"A Life at Hard Labor": Capitalism and Working Hours

The labouring man will take his rest long in the morning; a good piece of the day is spent afore he come at his work; then he must have his breakfast, though he have not earned it, at his accustomed hour, or else there is grudging and murmuring: when the clock smiteth, he will cast down his burden in the midway, and whatsoever he is in hand with, he will leave it as it is, though many times it is marred afore he come again; he may not lose his meat, what danger soever the work is in. At noon he must have his sleeping time, then his bever in the afternoon, which spendeth a great part of the day; and when his hour cometh at night, at the first stroke of the clock he casteth down his tools, leaveth his work, in what need or case soever the work standeth.

—the Bishop Pilkington

One of capitalism's most durable myths is that it has reduced human toil. This myth is typically defended by a comparison of the modern forty-hour week with its seventy- or eighty-hour counterpart in the nineteenth century. The implicit—but rarely articulated—assumption is that the eighty-hour standard has prevailed for centuries. The comparison conjures up the dreary life of
medieval peasants, toiling steadily from dawn to dusk. We are asked to imagine the journeyman artisan in a cold, damp garret, rising even before the sun, laboring by candlelight late into the night.1

These images are backward projections of modern work patterns. And they are false. Before capitalism, most people did not work very long hours at all. The tempo of life was slow, even leisurely: the pace of work relaxed. Our ancestors may not have been rich, but they had an abundance of leisure. When capitalism raised their incomes, it also took away their time.2 Indeed, there is good reason to believe that working hours in the mid-nineteenth century constitute the most prodigious work effort in the entire history of humankind.

Therefore, we must take a longer view and look back not just one hundred years, but three or four, even six or seven hundred. Admittedly, there is a certain awkwardness in this exercise. Such calculations are by necessity rough. Since there are no comprehensive, average figures for any time but the recent past, we must use individual estimates for various types of workers, as well as data representing the typical, rather than average, working day and working year. Also, in medieval times the information that does exist is mainly for men. Descriptions of women's household labors are available, but, to my knowledge, there are no estimates of the amount of time women spent doing them. (As I argue in chapter 4, the demands of domestic work have been variable over time.) The greater regularity of women's tasks (cooking, animal husbandry, care of children) suggests their workyear was more continuous, and therefore longer in total, than the male workyear; but we have no direct evidence on this. The other caveat is that because no medieval estimates are possible for America, I have oriented this part of my discussion to Western Europe and mainly England. (For a discussion of "why England?" see the notes.) Despite these shortcomings, the available evidence indicates that working hours under capitalism, at their peak, increased by more than 50 percent over what they had been in medieval times (see figure 3.1).3

Consider a typical working day in the medieval period. It stretched from dawn to dusk (sixteen hours in summer and eight in winter), but, as the Bishop Pilkington has noted, work was

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2Calculated from Gregory Clark's estimate of 150 days per family, assumes 12 hours per day. 135 days per year for adult male ("Impatience, Poverty, and Open Field Agriculture," mimeo, 1986).


5Author's estimate of average medieval laborer working two-thirds of the year at 9.5 hours per day.


7Average worker in the United Kingdom, assumes 52-week year, 69 hours per week (weekly hours from ibid.).


9Average worker in the United States, assumes 52-week year, 70 hours per week (weekly hours from ibid.).

10From table 2.4.

intermittent—called to a halt for breakfast, lunch, the customary afternoon nap, and dinner. Depending on time and place, there were also midmorning and midafternoon refreshment breaks. These rest periods were the traditional rights of laborers, which they enjoyed even during peak harvest times. During slack periods, which accounted for a large part of the year, adherence to regular working hours was not unusual. According to Oxford Professor James E. Thorold Rogers, the medieval workday was not more than eight hours. The worker participating in the eight-hour movements of the late nineteenth century was “simply striving to recover what his ancestor worked by four or five centuries ago.”

The pace of work was also far below modern standards—in part, because the general pace of life in medieval society was leisurely. The French historian Jacques LeGoff has described precapitalist labor time “as still the time of an economy dominated by agrarian rhythms, free of haste, careless of exactitude, unconcerned by productivity—and of a society created in the image of that economy, sober and modest, without enormous appetites, undemanding, and incapable of quantitative efforts.” Consciousness of time was radically different. Temporal units we take for granted today—such as the hour, or the minute—did not exist. There was little idea of time saving, punctuality, or even a clear perception of past and future. Consciousness of time was much looser—and time had much less economic value.

But the pace of work was slow not only for cultural reasons. On the basis of our knowledge of caloric intake, we can infer that work had to have been a low-energy affair. The food consumption of all but the rich was inadequate to sustain either a rapid pace or continuous toil. (This may be why lords provided substantial meals to laborers during harvests.) A long, hard day of agricultural labor requires well over three thousand calories per day, an amount out of the range of common people. As more food became available over the nineteenth and twentieth centuries, a significant fraction of those additional calories have been burned up by an accelerated pace of work.

The contrast between capitalist and precapitalist work patterns is most striking in respect to the working year. The medieval calendar was filled with holidays. Official—that is, church—holidays in-

cluded not only long “vacations” at Christmas, Easter, and midsummer but also numerous saints’ and rest days. These were spent both in sober churchgoing and in feasting, drinking, and merrymaking. In addition to official celebrations, there were often weeks’ worth of ales—to mark important life events (bride ales or wake ales) as well as less momentous occasions (scot ale, lamb ale, and hock ale). All told, holiday leisure time in medieval England took up probably about one-third of the year. And the English were apparently working harder than their neighbors. The **ancien régime** in France is reported to have guaranteed fifty-two Sundays, ninety rest days, and thirty-eight holidays. In Spain, travelers noted that holidays totaled five months per year.

The peasant’s free time extended beyond officially sanctioned holidays. There is considerable evidence of what economists call the backward-bending supply curve of labor—the idea that when wages rise, workers supply less labor. During one period of unusually high wages (the late fourteenth century), many laborers refused to work “by the year or the half year or by any of the usual terms but only by the day.” And they worked only as many days as were necessary to earn their customary income—which in this case amounted to about 120 a year, for a probable total of only 1,440 hours annually (this estimate assumes a 12-hour day because the days worked were probably during spring, summer, and fall). A thirteenth-century estimate finds that whole peasant families did not put in more than 150 days per year on their land. Manorial records from fourteenth-century England indicate an extremely short working year—175 days—for servile laborers. Later evidence for farmer-miners, a group with control over their worktime, indicates they worked only 180 days a year.

The short workweek reveals an important feature of precapitalist society: the absence of a culture of consumption and accumulation. There was far less interest in and opportunity for earning or saving money. Material success was not yet invested with the overriding significance it would assume. And consumerism was limited—both by the unavailability of goods and by the absence of a middle class with discretionary income. Under these circumstances, the lack of compulsion to work is understandable. Of course, those who object to this characterization argue that free time in the
middle ages was not really leisure but underemployment. If work effort was low, they claim it is because the economy provided few opportunities for earning money.

