$ James Boswell, The Life of Samuel Johnson, LL. D.: Comprehending an Account of His Studies and Numerous Works in Chronological Order (London: Routledge, Warne and Routledge, 1791), 495.

[^93]:    ${ }^{83}$ Tom King, Tom King's; or, the Paphian Grove. With the various Humours of Covent Garden (London, 1738), 6.
    ${ }^{84}$ Peter Quennell, Hogarth's Progress (New York: Viking, 1955), 149.
    ${ }^{85}$ Industrial Revolution: People and Perspectives, ed. Jennifer L. Goloboy (California: ABCCLIO, Inc. 2008), xi.
    ${ }^{86}$ Lewis Mumford, Technics and Civilization, 269.

[^94]:    ${ }^{87}$ David S. Landes, The Unbound Prometheus: Technological change and industrial development in Western Europe from 1750 to the present (London: Cambridge University Press, 1969), 3. ${ }^{88}$ Jenny Uglow, The Lunar Men: The Friends who made the Future, 1730-1810 (London: Faber and Faber, 2002), 68.

[^95]:    ${ }^{89}$ Barrie Trinder, The Making of the Industrial Landscape (London: Phoenix, 1997), 83.
    ${ }^{90}$ Raymond Williams, The Country and the City (London: The Hogarth Press, 1985), 106.
    ${ }^{91}$ Ibid, 106.

[^96]:    ${ }^{92}$ Gerhard Dohrn-van Rossum, History of the Hour: Clocks and Modern Temporal Orders, 289.
    ${ }^{93}$ Herman Freudenberger and Gaylord Cummins, 'Health, Work and Leisure before the Industrial Revolution.' Explorations in Economic History, 13 (1976), 6. Note: only male workers were included in the study, as Maxine Berg points out: 'The production system became more capital intensive and more exclusively orientated to the requirements of full-time male workers'. Maxine Berg, The Age of Manufactures, 1700-1820 (Oxford, 1986), 160.
    ${ }^{94}$ Max Weber, The Protestant Ethic and the Spirit of Capitalism, trans. Stephen Kaleberg (Oxford: Oxford University Press, 2011), 94.
    ${ }^{95}$ Roy Porter, English Society in the Eighteenth Century (London: Penguin Books, 1990), 195.

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    ${ }^{97}$ E. P. Thompson, 'Time, Work-Discipline, and Industrial Capitalism', 86.

[^98]:    ${ }^{98}$ William Wordsworth, The Prelude (London, 1805), book v, II, 377-383. Subsequent references to the edition will appear after the quotations in the text.

[^99]:    ${ }^{99}$ David S. Landes, The Unbound Prometheus: Technological Change and Industrial Development in Western Europe from 1750 to the Present, 43. See also David S. Landes, Revolution in Time: Clocks and the Making of the Modern World (Cambridge: Harvard University Press, 1983), 229, where it is argued the de-personified clock becomes a lock.

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    ${ }^{101}$ Nigel Thrift, 'The Making of a Capitalist Time Consciousness', in The Sociology of Time, ed. John Hassard (London: The Macmillan Press Ltd, 1990), 115.

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    ${ }^{103}$ Paul Blyton, Changes in Working Time: An International Review (New York: Routledge, 2014), 1.
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[^102]:    ${ }^{105}$ Alexis McCrossen, 'The 'Very Delicate Construction' of Pocket Watches and Time Consciousness in the Nineteenth-Century United States.' Winterhur Portfolio, Vol. 44, No. 1 (Spring, 2010), 8.

[^103]:    ${ }^{106}$ Jenny Uglow, The Lunar Men: The Friends who made the Future, 1730-1810, xvii.
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[^104]:    ${ }^{108}$ Alexis McCrossen, Marking Modern Times: A History of Clocks, Watches, and other Timekeepers in American Life, 115.
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    ${ }^{8}$ Ibid, 39.
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[^131]:    ${ }^{63}$ George E. Haggerty, 'Female Abjection in Inchbald's A Simple Story', 661.

[^132]:    ${ }^{64}$ Lewis Mumford, Technics and Civilization (London: Routledge \& Kegan Paul LTD, 1934), 14.