What are we to make of these claims? It is certainly true that holidays were interspersed throughout the agrarian calendar, falling after the peak periods of planting, sowing, and harvesting. And in both agriculture and industry, the possibilities for earning additional income were limited. Yet cause and effect are hard to untangle. If more work had been available, it is not obvious that many people would have taken it. The English case provides considerable evidence that higher incomes led to less not more labor—for example, the casual laborers of the thirteenth century, the farmer-miners of the sixteenth, and even the early industrial workers who resisted work whenever their incomes allowed it. Just after wages were paid, as employers learned, absenteeism, failure to work, and much-decried "laziness" resulted. But wherever one stands on the causes of medieval leisure, one fact remains: steady employment, for fifty-two weeks a year is a modern invention. Before the nineteenth—and, in many cases, the twentieth—century, labor patterns were seasonal, intermittent, and irregular.10

The argument I will be making is that capitalism created strong incentives for employers to keep hours long. In the early stages, these incentives took the form of a fixed wage that did not vary with hours. In the twentieth century, this incentive would reappear in the guise of the fixed annual salary, which proved to be a major reason for the white-collar worker's long hours. Other incentives also came into play by the end of the nineteenth century, such as employers' desires to keep machinery operating continuously, and the beneficial effects of long hours on workplace discipline. Later, peculiarities in the payment of fringe benefits would have an impact. Each of these factors has been important in keeping hours long. Of course, there have been countervailing pressures, the most important of which was the trade union movement, which waged a successful hundred-year struggle for shorter hours. But once this quest ended after the Second World War, reductions in hours virtually ceased. Not long after unions gave up the fight, the American worker's hours began to rise.

Capitalism steadily eroded the leisure that pervaded medieval society. Telltale signs—in the form of modern conflicts over time—appeared in at least one "capitalist" enclave as early as the fourteenth century, when the textile industry was faced with an economic crisis. The first response of the cloth makers to this crisis was predictable: they announced reductions in wages. But they also tried something new: the imposition of a longer, "harsher" working day. To enforce this new regime, employers introduced what historians believe are the first public clocks, which appeared in textile centers across Europe. These clocks—or *Werkglocken*, as they came to be called—signaled to workers when they should arrive at work, the timing of meals, and the close of the day. The idea was that the clock would replace the sun as the regulator of working hours. But unlike the sun, the clocks would be under the control of the employer.

As soon as the *Werkglocken* were introduced, they became objects of bitter antagonism. As they were actually not mechanical clocks but bells which were rung manually, workers, employers, and city officials vied for control of them. Workers staged uprisings to silence the clocks, fighting what the historian Jacques LeGoff has termed "the time of the cloth makers." City officials responded by protecting employers' interests. Fines were levied against workers who disobeyed the injunctions of the bells, by coming late to work or leaving early. Harsher penalties—including death—awaited those who used the bell to signal a revolt.11 Faced with the alliance of employers and state, the workers' resistance failed: and they resigned themselves to the longer hours, the higher pace of work, and the regimentation of the clocks.

The crisis of labor time in the textile industry illustrates two important points about capitalism and work. First, employers used *time* itself to regulate labor. In medieval Europe, consciousness of time was vague. The unit of labor time was the "day." It was tied to the sun and, as I have noted, tended to be approximate. Modern
time consciousness, which includes habituation to clocks, economy of time, and the ownership of time, became an important weapon which employers used against their employees. In the words of the English historian E. P. Thompson, time became "currency: it is not passed but spent." As employers consolidated control over their workforces, the day was increasingly split into two kinds of time: "owners' time, the time of work"; and "their own time, a time (in theory) for leisure." Eventually, workers came to perceive time, not as the milieu in which they lived their life, but "as an objective force within which [they] were imprisoned." 12

The second point is that working time became a crucial economic variable, profoundly affecting the ability of businesses to survive and prosper. In the textile case, the impetus of the employers to raise hours emanated from an immediate crisis in their graphically widening and fiercely competitive market. In order to earn sufficient profits to survive, employers took advantage of an intensification of labor. They learned that the market system has a structural imperative to exploit labor: those who do not succeed in raising hours of work or accelerating the pace of production may very well be driven out of business by their competitors. The rigors of the market are particularly demanding during the inevitable depressions in trade which lower prices and choke off demand for products.

As capitalism grew, it steadily lengthened worktime. The change was felt in earnest by the eighteenth century. The workday rose in the cottage industries which sprang up throughout the English countryside. Rural people, especially women, took on spinning, weaving, lacemaking, and other handicrafts, in their own cottages, in order to earn a little cash to survive. The time commitment ranged from a few hours a day for the better-off, to eight, ten, or twelve hours a day for those who were poor. And this was in addition to regular domestic responsibilities. Outside the cottage, workdays rose as employers encroached on customary periods for eating and resting. Farm laborers, hired by the day, week, or season, were subjected to tighter discipline and stricter schedules. The invention of factories, in the late eighteenth century, allowed employers to squeeze out the vestiges of precapitalist work habits. Eventually, when artificial lighting came into use, the working "day" stretched far into the night, and scheduled hours climbed.

Some workers—such as the most highly skilled, well-organized male craft workers in England—were able to withstand increases beyond the ten-hour mark. But even in some skilled trades, such as baking and potteries, the men could not hold out. In any case, skilled male workers were a minority of the workforce. The majority of laboring people, in both England and America, would eventually work longer days. Men, women, and children in home-based and factory labor, farm laborers, slaves, domestic servants, and even a large fraction of male craftsmen experienced a progressive lengthening of work hours. Twelve-, fourteen-, even sixteen-hour days were not uncommon. 13

A second change was the loss of nearly all the regular holidays medieval people had enjoyed. The Puritans launched a holy crusade against holidays, demanding that only one day a week be set aside for rest. Their cause was aided by the changing economic incentives of the market economy, particularly the growing commercialization of agriculture which resulted in more year-round activity. In the sixteenth century, the long rise in holidays was arrested; and during the seventeenth, reversed. The eighteenth saw the demise of the laborer's long-honored Saturday half-holiday. By the nineteenth century, the English agricultural laborer was working six days per week, with only Good Friday and Christmas as official time off. A similar process occurred in the United States, during the nineteenth century, as steady employment grew more common. 14

Taken together, the longer workday and the expanding work-year increased hours dramatically. Whereas I estimate a range of 1,440 to 2,300 hours per year for English peasants before the seventeenth century, a mid-nineteenth-century worker in either England or the United States might put in an annual level of between 3,150 and 3,650 hours.

Workers' progressive loss of leisure stemmed from structural imperatives within capitalism which had no counterpart in the medieval economy. The European manor survived on its own efforts, mainly consuming what it produced itself. Neither peasants nor their lords were dependent on markets for basic subsistence. They were not exposed to economic competition, nor driven by a profit motive. Their time was their own. Medieval industry was also protected from market pressures. Guilds had strictly defined hours
of work, and apparently “few conflicts arose over the time of work.” Custom, rather than competition, dictated economic activity. And custom dictated strictly limited work effort.

The growth of markets, both national and international, thrust workers out of their world of custom and into a competitive dynamic. Capitalist businesses, in contrast to medieval manors, strove for maximum profits. They lived or died by the bottom line. Time off was costly, hence bitterly resisted. Whenever one employer managed to squeeze a bit more work out of his workers, others were compelled to follow. As long as a critical mass of employers was able to demand longer hours, they could set the standard. Workers became victims in a larger-than-life struggle for financial dominance. When textile workers in Manchester lost an hour a day, the repercussions would be felt in Lancashire or maybe far across the seas in Lowell. As local outposts were knitted together into a world market, an economic relay system was created—and it operates to this day. American textile workers, who enjoy paid vacations and official five-day weeks, are rapidly losing out to their counterparts in China, where daily, weekly, and hourly schedules are far more arduous.

Given the high value medieval people placed on a leisurely way of life, why did they accede to grueling hours and the loss of their free time? The answer is straightforward. Capitalists were successful because workers lacked alternatives. In the medieval economy, peasants—whether serfs or freepersons—had secure, time-honored access to land. And land was what nearly everyone depended on for survival. Crop failures might lead to hunger or starvation, but most ordinary people retained social rights to some part of their manor’s holdings, and hence to food. They were not dependent on the market for their “subsistence.” Indeed, a “market” in land did not even exist. Custom dictated its use and disposition.