[^133]:    ${ }^{65}$ Karen Harvey, The Little Republic: Masculinity and Domestic Authority in Eighteenth-Century Britain, 7.
    ${ }^{66}$ Peter Earle, Sailors. English Merchant Seamen 1650-1775 (London: Methuen, 1998), 8.
    ${ }^{67}$ Paul Glennie and Nigel Thrift, Shaping the Day: A History of Timekeeping in England and Wales 1300-1800 (Oxford: Oxford University Press, 2011), 307.

[^134]:    ${ }^{68}$ Marcus Rediker, Between the Devil and the Deep Blue Sea: Merchant Seamen, Pirates and the Anglo-American Maritime World, 1700-1750 (Cambridge: Cambridge University Press, 1987), 84.
    ${ }^{69}$ Brian Lavery, Nelson's Navy: The Ships, Men and Organisation, 1793-1815 (London: Conway Maritime Press, 1989), 200.
    ${ }^{70}$ Dudley Pope, Life in Nelson's Navy (Cornwall: Stratus Books Ltd, 1981), 143.
    ${ }^{71}$ Paul Glennie and Nigel Thrift, Shaping the Day: A History of Timekeeping in England and Wales 1300-1800, 84.

[^135]:    ${ }^{72}$ The ownership of pocket timepieces among sailors and officers was shown in Old Bailey archives; records show that between 1749 and 1799 more than 53 plebeian owners of stolen watches in the Northern Assize depositions were involved in working trades. Out of the 53, robbers targeted seamen the most with nine devices stolen.

[^136]:    ${ }^{73}$ Brian Lavery, Nelson's Navy: The Ship, Men and Organisation, 1793-1815, 200.

[^137]:    ${ }^{74}$ Paul Glennie and Nigel Thrift, Shaping the Day: A History of Timekeeping in England and Wales 1300-1800, 294.

[^138]:    ${ }^{1}$ David S. Landes, Revolution in Time: Clocks and the Making of the Modern World (Cambridge: Harvard University Press, 1983), 231.
    ${ }^{2}$ Hans-Joachim Voth, Time and Work in Eighteenth Century England (Oxford: Oxford University Press, 2001), 51.
    ${ }^{3}$ David S. Landes, Revolution in Time: Clocks and the Making of the Modern World, 92.

[^139]:    ${ }^{4}$ Laurence Fontaine, 'The Circulation of Luxury Goods in Eighteenth-Century Paris: Social Redistribution and an Alternative Currency', in Luxury in the Eighteenth Century: Debates, Desires and Delectable Goods, ed. Maxine Berg and Elizabeth Eger (New York: Palgrave Macmillan, 2003), 89-90.
    ${ }^{5}$ Louis-Sebastian Mercier, Tableau de Paris, ed. Jean-Claude Bonnet (Paris, 1994), 1088.

[^140]:    ${ }^{6}$ Thorstein Veblen, The Theory of the Leisure Class (Oxford: Oxford World’s Classic, 2009), 111.

[^141]:    ${ }^{7}$ Daniel Defoe, The Fortunes and Misfortunes of the Famous Moll Flanders, \&c. (London: W. W. Norton \& Company, 2004), 10. Subsequent references to the edition will appear after the quotations in the text.

[^142]:    ${ }^{8}$ Amit Yahav, 'Time, Duration, and Defoe's Novels.' Partial Answers: Journal of Literature and the History of Ideas, Vol. 6, No. 1 (Jan., 2008), 49.
    ${ }^{9}$ Ibid, 50.

[^143]:    ${ }^{10}$ Ibid.

[^144]:    ${ }^{11}$ Shani D’Cruze and Louise A. Jackson, Women, Crime and Justice in England since 1660 (New York: Palgrave Macmillan, 2009), 30.