The growth of a world market led to the uprooting of the peasantry from the land that had sustained them for centuries. Lords enclosed open fields, in order to claim ownership to carry out commercial schemes. Peasants lost control over what had once been a “common treasury” from which they had derived a measure of independence. Now their survival depended on participation in the market in labor. They had become proletarians, reduced to selling time and toil. An analogous fate befell artisans, with the elimination of the more or less assured upward mobility of journeymen into masters promised by the guild system. Increasingly, masters turned themselves into small capitalists and permanently hired apprentices and journeymen. The labor practices enforced by guild traditions were jettisoned in favor of reliance on “what the market would bear.”

These changes degraded the status of many common people: “To lose control over one’s own (and one’s family’s) labour was to surrender one’s independence, security, liberty, one’s birthright.” In England, this “commodification” of labor had occurred by the seventeenth century. In the United States, the process took place much later and followed a different path; but by the mid-nineteenth century, similar pressures were operating. In the words of E. P. Thompson, “enclosure and the growing labour-surplus at the end of the eighteenth century tightened the screw for those who were in regular employment; they were faced with the alternatives of partial employment and the Poor Law, or submission to a more exacting labour discipline.” As a result, living standards were depressed, and widespread poverty developed. Observers in seventeenth-century England suggest that between a quarter and a half of the rural population lived in poverty. Many commentators maintained that poverty was necessary: “It is only hunger which can spur and goad [the poor] on to labour.” The struggle for subsistence had become the paramount fact of life for many people—and in the process, leisure time became an unaffordable luxury.

The Daily Wage and the Expansion of Worktime

The growth of a world market and the creation of a proletariat were major social developments which formed the backdrop for the rise of working hours. Specific features of the emerging labor markets also exacerbated pressures toward long hours. For example, capitalists followed the centuries-old custom of fixing wages by the day, the week, or even the month—in contrast to the modern practice of payment by the hour, which had not been introduced. The daily wage was largely invariant to hours or intensity of labor,
a worker earning neither more nor less as the working day expanded or contracted. This flexibility of working hours was a departure from past practice. On medieval manors, serfs' labor obligations to their lords were spelled out in detail, and a certain amount of effort was expected. But with the decline of serfdom, these labor obligations faded away.

The fact that daily wages were fixed gave employers a simple incentive to raise worktime: *each additional hour worked was free.* And because workers were unable to resist the upward pressure on hours, worktime rose dramatically—especially in factories in England and the United States. Marx's famous description of early factories was a harsh reality to the laborers in them: "The 'House of Terror' for paupers, only dreamed of by the capitalist mind in 1770, was brought into being a few years later in the shape of a gigantic 'workhouse' for the industrial worker himself. It was called the factory. And this time the ideal was a pale shadow compared with the reality."18

In these "Satanic mills," the custom of a fixed daily wage led the owners to extend hours of toil by whatever means they could manage. They tried "petty pilferings of minutes." They "nibbled" at mealtimes. These methods produced pure profit.19 One factory operative explained:

In reality there were no regular hours: masters and managers did with us as they liked. The clocks at the factories were often put forward in the morning and back at night, and instead of being instruments for the measurement of time, they were used as cloaks for cheating and oppression. Though this was known amongst the hands, all were afraid to speak, and a workman then was afraid to carry a watch, as it was no uncommon event to dismiss any one who presumed to know too much about the science of horology.20

Testimony of this sort was not uncommon:

We worked as long as we could see in summer time, and I could not say at what hour it was that we stopped. There was nobody but the master and the master's son who had a watch, and we did not know the time. There was one man who had a watch. . . . It was taken from him and given into the master's custody because he had told the men the time of day.21

Similar strategies were in use in the United States, where factory hours might range from seventy-five to ninety hours a week by the second quarter of the nineteenth century.22 Of course, workers did not passively accept the theft of their time. Resistance was widespread and took a variety of forms as workers acquired their own timepieces, failed to show up at work on time, or went on strike to recoup lost leisure. In a New Jersey factory, the young hands went on strike to protest the shifting of the dinner hour. One observer noted: "the children would not stand for it, for fear if they assented to this, the next thing would be to deprive them of eating at all."23 However, until the second half of the nineteenth century, factory hours in both Britain and the United States rose rather than fell. Workers' position in the market where they sold their labor was not favorable enough to win back their leisure time.

Although the state stepped in, in both countries, government legislation to limit hours was often ineffective. Factory inspectors found themselves unable to enforce the laws: "The profit to be gained by it" (over-working in violation of the [Factory] Act) 'appears to be, to many, a greater temptation than they can resist. . . . In cases where the additional time is gained by a multiplication of small thefts in the course of the day, there are insuperable difficulties to the inspectors making out a case."24

The incentives to increase hours operated in other parts of the economy as well. Servants were also paid fixed wages. Taken together, farm servants and domestics in middle-class homes made up a significant proportion of workers in both England and the United States in the second half of the nineteenth century. Servants were given room and board, plus some payment, either weekly or perhaps by the season. If their hours of work went up, they received no extra pay. It should come as no surprise, then, that their hours of work were particularly arduous. They would rise in the early hours of the morning and work until evening. The hours of domestic servants frequently expanded to fourteen or fifteen hours a day and were typically above those of factory workers. "I used to get up at four o'clock every morning, and work until ten P.M. every day of the week," recounted one Minneapolis housemaid. "Mondays and Tuesdays, when the washing and ironing was to be done," she began at 2 A.M. Time off was often minimal, as families
were reluctant to do without their “help.” In the United States, free time was one evening or half-day every week or every other week until the 1880s, after which Sundays were added. But even on a “day off,” servants were required to do an average of seven and a half hours.\(^{26}\)

Similar dynamics operated where labor was formally enslaved. Slaves in the American South received a subsistence living—meager food, clothing, and shelter, which did not vary with their hours of work. Field hands worked “every day from ‘fore daylight to almost plumb dark’”; and during picking season, lighting kept them going at night, often sixteen hours a day. One slave noted: “Work, work, work. . . . I been so exhausted working, I was like an inchworm crawling along a roof. I worked till I thought another lick would kill me.” If the owners were able to squeeze out an extra hour here or there, it was purely to their benefit. Slaves’ “wages” did not rise.\(^{26}\)

Employers (and slaveowners) managed to push working hours to the brink of human endurance because they were far more powerful than the common people they hired (or owned). They had the law on their side, to punish those who went on strike or fled the plantation. They had superior resources, to outlast a work stoppage or buy off opposition. They could also invoke the discipline of the market. When businesses are squeezed from above, workers below may find it impossible to resist. In the end, labor lost the battle over working time because it was just too dependent on capital for its very survival.


Not all workers were paid by daily rates. Where it is possible to measure an individual’s output, as in the sewing of garments or the cutting of machine tools, there can be payment by the “piece”—that is, on the basis of actual work accomplished. This form of labor contract would seem to vitiate the pressure toward long hours. In theory, the worker can choose a level of effort, and the employer can pay for only what is done. There is no obvious incentive to long hours.

Piece rates were common in the first phase of industrialization in both England and the United States. As I have noted, this phase did not take place in factories but was a small scale, low-tech affair, operating out of cottages in the countryside. Similar arrangements also developed in cities. Because the work took place in a worker’s own dwelling, this arrangement has come to be called the “putting out,” “domestic,” or “outwork” system. Workers received raw materials from a capitalist entrepreneur and returned finished goods. In both countries, the bulk of putting out was in textiles, but it was also used for other handicrafts.