[^145]:    ${ }^{12}$ It can be contended that the authenticity of this affection is somewhat undermined by the dubious origins of the watch.
    ${ }^{13}$ Denis Donoghue, ‘The values of Moll Flanders.' The Sewanee Review, Vol. 71, No. 2 (Spring, 1963), 296.
    ${ }^{14}$ Ann Louise Kibbie, 'Monstrous Generation: The Birth of Capital in Defoe’s Moll Flanders and Roxana.' PMLA, Vol. 110, No. 5 (Oct, 1995), 1027.
    ${ }^{15}$ Ellen Pollak, 'Moll Flanders, Incest and the Structure of Exchange.' The Eighteenth Century, Vol. 30, No. 1 (Spring, 1989), 503.

[^146]:    ${ }^{16}$ The invention has been ascribed to others at a much later date, but as noted by F. J. Britten, in a

[^147]:    commentary dated 1511 Johannes Coccleus accurately described a striking watch and distinctly credits its introduction to Henlein. F. J. Britten, The Antique Collector's Club edition of Old Clocks and Watches \& Their Makers (Suffolk: Baron Publishing, 1899), 71,
    ${ }^{17}$ Ibid.
    ${ }^{18}$ David S. Landes, Revolution in Time: Clocks and the making of the Modern World, 91.

[^148]:    ${ }^{19}$ The Diary of Samuel Pepys. Cited in Marcus Tomalin, The Intriguing Complications of Pocket Watches in the Literature of the Long Eighteenth Century, ed. Richard Le Gallienne (New York, 2003), 150.
    ${ }^{20}$ F. J. Britten, The Antique Collector's Club edition of Old Clocks and Watches \& Their Makers, 143.
    ${ }^{21}$ Jürgen Osterhammel notes the output of pocket watches across Europe rose from the tens of thousands in the early parts of the eighteenth century and climbed to around 400,000 units towards the latter stages with the English watch industry accounting for about half this output. Jürgen Osterhammel, The Transformation of the World: A Global History of the Nineteenth Century (Princetown: Princetown University Press, 2014), 71.

[^149]:    ${ }^{22}$ George Frederick Kunz, Early Artistic Watches (1895), 315.
    ${ }^{23}$ F. J. Britten, The Antique Collector's Club edition of Old Clocks and Watches \& Their Makers, 76-77.

[^150]:    ${ }^{24}$ David S. Landes, Revolution in Time: Clocks and the making of the Modern World, 89.
    ${ }^{25}$ Ibid, 102.

[^151]:    ${ }^{26}$ John Gay, The Beggar's Opera (London: Penguin Books, 1986), 39. Subsequent references to the edition will appear after quotations in the text.

[^152]:    ${ }^{27}$ There was a certain irony in this description as Mrs Peachum asked Filch, 'Where was your post last night, my boy?' (51) to which he replied, 'I plied at the opera, madam' (51). This was an acknowledgment of the opera typically being a spectacle of the upper ranks of London, a clientele that would consist of many watch-wearing individuals, and a nod toward the audience to keep their timepieces safe.

[^153]:    ${ }^{28}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011), Feb 1734, trial of William Collins (t17340227-55).
    ${ }^{29}$ John Carl Flugel, The Psychology of Clothes (London: Hogarth Press, 1930), 33.
    ${ }^{30}$ Laurence Fontaine, 'The Circulation of Luxury Goods in Eighteenth-Century Paris: Social Redistribution and an Alternative Currency', 97.

[^154]:    ${ }^{31}$ Lynn Sorge-English, Stays and Body Image in London: The Staymaking Trade, 1680-1810 (The Body, Gender and Culture) (New York: Routledge, 2016), 169-170.

[^155]:    ${ }^{32}$ Applebee's Original Weekly Journal, 24 Feb. Cited in J. M. Beattie, Crime and the Courts in England, 1660-1800 (Oxford: Clarendon Press, 1986), 217.
    ${ }^{33}$ John Styles, The Dress of the People: Everyday Fashion in Eighteenth-Century England (New Haven: Yale University Press, 2008), 97.
    ${ }^{34}$ Similar to the repeater watch, striking mechanisms hit a bell incorporated in the watchcase each hour. Later models would strike each hour individually.
    ${ }^{35}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011), Dec 1707, trial of Joseph Montisano and William Tavis (t17071210-6).
    ${ }^{36}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011), January 1707, trial of Elizabeth Clemtree (t17070115-9).