Unlike the factory, where the boss or his representatives kept watch over the worker, in the putting-out system the laborer would appear to retain control over the pace and conditions of work. This is certainly the classic interpretation: after turning in finished goods and receiving their pay on Friday or Saturday, workers might spend the next few days drinking, relaxing, and working at a leisurely pace, if at all. Only on Wednesday or Thursday, as the deadline for handing in finished goods approached, did the pace of work pick up. “Whatever else the domestic system was, however intermittent and sweated its labour, it did allow a man a degree of personal liberty to indulge himself, a command over his time, which he was not to enjoy again.”\(^{27}\) In fact, this “degree of personal liberty” was enjoyed mainly by adult men and mainly in the early days of the system. The system’s freedom was illusory. Eventually piece rates would spawn a rise in work effort even more prodigious than that engendered by the factory.

Piece rates led to long hours partly because the rates were set so low. These low rates had a variety of causes. For one thing, the system was dominated by women, whose pay has always been low. A second factor was that there were virtually no barriers to participating in putting out: there was little capital, and materials were advanced by the capitalist “putters-out.” With so many people involved, the putters-out could easily reduce rates. Finally, the structure of these industries has typically been highly competitive, often leaving the capitalist with a small profit margin. Margins were frequently squeezed during downturns in trade, and rates cut to compensate.

For the many piece-rate workers who were perched perilously close to the line between survival and starvation, work was a
veritable imperative. The historian J. D. Chambers has provided an apt description of an English village swept up in the system: "They knitted as they walked the village streets, they knitted in the dark because they were too poor to have a light; they knitted for dear life, because life was so cheap." In New York City tenements, women all but sewed themselves to death. They often toiled fifteen or sixteen hours a day in cold, badly ventilated tenements. The introduction of the sewing machine further drove down rates, by increasing productivity and consequently the supply of garments. The system also extended working lives. Both the very old and the very young were led to participate, to raise family income. Three- and four-year-olds were put to work, helping their parents in the cottages or slum dwellings. In England, "schools" were started, where, by age five or six, girls would be taught the discipline of twelve- to fifteen-hour days of lacemaking, knitting, or sewing.28

The piece-rate workers were caught in a vicious downward spiral of poverty and overwork, a veritable catch-22. When rates were low, they found themselves compelled to make up in extra output what they were losing on each piece. But the extra output produced glutted the market and drove rates down farther. The system kept them poor. A pair of aphorisms summarized their dilemma: "Over-work makes under-pay" and "Under-pay makes over-work."29

Eventually the putting-out system declined in importance in both England and the United States. Piece rates did not disappear but were introduced in factories, spurred on in the early twentieth century by reformer Frederick Winslow Taylor's philosophy of "scientific management." Taylor aimed to eliminate the conflict between capital and labor, by paying strictly on the basis of actual work done—that is, by the piece. In order to make the setting of rates "scientific," and thereby insulate them from conflict, scientific management pioneered the use of time-and-motion studies to determine the pacing of individual tasks within factories, or what were termed "standard times." Piece rates were then calculated on the basis of these standards.

But scientific management was unable to eliminate workplace conflict. The process of discovering standard times became a game of cunning between the operative and the man with the stopwatch. An operative in a machine tool shop explains: "If you expect to get any kind of a price, you got to outwit that son-of-a-bitch! ... You got to add in movements you ain't going to make when you're running the job! ... They figure you're going to try to fool them, so they make allowances for that. ... It's up to you to figure out how to fool them more than they allow for." Once a rate is set, the conflict does not end. Management can always change it. When workers show that they can do more than they have been allocated for, the company frequently reduces its rate: thus, "a couple of operators (first and second shift on the same drill) got to competing with each other to see how much they could turn in. They got up to $1.65 an hour, and the price [rate] was cut in half." With lower rates, they had to work more. The tendency for underpay to create overwork thus reappeared in another guise.30

WAGE WORKERS' RISING HOURS

The resistance of workers to long hours did not lead back to the earlier, more relaxed patterns of work but to cementing the link between hours of work and pay. As employers demanded more work, workers demanded more money. Eventually, the principle of paying by the hour (or even smaller units) became the dominant form of labor contracting. Although tying wages to workhours would seem to eliminate the employer's preference for long hours, with extra hours no longer being free, other factors perpetuated the employer's interest in long hours. These were increased mechanization in the second half of the nineteenth century, the use of long hours and the concept of employment rent, to promote workplace discipline, by the twentieth century, and the bias created by the structure of fringe benefits since the Second World War.

The Demands of Mechanization

For about a hundred and fifty years, manufacturing industries have been on a path of increasing mechanization. The machinery started out simple but over time grew more complex and costly. By the twentieth century, corporations were spending fantastic sums on expensive equipment. Once capital is invested, its owner has strong financial incentives to see that it is used as intensively as
possible. If employees opt to work short hours, the machinery may well sit idle—an expensive proposition for the firm, which may have borrowed money to buy it or need high production to fill its orders. This drive to use machinery intensively has been an important cause of long hours, whether workers are paid by the hour or the piece or a fixed rate. Employers typically prefer to hire fewer people and keep them on long schedules because they cannot count on finding additional workers of comparable quality and experience.

This helps explain why some of the most heavily capitalized industries, such as steel and railways, have had especially long hours. The U.S. steel industry did not relinquish its “twin relics of barbarism”—the twelve-hour day and the seven-day week—until 1923. For a company operating around the clock, two twelve-hour shifts require far fewer workers than three eight-hour ones. This is one reason companies in the manufacturing sector (where investment is high) remain opposed to reforms such as the six-hour day. Low capitalization is also one reason hours are shorter in the service sector.

Workplace Discipline and the Employment Rent

For some employees, the job is defined by the “task.” The piece-rate worker gets paid by the piece. Many professionals are paid to “get the job done,” rather than by the hour. The person who pays (be it employer or customer) may have little or no financial incentive in the amount of time it takes. The wage worker, by contrast, sells not a finished product, but time itself. It falls to the employer to make sure that the time purchased is used productively. But what ensures that workers actually work during all the hours for which they are being paid? Who sets the pace of work? How is the quality of the product maintained? In order to solve these problems, capitalists took on the role of “boss.”

Employers found the first generation of industrial workers almost impossible to discipline. Attendance was irregular, and turnover high. Tolerance for the mindlessness and monotony of factory work was low. “The highlander, it was said, ‘never sits at ease at a loom; it is like putting a deer in the plough.’” Employers devised various schemes to instill obedience. They posted supervisors, levied fines, and fired their workers. Beatings were common, especially among slaves and child laborers. One early factory owner explained: “I prefer fining to beating, if it answers . . . but fining does not answer. It does not keep the boys at their work.”

Many employers and social reformers became convinced that the adult population was irredeemably unfit for factory work. They looked to children, hoping that “the elementary school could be used to break the labouring classes into those habits of work discipline now necessary for factory production. . . .” 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.’ ” Schooling ameliorated, but did not solve, the discipline problem. As late as the beginning of the twentieth century, capitalists still had not consolidated their control within the workplace, in either the United States or Britain. Then, in 1914, Henry Ford devised a sophisticated approach to labor discipline which would change the face of worker resistance for decades to come.

Ford’s first step was a technical innovation. In order to speed the flow of work through the massive Highland Park (Michigan) plant, he installed a moving conveyor belt. This technology ceded to management far more say over the pace of work than the system it replaced, in which teams of workers rotated among stationary placements of unfinished automobiles. But using machinery to set the pace of work was only a partial solution. Not all production steps or products are amenable to moving-process technology. The more serious problem was that workers did not respond well to the new system: they found the rapid pace and the loss of autonomy unpleasant. Ford was still faced with absenteeism, lateness, and constant turnover of workers. Therefore, as a complement to the conveyor belt, he instituted a new financial strategy—the five-dollar day. This dramatic reform would ultimately prove to be a powerful weapon in the employer’s arsenal. The five-dollar day created a “carrot”—a sophisticated economic incentive, which we call the “employment rent.”

In its simplest terms, the employment rent is the value of a job to the worker. The term rent follows economists’ usage. Owners are able to command rents when the “property” they own is fixed in
supply. Owners of land, oil sheiks, star basketball players, and
Noble Prize laureates can all garner rents. When Henry Ford an-
nounced the five-dollar day, he made jobs at Ford far more valuable
than at any other auto plant. The going rate was then about $2 a
day. By paying his men (only men were eligible) $5 a day, Ford
gave them an employment rent of $3—the difference between
working for him or for Studebaker or Packard.

Eventually employment rents spread throughout the economy,
albeit with less fanfare and smaller wage increases. Unions played
a major role in the creation of rents, as the organizing drives and
sitdown strikes of the 1930s transformed high-turnover, low-paid
“mass production” jobs into valued positions. In the process, capital-
ists consolidated their control over production. At Ford, observ-
ers described the men as “absolutely docile” after the five-dollar
day came in. Common sense suggests the connection: when a job
pays a rent, a worker is less willing to lose it. There is more willing-
ness to work hard, show up regularly, and follow company rules.
My research has borne out this common sense. In a study of British
factory operatives, the higher the rent, the faster factory operatives
work. The willingness of workers to go on strike or quit a job is also
directly correlated with the size of their employment rent. Overall,
the greater the employment rent, the more disciplined and profit-
able a workforce will be (see figure 3.2).38

Long hours raise the employment rent, thereby giving employ-
ers an incentive to schedule them. If the employment rent is the
difference between income on the job and expected income if a
worker is terminated, the effect of long hours is clear. By the
same reasoning, employers are also reluctant to reduce hours.
Consider Bert Johnson, who works in a Houston oil refinery
where the Oil, Chemical and Atomic Workers Union has success-
fully bargained for an hourly wage of $17. Johnson’s regularly
scheduled work week is 40 hours, and weekly pay is $680, ex-
cluding benefits. Even at regular hours the job yields a substantial
rent, because union jobs are not easy to get. If Johnson loses this
one, he anticipates he wouldn’t be able to get another in the in-
dustry, and might be unemployed for a while. He thinks he’d
have to return to machining, with its hourly wage of $11 to $12
and substantial loss in benefits.39

When his hours go up, the job becomes even more economically

valuable. Johnson works overtime, on average one eight-hour shift
a week. At time and a half (or $25.50 an hour), this extra work
brings in an additional $200 a week. As with most of his co-
workers, the pay has made it possible for Johnson to leave the
polluted inner-city neighborhood that surrounds the refinery, and
buy a house in a cleaner, safer middle-class suburb. For many of the
workers, the acquisition of a house has also made the job at ARCO
more valuable: losing the high pay and the long hours might well
mean losing the house as well.

While ARCO does not relish paying time and a half, it does prefer
it to hiring additional employees. The structure of fringe benefits,
as I shall discuss, is part of the reason. The rest is that the company
makes back part of the additional outlay because a forty-eight-hour
week ordinarily yields a higher employment rent.40 At the higher
rent, workers are willing to put in more effort on the job. Every
hour is therefore more “productive” (see figure 3.2). With a higher
rent, they are also less likely to be absent or to quit altogether.
Because their jobs are hard to replace, they’re more productive and
hence more profitable employees.

Figure 3.2 Productivity and the Employment Rent

Value of the employment rent
The other way to think of it is that the longer hours make the worker more dependent on the company, at least in income terms. Dependency translates into control and, ultimately, profitability. This is why employers have traditionally liked company towns (there's no alternative employment) or prefer married men to single ones (family responsibilities make them more reluctant to challenge management's authority). Today two factors exacerbate this dependence. The first is the scarcity of high-paying jobs. The disappearance of unionized blue-collar work means that many men like Bert Johnson are unable to find comparable positions if they lose their current jobs. White-collar, managerial types face a similar dilemma, owing to recent retreats in corporate America. Second, the extra income earned in long hour jobs locks workers into costly expenditures. Debt is an important part of dependence: paying off a mortgage, a car loan, and a credit card balance can make long hours absolutely necessary. So, too, is the enthusiasm of children for the market's latest fad—the skateboard, "Air-Jordans," or an acid-washed jean jacket. (See chapter 5, where I explore how consumption habits have perpetuated long hours.)

Concern about employment rents is one source of employers' opposition to reductions in hours. Unless a shorter workweek is accompanied by higher wages, it will lower the employment rent. And employers are usually reluctant to grant higher wages, because they fear costs will rise. As I show in chapter 6, there are cases in which this fear is unfounded: hours can be lowered profitably. Nevertheless, employers have been skeptical of this possibility, preferring to remain with the long-hours status quo. And the conservatism of some affects the rest. Once long hours proliferate, as they did, it becomes difficult for individual firms to break out of the mold. Custom and inertia take hold.

The connection between long hours and high employment rents can be seen across the occupational and industrial structure of the economy. The jobs with the highest rents—white-collar professional and managerial positions or the best-paying manufacturing jobs—tend to have the longest hours. Men's jobs pay higher rents than women's jobs—and tend to have longer hours. In the parts of the economy where employment rents are low or nonexistent, such as the service sector, hours are shortest. Employment at McDonald's can be had at almost any time, at a rate of pay which will be

instantaneously matched by Burger King. McDonald's pays no employment rent. And the McDonald's and Burger Kings have short workweeks and hire lots of part-time workers.42

The high-rent jobs are more demanding. When Henry Ford raised wages, he also expected more effort. According to one production foreman, "[They] called us in and said that since the workers were getting twice the wages, [the management] wanted twice as much work. On the assembly lines, we just simply turned up the speed of the lines." Thus, the logic of capitalist labor relations points in the direction of jobs becoming all-consuming. According to the economist Chris Nyland, the conclusion that "average intensity levels in industry have risen significantly over the last century has been generally accepted by scholars familiar with the work of fatigue researchers."

As a result, our employers ask for more and more from us—and get it on account of the lure of the carrot (the employment rent) and the fear of the stick (dismissal for failure to meet the demands). One autoworker notes:

Where I work at the auto plant, the workers are just dropping like flies. When there's a lot of work because of a new model coming out, they make people work 10 and 12 hours every day, 6 days a week. Lots of people, even the younger ones, are developing high blood pressure, having accidents on the job, or car accidents on the way to and from work, or other serious health problems. But they have to do it. If you don't like it, you can just quit.43

The situation in the auto plant suggests that there are physical limits to this process. If the demands of work are too great, productivity suffers, because people are just not capable of maintaining the pace. In the early twentieth century, opponents of long hours marshaled a great deal of evidence to show that worker fatigue was impairing efficiency. The pace of work and the availability of leisure time also influence employees' valuations of jobs. If employers push the pace too far or demand too many hours, they may face resistance or find their workers quitting. There is a point beyond which it is no longer profitable for employers to raise hours. On the other hand, the employee's valuation of leisure time does not always rise as free time falls. Long hours can reduce the value of time
off the job, as the workaholic syndrome erodes people's ability to function outside the work environment. Many people who have especially long hours find themselves unable to cope with leisure time.45

The Role of Fringe Benefits

For both salaried and hourly workers, in the second half of the twentieth century, pensions, health and life insurance, paid vacations, and other fringe benefits have become a powerful incentive for the perpetuation of long hours. Since most of these additions to basic earnings are paid on a per-person basis, rather than by the hour,46 they create a strong discontinuity in cost structures. It becomes far more profitable for a company to hire a smaller number of people for long hours than to extend those hours over more workers (who would also be paid benefits). The long hours of the postwar period owe a lot to the "bias of fringe benefits."