[^156]:    ${ }^{37}$ Hannah Greig, Beau Monde: Fashionable Society in Georgian London (Oxford: Oxford University Press, 2013), 227.
    ${ }^{38}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011), Aug 1725, trial of Hestor Gregory (t17250827-63).
    ${ }^{39}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011), January 1785, trial of John Stafford English (t17850112-85).

[^157]:    ${ }^{40}$ Christine Riding, Hogarth (London: Tate Publishing, 2006), 181.
    ${ }^{41}$ Ibid.
    ${ }^{42}$ During the century Old Bailey records show male defendants committed 46,505 pocket watch related crimes compared to 10,817 female defendants.
    ${ }^{43}$ Paula R. Backscheider, 'The Crime Wave and Moll Flanders', in Daniel Defoe, Moll Flanders (London: W. W. Norton \& Company, 2004), 465.

[^158]:    ${ }^{44}$ Jennie Batchelor, Dress, Distress and Desire: Clothing and the Female Body in EighteenthCentury Literature (New York: Palgrave Macmillan, 2004), 3.
    ${ }^{45}$ Jenny Uglow, William Hogarth: A Life and a World (New York: Faber and Faber, 2010), 359.

[^159]:    ${ }^{46}$ Caitlin Blackwell, John Collet, A Commercial Comic Artist, PhD, University of York (December 2013), 177.

[^160]:    ${ }^{47}$ Ibid.
    48 'Members of law enforcement, like night watchmen, were more routinely cast as negative figures in contemporary popular culture. Before the existence of an organised police force in England, crime prevention and apprehension were carried out by a combination of low-level civil servants, volunteer constables, and civilian thief-takers, who would assist in solving petty crime for a fee. Because they were usually poorly paid (or not paid at all) and deeply enmeshed in the city's criminal underworld, these men were widely believed to be motivated by bribes and rewards, rather than by peace and justice'. Ibid, 179.

[^161]:    ${ }^{49}$ Christine Riding, Hogarth, 81.

[^162]:    ${ }^{50}$ David Kuchta, The Three Piece Suit and Modern Masculinity: England 1550-1850 (Studies on the History of Society \& Culture) (Berkley: University of California Press, 2002), 4.
    ${ }^{51}$ Jane Tynan, 'Power Dressing: on fashion and regulation clothing.' Vestoj, The Journal of Sartorial Matters, No. 4 (2013), 35.
    52 John H. Plumb, In the Light of History (London, Allen Lane, 1972), 190.

[^163]:    ${ }^{53}$ John Carl Flugel, The Psychology of Clothes, 111.
    ${ }^{54}$ Gilles Lipovetsky, Empire of Fashion: Dressing Modern Democracy (Princeton: Princeton University Press, 1994), 26-27.
    ${ }^{55}$ John Styles, The Dress of the People: Everyday Fashion in Eighteenth-Century England, 190.
    ${ }^{56}$ Gilles Lipovetsky, Empire of Fashion: Dressing Modern Democracy, 26-27.
    ${ }^{57}$ Beverly Lemire, Fashion's Favourite: The Cotton Trade and the Consumer in Britain, 16601800 (Oxford: Oxford University Press, 1991), 161.

[^164]:    ${ }^{58}$ John Carl Flugel, The Psychology of Clothes, 111.
    ${ }^{59}$ Anne Buck notes the carrying of a weapon in eighteenth century society is mainly for sartorial purposes only, as in the case of Dudley Rider, who, 'bought a sword of silver gilt which cost $£ 3$. 4s without the blade'. Anne Buck, Dress in Eighteenth Century England (London: B. T. Batsford Ltd, 1979), 88.
    ${ }^{60}$ Philip Dormer Stanhope, The Letters of Philip Dormer Stanhope, Earl of Chesterfield, ed. Lord Mahon (Philadelphia: Lippincott, 1892), 285.
    ${ }^{61}$ Old Bailey Proceedings Online (www.oldbaileyonline.org, version 6.0, 17 April 2011),
    February 1787, trial of James Johnson and Sarah York (t17870221-89)

[^165]:    ${ }^{62}$ In her work The Birth of a Consumer Society: The Commercialization of Eighteenth-Century England, Neil Mckendrick comments that in times past the extravagance of dress served important social and political functions; 'rich clothes, fine furs and precious gems, for instance, could mark the divinity of a king, and radiate the splendour and standing of his court. They could underline the exclusive status of the nobility'. Neil McKendrick, John Brewer and J. H. Plumb. The Birth of a Consumer Society: The Commercialization of Eighteenth-Century England (London: Hutchinson \& Co. Ltd), 1.