This bias has grown in recent years, as the value of fringes relative to wages and salaries has mushroomed. The standard figure of 15 percent (fringes as a percentage of pay) which prevailed in the 1950s has risen sharply. By 1987, total benefit payments as a percent of wages and salaries stood at 36.2 percent; at some firms, the figure reaches as high as 60 percent (see table 3.1).47

Tax structures for government-administered programs have added to this effect, even when paid on an earnings rather than a per-capita basis. Employers' contributions to social security, unemployment insurance, and other programs are capped, so that no taxes are levied after a certain level of earnings. This creates a further bias toward requiring extra hours for existing workers, because no additional tax liability is incurred. If a new employee is added instead, the tax bill rises.

These institutional arrangements have led firms toward the use of overtime and against incremental hiring. The overtime premium required by the Fair Labor Standards Act of 1938 was included in the bill precisely to discourage employers from this reaction. But it has turned out to be a weak sanction. Economists Ronald Ehrenberg and Paul Schumann have found that firms use more overtime when the ratio of fringe benefits to wages rises. While the magnitude of the effect differed with various statistical techniques, in all cases it was substantial.48

Additional factors have created similar incentives. As the economist H. G. Lewis noticed, in a paper written almost twenty years ago, firms that provide on-the-job training—as many companies surely do—will not be indifferent to the hours their employees choose, because there are fixed costs associated with each worker.49 Recruiting and hiring new employees lead to other fixed costs which encourage firms to prefer long hours for existing employees. As these costs rise, their pull becomes more powerful.

In the aftermath of the early 1980s recession, this set of incentives was a strong brake on employment growth. In the steel industry, which was particularly hard hit by unemployment, it was estimated that the price of the overtime hours worked by employed workers was ten thousand fewer jobs. In 1983, USX issued a directive to plant managers (which was subsequently leaked) ordering them to use overtime, specifically so that they could avoid calling back laid-off workers. This decision was based on the desire of the company to avoid re-entitling workers to benefits. The situation in the mining industry at the time was similar: the coal companies demanded overtime in the midst of severe unemployment. And in the auto industry, the United Autoworkers' Union has calculated that in 1988 overtime resulted in the loss of eighty-eight thousand
jobs. Once again, we see the paradox of long hours in the midst of unemployment.50

THE SALARIED LABORER’S FREE HOURS

The 80-hour man has far more sizzle. Nine out of ten companies will take the guy who’s always there, whose example is one of brute force of effort. His example filters down to those beneath him.

—a corporate recruiter51

Pressures toward long hours may be strongest for the third major form of labor contract—payment by salary. Like those early industrial workers who received a fixed daily or weekly wage, the earnings of the salaried worker do not vary with hours. Extra hours are therefore gratis to their employers.

Salaried employment increased substantially in the twentieth century, as firms added white-collar workers—managers, engineers, and a variety of professionals, from lawyers to social workers. Today almost 40 percent of all U.S. employees are paid by salary, rather than hourly wages.52 As my analysis predicts, salaried workers have longer hours of work than workers paid by the hour. Half the nation’s salaried workers belong to the “managerial and professional specialty” group, the occupational category with the longest hours.

Some salaried groups are still toiling at nineteenth-century schedules. Medical residents, investment bankers, corporate lawyers, and many other professionals can be expected to work 70 or 80 hours routinely, with extra effort during particularly hectic times. A 1970s study found that most managers at Fortune 500 corporations put in from 60 to 70 hours a week, excluding business travel: “They’d leave home at 7:30 A.M. and return at about the same time that evening. They’d also bring home a few hours of work each day.”53 Not only the top echelons, but employees down the hierarchy, are expected to put in the hours.

Rosabeth Moss Kanter’s classic study, Men and Women of the Corporation (1977), describes the prodigious effort large corporations traditionally expect of managers:

[They] tended to put in many more hours than workers, and they spent more of their so-called leisure time in work-related activities. . . . Question: How does the organization know managers are doing their jobs and that they are making the best possible decisions? Answer: Because they are spending every moment at it and thus working to the limits of human possibility. Question: When has a manager finished the job? Answer: Never. Or at least, hardly ever. There is always something more that could be done.

When hard times led a California corporation to cut back worktime by 10 percent, managers spent a quarter of this “leisure” time at the office, working without pay.54

Many of these workers find that they cannot escape such long hours and remain successful on the job. Their employers require total commitment, expecting more than nine to five; they want Saturdays and nights. Even those near the bottom of the hierarchy feel the pressure:

Upper management expected you to come in on Sundays too—not to work, but just to be seen on the premises—supposed to show how much you loved the damn place . . . . Well, I have a family. What are you supposed to do, live at the plant? Lots of the foremen came down to the lounge on Sunday and drank coffee for a couple of hours. I did a few times, and then said to hell with it—it’s not worth it . . . . I started to get passed over on promotions, and I finally asked why. My boss said they weren’t sure about my attitude.55

More recently, a forty-one-year-old public relations worker in a major corporation expressed these sentiments: “I can’t imagine having a baby, which I want to do, and still keeping this job. All corporate jobs are like this—you’re valued according to the long hours you are willing to put in, and the schedule is so rigid that anyone who wants to do it differently has to leave.”56

Similar pressures exist outside large corporations, in smaller professional “shops.” Architecture and law firms, universities, publishers, and consulting agencies demand long hours from their salaried workers. Not even government workers are immune these days. One state official warned a job candidate: “We feel that anybody serious has got to be willing to work at least 60 hours a week. If you’re not, we know we can get someone who will.” Competitive
forces operate on the self-employed as well. This group, which
Clocks in some of the country’s longest hours, faces an exception-
ally harsh economic climate, as small makes for costly. Ominously
low survival rates for the self-employed make self-exploitation vir-
tually inevitable.

The pressures on professionals to work long hours have grown
more intense in recent years. In the 1980s, reported weekly hours
rose almost an hour a week for both men and women. The impetus
has come largely from companies, in response to market condi-
tions. Kanter’s qualitative research at the nation’s innovative firms
bears out the quantitative evidence: “’enough’ is defined not by
some pre-existing standard like the length of the workday but by
the limits of human endurance.”

Some observers feel that it is not employers who enforce long
hours of work, but a pervasive workaholism. Indeed, there is his-
torical precedent for the idea that Americans are obsessed with
work: as early as 1648, Massachusetts legislated idleness a punish-
able crime. There is no denying what the historian Daniel Rodgers
described as the nation’s tendency to “the elevation of work over
leisure . . . an ethos that permeated life and manners.” Yet it is
important not to overstate the case. The work ethic was the doc-
trine of the northeastern middle class and “never penetrated very
far” into the urban working classes or into the South. But however
strong this cultural predisposition to hard work, “workaholism” is
to some extent a creation of the system, rather than its cause.
As long as there are even a few workaholics, competition will force
others to keep up. Employers will prefer the hard workers, and
these will win out over their colleagues who, either out of personal
preference or because they have family responsibilities, do not put
in the hours. One engineer noted, “I don’t like to put in 80 hour
weeks, but a lot of people do. And those are the people who get
the projects and promotions.” This suggests that the workaholic
can set the standard to which others are compelled to adhere.
Co-workers may not like the grind. They may not be psychologi-
cally invested in it like a classic workaholic. But the eventual out-
come—in terms of hours—will be just the same.

Other observers say that since, after all, workers can leave their
jobs, it is a mistake to place the onus of long hours on employers.
If employees are unhappy enough, companies will be unable to
retain personnel and will encounter difficulty hiring and promoting
into these long-hour jobs. While there is some truth in this logic, it
ignores two realities of the economic system. First, companies
themselves are subject to harsh competition which drives the mar-
et standard: those who cannot induce long hours from their work-
forces are at a disadvantage in comparison with those who can. The
companies that get the hours set the pace.