[^166]:    ${ }^{63}$ Philip Dormer Stanhope, The Letters of Philip Dormer Stanhope, Earl of Chesterfield, 285.

[^167]:    ${ }^{64}$ Ernst Harms, ‘The Psychology of Clothes.' American Journal of Sociology, Vol. 44, No. 2 (Sep., 1938, University of Chicago Press), 243.
    ${ }^{65}$ John Carl Flugel, The Psychology of Clothes, 33.
    ${ }^{66}$ Mary Meeke, The Sicilian, A novel in four volumes (Vol. 2, 1798), 1. Subsequent references to the edition will appear after the quotations in the text.

[^168]:    ${ }^{67}$ Ginette Emprin, ‘Appearance and Reality in Gulliver's Travels.' Irish Studies, Vol. 15, No. 1, (1990), 42.
    ${ }^{68}$ Ibid.

[^169]:    ${ }^{69}$ Thorsten Veblen, The Theory of the Leisure Class, 169.
    ${ }^{70}$ Jennie Batchelor, Dress, Distress and Desire: Clothing and the Female Body in EighteenthCentury Literature, 2.

[^170]:    ${ }^{71}$ Francis Nivelon, The Rudiments of Genteel Behaviour (1737), 1.
    ${ }^{72}$ Ibid, C.
    ${ }^{73}$ Ibid, E.

[^171]:    ${ }^{74}$ John Styles, The Dress of the People: Everyday Fashion in Eighteenth-Century England, 181.

[^172]:    ${ }^{75}$ Steven J. Gores, Psychosocial Spaces: Verbal and Visual Readings of British Culture, 17501820 (Detroit: Wayne State University Press, 1999), 50.
    ${ }^{76}$ Frances Burney, Evelina: Or the History of a Young Lady's Entrance into the World (Oxford: Oxford University Press, 2002), 40. Subsequent references to the edition will appear after the quotations in the text.
    ${ }^{77}$ John Styles, The Dress of the People: Everyday Fashion in Eighteenth-Century England, 193.
    ${ }^{78}$ Faramerz Dabhoiwala, 'The Construction of Honour, Reputation and Status in Late Seventeenth and Early Eighteenth Century England.' Transactions of the Royal Historical Society, 6 (1996). Cited in Shani D'Cruze and Louise A. Jackson, Women, Crime and Justice in England since 1660, 42.

[^173]:    ${ }^{79}$ Jennie Batchelor, Dress, Distress and Desire: Clothing and the Female Body in EighteenthCentury Literature, 3.
    ${ }^{80}$ Faramerz Dabhoiwala, The Origins of Sex: A History of the First Sexual Revolution (Oxford: Oxford University Press, 2012), 291-292.
    ${ }^{81}$ Ibid, 292.

[^174]:    ${ }^{82}$ Hannah More, 'Sensibility: A Poetic Epistle to the Honorable Mrs Boscawen', in Sacred Dramas: Chiefly Intended for Young Persons: The Subjects Taken from the Bible. To Which is Added Sensibility, A Poem (London: T. Cadell, 1782), 283-284.

[^175]:    ${ }^{83}$ Private collection of William Hallett, Seacliff, NY, 2011: Last will and testament of William Hallett Sr.
    ${ }^{84}$ The picture indicates that some women's fashion was defined by the honor of their presiding male. In response to this Daniel Defoe wrote his satiric verse, The London Ladies Dressing Room: or, The Shopkeepers Wives Inventor (1705), which cautions his male readers against the perceived rapacity of some English women. Furthermore, he advised his readers to be very judicious in their selection of a spouse, for by doing so they would be spared the expense of providing their loved ones with the endless array of trinkets, which include lockets, muffs, lace, ribbons, scarves and watches, as well as the endless essential and ever changing clothes Defoe lists in his commentary. Beverly Lemire, ‘The Theft of Clothes and Popular Consumerism in Early Modern England.' Journal of Social History, Vol. 24, No. 2 (Winter, 1990), 256.

[^176]:    ${ }^{85}$ Igor Kopytoff, The Cultural Biography of Things: Commoditization as Process (Cambridge: Cambridge University Press, 1986), 12.
    ${ }^{86}$ Liz Bellamy, 'Britannia's Rule and the It-Narrator', in The Secret Life of Things: Animals, Objects, and It-Narratives in Eighteenth-Century England, ed. Mark Blackwell (Lewisburg: Bucknell University Press, 2007), 118.
    ${ }^{87}$ Anonymous, The Adventures of a Watch! (London: G. Kearsley, 1788), 2. Subsequent references to the edition will appear after the quotations in the text.
    ${ }^{88}$ Mark Blackwell, 'Hackwork: It-Narratives and Iteration', in The Secret Life of Things: Animals, Objects, and It-Narratives in Eighteenth-Century England, ed. Mark Blackwell (Lewisburg: Bucknell University Press, 2007), 210.

[^177]:    ${ }^{89}$ Despite the valuation Lord Flimsey would only set 'fifty pieces against it' (17) in the wager.

[^178]:    ${ }^{90}$ Aileen Douglas, 'Britannia’s Rule and the It-Narrator', in The Secret Life of Things: Animals, Objects, and It-Narratives in Eighteenth-Century England, ed. Mark Blackwell (Lewisburg: Bucknell University Press, 2007), 152.
    ${ }^{91}$ Ibid, 151.

[^179]:    ${ }^{92}$ Between 1793 and 1798, 90\% of Britain's expenditure was supported by loans.
    ${ }^{93}$ E. P. Thompson, 'Time, Work-Discipline, and Industrial Capitalism.' Past and Present, No. 38 (Dec., 1967), 67.

[^180]:    ${ }^{94}$ Morning Chronicle, I July 1797; Craftsman, 8 July 1797; Parl. Hist., xxxiii, passim. Cited in Ibid, 68.

[^181]:    ${ }^{95}$ Peter Wagner, 'Representations of time in Hogarth's paintings and engravings', in Hogarth: Representing Nature's Machines, ed. Frederic Ogee, David Bindman and Peter Wagner (Manchester: Manchester University Press, 2001), 108.
    ${ }^{96}$ Neil McKendrick, John Brewer and J. H. Plumb. The Birth of a Consumer Society: The
    Commercialization of Eighteenth-Century England, 2.

[^182]:    ${ }^{1}$ Luchien Karsten, Globalization and Time (New York: Routledge, 2013), 15.

[^183]:    ${ }^{2}$ Dror Wahrman, 'Public opinion, violence and the limits of constitutional politics', in Rereading the Constitution: New Narratives in the Political History of England's Long Nineteenth Century, ed. James Vernon (Cambridge: Cambridge University Press, 1996), 85.

[^184]:    ${ }^{3}$ Cruikshank could also be indicating that the on-going compulsion with clock time and the timepiece, as I have identified previously, could be harnessed for reformist and radical campaigns.
    ${ }^{4}$ William Hazlitt, Sketches and Essays (London: Oxford University Press, 1839), 54. Subsequent references to the edition will appear after the quotations in the text.

[^185]:    ${ }^{5}$ Leo Damrosch, Jean-Jacques Rousseau: Restless Genius (New York: Houghton Mifflin Company, 2007), 222.

[^186]:    ${ }^{6}$ Thomas Bender, Rethinking American History in a Global Age (New York: Columbia University Press, 1983), 149.

[^187]:    ${ }^{7}$ Paul Glennie and Nigel Thrift, Shaping the Day: A History of Timekeeping in England and Wales 1300-1800 (Oxford: Oxford University Press, 2011), 26.
    ${ }^{8}$ Lewis Mumford, Technics and Civilization (London: Routledge \& Kegan Paul Ltd, 1934), 326.