The second reason is that employers have a structural advantage
in the labor market, because there are typically more candidates
ready and willing to endure this work marathon than jobs for them
to fill. These surpluses of candidates exist because the jobs in
question are either on the high rungs of the occupational ladder or
are necessary lower rungs. They are the most desirable prizes the
market has to offer, carrying high incomes, excellent benefits, and
many perquisites. And these employment rents are not just finan-
cial but associated with superior status and job satisfaction. For
example, managers have higher job satisfaction than other major
occupational groups. As one moves down the occupational ladder,
satisfaction declines. Managers and professionals are in a better
position to escape many of the petty tyrannies that make the work-
lives of many Americans frustrating, stressful, and unrewarding.

I have used the term occupational ladder. While the world of
work often does involve a climb from bottom to top, the structure
of jobs resembles a pyramid more than a ladder. There are far more
people at the bottom than at the top. A manager has many under-
lings who are managed. A supervisor watches over whole groups
of workers. The pyramidal shape virtually guarantees that the best
jobs are in short supply. The employer will have the pick of many
actual or potential applicants. For every aspiring manager deter-
mined to limit his or her hours, there are usually many more willing
to give the company whatever time it demands.

In some occupations, the process that created surpluses of labor
has been deliberate. Professional organizations (the American
Medical Association, the American Bar Association, and their counter-
parts in other occupations) have intentionally limited entry into
their respective fields. They “control,” in vital ways, the profes-
sional schools, licensing processes, and social networks. As a result,
incomes are kept high and unemployment low. But favorable job
prospects within the professions are mirrored by surpluses of
potential members outside the charmed circle, as would-be doctors, lawyers, and engineers occupy positions as nurses, paralegals, or draftspersons.

Some professionals and managers are starting to refuse the long hours. The rising numbers of professional women with children and a new ethos of fathering are leading many in long hour jobs to desire more time away from work. It is likely that these demands will grow, rather than recede. Yet at the moment, few who feel this way have been able to reconcile the conflicting demands of employer and family. The vast majority of salaried workers are still subject to elastic hours. Unless larger numbers of people both make their voices heard and start voting with their feet, the overworking of salaried men and women is likely to continue.

THE FIGHT FOR SHORTER HOURS

The fact that the market typically favors employers does not mean that they will always be able to raise working hours, or that a transition to a "short hours" economy is impossible. As I noted at the beginning of the chapter, there was one long period during which hours fell, rather than rose. After 1850, the U.S. workweek began to decline and was eventually almost halved. This decline occurred because of pressure from the other side of the market. Workers, through their unions, waged a protracted, bitter, and ultimately successful struggle to reduce working time.

The first documented activity in support of shorter hours in the United States occurred in the 1780s. The participants were unionized male artisans and craftsmen. These were the workers who had already been most able to resist the expansion of working time which capitalism brought for their wives, children, and less well-positioned male counterparts. Their quest was for a ten-hour day, an unthinkable goal for most workers. The struggle was confined to skilled artisans until the 1840s, when women operatives in the textile industry joined the fray. An 1845 petition summarized their grievances: we are "toiling from thirteen to fourteen hours per day, confined in unhealthy apartments, exposed to poisonous contagion of air [and] debarred from proper exercise." Unlike their artisan counterparts, these factory workers did not readily win their cause and would not see ten hours until after the Civil War.

There is little dispute about what motivated these groups of workers: "The most frequent cause of complaint among working people [during the Age of Jackson] was the lack of leisure." Pure exhaustion was an important part of what was driving workers into the streets. Throughout the nineteenth century and into the twentieth, the call for leisure continued to propel the struggle. Workers articulated the need for more family time, time for cultural activities, and eventually just "eight hours for what we will." As the nation became more prosperous, even leisure for leisure's sake started to become culturally acceptable.

The second stage of struggle began after the Civil War, with the birth of the eight-hour-day movement. This time, labor explicitly tied shorter hours to higher pay. As the wife of Ira Steward, a leading eight-hours agitator, quipped, "Whether you work by the piece or work by the day, decreasing the work increases the pay." But despite its appeal for many workers, the eight-hour goal took fifty years to reach. Even the massive protests of 1886 were insufficient to move employers. What finally proved crucial were the intervention of President Woodrow Wilson and the willingness of Henry Ford to grant eight hours. Favorable labor market conditions also played a role.

Business Opposition

Although there were some exceptions such as Ford, the vast majority of employers opposed workers' demands for shorter hours. They used a wide range of tactics and arguments but did not waver in their message. Shorter hours were un-American, indecent, unprofitable, and a threat to prosperity. In 1831, when Pittsburgh carpenters went on strike, their masters had them indicted and tried on grounds of conspiracy. In the 1840s, factory women were "lazy Devils," and business blocked their petitions for state legislation. In the 1880s, after the Haymarket explosion, those held responsible were executed, vilified as "vipers," "serpents," and foreign traitors. A few decades later, the National Association of Manufacturers argued for the American workman's right to work more than 480
minutes of a calendar day. As Saturday work was contested, business "equated increased leisure... with crime, vice, the waste of man's natural capacity, corruption, radicalism, debt, decay, degeneration, and decline." Businessmen warned that idleness breeds mischief and—even worse—radicalism. The common people had to be kept at their desks and machines, lest they rise up against their betters.65

Business also countered the shorter-hour demands by appealing to the bottom line. Time after time, they put forward grim predictions: shorter hours would lead to financial ruin; their workers were driving them out of business. Employers coupled their threats with displays of brute power. They locked out employees and hired strikebreakers. They called in the police, national guards, and their private army—the Pinkertons. They blackmailed and fired workers. They used their influence with the newspapers, the courts, and the politicians. The tactics of business are far more moderate today, as well they might be. Union opposition has been considerably tamed, and the great struggle between capital and labor blunted. Still, employers as a whole retain their dislike of short hours. M. A. Bienefeld, author of a prominent work on hours reductions, identifies a crucial asymmetry between labor and capital: "the employer usually values the maintenance [of hours of work] more highly than the employee values their reduction."66

The Last Major Battle: The Thirty-Hour Week

The 1930s mark a turning point in a struggle that had been going on for a hundred and fifty years. This was to be labor's last major battle for shorter hours. In the midst of depression, the urgency of mass unemployment dominated the agenda, and calls for higher wages and more leisure time were put aside. Ironically, mass unemployment became the route to leisure. The thirty-hour week was first and foremost a plan to spread employment and put people back to work. The crux of thirty-hour logic was that employers would hire back those workers they had already laid off. A one-quarter reduction in hours (from forty to thirty) would reabsorb the 25 percent of the workforce who had become unemployed. It appeared that full employment, labor's elusive but persistent goal, could finally be achieved. But this was not to be. As soon as thirty-hour legislation passed the Senate and the real possibility of enactment appeared, business threw up fierce opposition, barraging the Roosevelt administration with pressure and threats. Quickly changing course, the President abandoned his support for thirty hours. Sixty years later, we are still far from full employment and even farther from a thirty-hour week.

The opposition of business to the thirty-hour week points up an additional structural incentive operating against short hours. When working hours are reduced for many workers simultaneously, the pool of unemployed workers shrinks. This makes employers uncomfortable, for at least two reasons. The first is the effect on the employment rent and, hence, on labor discipline. The great Polish economist Michal Kalecki argued, in a now-classic article:

[U]nder a regime of permanent full employment, 'the sack' would cease to play its role as a disciplinary measure. The social position of the boss would be undermined and the self assurance and class consciousness of the working class would grow... [Business leaders'] class instinct tells them that lasting full employment is unsound from their point of view and that unemployment is an integral part of the normal capitalist system.67

Rephrased in our terms, Kalecki's point is that full employment reduces the employment rent, because workers know the market is full of companies eager to hire them. Under these conditions, employers are in danger of losing the upper hand.

The second problem is that hiring new workers suddenly becomes much more difficult. They are harder to find, cost more, and are less experienced. Such shortages of labor are extremely costly for a firm. At my own place of work, Boston's low unemployment rate during the late 1980s induced the Harvard Corporation to turn its own personnel into bounty hunters: employees who brought in new recruits were given cash rewards.

These considerations help to explain why full employment has been rare. With the exception of wartime, this country has never experienced a sustained period of full employment. The closest we have gotten is the late 1960s, when the overall unemployment rate was under 4 percent for four years. But that experience does more
to prove the point than any other example. The trauma caused to business by those years of a tight labor market was considerable. Since then, there has been a powerful consensus among business, government, and the economics profession that the nation cannot withstand such a low rate of unemployment. Economists have defined and redefined upward their "full employment rate of unemployment" to justify the considerably higher rates of the 1970s and 1980s. Meanwhile, the government has assiduously avoided counting all the unemployed and underemployed, sticking instead to a narrow statistic that missed, during the last decade, over half the relevant persons. Business opposition also accounts for the paradox of long hours and unemployment. The forced idleness of some helps perpetuate the forced overwork of others. It is possible that everyone would be better off with a more equitable distribution of work, but capital has maintained a veto on such a solution. 68

In recent years, the attitudes of business have been far less visible on the hours question. In the absence of a union challenge, there has been little need for employers to show their hand. Once the issue disappeared from the social agenda, hard evidence of employers' opposition has become difficult to find. Nevertheless, there are signs that their longstanding opposition has not disappeared. Corporate lobbying in the late 1970s against the Humphrey-Hawkins bill—in part, a spread-the-work measure—was a rare display of employer sentiment. And in recent years there have been a few surveys of corporate executives. In one, not a single executive would lend support to hours reductions; in fact, the sentiment was for increases. A Fortune poll of CEOs indicates similar views: three-quarters say that global competition will require them to push their managers "harder"; and only 9 percent think they are already demanding too much. My own interviews with labor union officials confirm this view: employers are still typically far more willing to grant wage increases than cede control over scheduling hours of work. 69

Labor Gives Up the Fight

After the Second World War, labor made far less progress on the worktime issue. While a shorter workweek was achieved in a few industries, such as printing, rubber, and ladies' garments, on average there was no further decline in full-time weekly hours. Unions did bargain for longer vacations and other paid time off, and some contracts contain generous provisions. But the gains for workers as a whole were modest. Especially in comparison to prewar objectives such as the thirty-hour week, the postwar efforts appear negligible. The shorter-hours movement, which once mobilized millions, had become a peripheral concern. What happened? Why did the AFL, and then the AFL-CIO, stray so far from the cause that had virtually constituted its identity? Why has the shorter-hours movement laid "dormant for nearly half a century?" 70 Although it is difficult to provide a full accounting, as no in-depth studies of the shift have been done, the outlines of an answer can be identified.

To a certain extent, labor abandoned the cause because it was losing. The inability to win thirty hours had left the unions in a weak position. A key problem was ideological: the unemployment issue had crowded out all others in the discourse over hours. Earlier, labor had based its struggle on positive values, such as the need for family or civic time, the need for leisure, or, in the 1920s, an anticonsumerist message. In the 1930s, these had given way to the purely defensive spread-the-unemployment rationale. Under the circumstances, defensiveness was probably inevitable, but in the long run it proved damaging. As employment revived, labor was left without a compelling rationale for its cause.

Once the Second World War began, the pressure for longer hours was unstoppable. The manufacturing workweek rose more than seven hours between 1940 and 1944. Capital used the war to attack labor at home, laying military defeats at the feet of the forty-hour week. War heroes were paraded across the country speaking against worktime reductions. At war's end, the anticommunist hysteria which swept the nation proved a further obstacle. Virulent anti-union legislation was enacted, and a major drive to organize the South failed. In alliance with conservative forces outside the labor movement, centrists and right-wingers within the CIO expelled eleven unions for allegedly being communists. Labor's own move to the right had a profound impact on the hours question. Although shorter hours had traditionally been a demand for all of labor, it came to be increasingly associated with the left wing. Now the cause itself was questioned. In 1957, the machinists' newspaper
queried: “Will Soviets Cut THEIR Overtime?” Unions were adopting the longstanding rhetoric of management.71

The conservatism of the postwar years also led labor to be far more accepting of capitalism as an economic system. Labor's earlier opposition to unbridled growth and consumerism disappeared. At the AFL-CIO's first joint conference in 1956—ironically, on the topic of the shorter workweek—one official summed up the new position: “[W]e should emphasize that we do not welcome shorter hours if they reflect the fact that the nation’s total level of production is not keeping up the pace.” Labor should counter “the impression that the nation is threatened by too much output and excessive possibilities for leisure.” Along with almost everyone else, unions had jumped on the growth bandwagon.72

The flip side of growth was the emerging climate of consumerism. As a middle-class standard of living came within the reach of more and more working-class people, their desires for shorter hours could no longer be taken for granted. At the 1956 conference, one official claimed confidently that workers had become “eager to increase their income, not to work fewer hours.” For males, who were now earning the overtime premium of one and a half or two times their hourly pay, this claim may have been correct. However, as a second official noted, her 300,000 mainly female telephone operators wanted shorter hours more than anything else. Given the waning influence of women within the labor movement during the 1950s, it is not surprising that these voices were ignored.73

Gender politics aside, it is certainly possible that “the end of shorter hours”74 was due partly to workers' preferences for money over free time. The immediate postwar years witnessed a surge of pent-up consumer demand. The baby boom and the spread of home ownership encouraged the acquisition of consumer goods. Workers wanted and were getting the American dream. To say, however, that long working hours merely reflect workers' desire for income is simplistic and misleading. As I argue in chapter 5, the consumer boom itself was partly driven by employers' ability to get long hours. The nation became locked into a pattern of work and spend. Leisure was left out of the loop.

During the early postwar era, employers' natural inclination to push up hours was kept in check by prosperity. Labor's inattention to the hours question was not decisive. This was the “golden age” of U.S. capitalism, the “fat years.”75 American corporations had virtually no international competitors, and the domestic market was booming. For their part, unions still retained considerable economic clout. They were able to capture a substantial share of the large profits business was accumulating. Had firms attempted to raise working hours, it is unlikely they would have been successful. In any case they did not. Firms were flush with money and could afford to give rather than to take.

These circumstances produced what was essentially a period of stable hours. Although the data needed to calculate our annual hours measure are not available for the early postwar decades, alternative measures indicate stability in hours. Between 1948 and 1969, the most comprehensive measure—hours worked per adult—rose modestly—from 1,069 to 1,124 per year. Hours per labor force participant fell only slightly, from 1,968 to 1,944. (The difference between the two is accounted for mainly by women's increased participation in the labor force. Because women work fewer hours than men, their inclusion lowers the labor force trend.) Surprisingly, weekly hours for nonstudent men were virtually constant over the period (39.9 to 39.5), even when increases in vacation and holidays are included. The claims of some researchers that paid time off greatly reduced annual hours appear to have been exaggerated: paid time off increased by fewer than four days a year for the average worker.76

After 1969, hours began to rise. The workweek crept up, especially for women, as did the percentage of the year people found themselves on the job. As I showed in chapter 2, labor force participants would eventually register an annual increment equivalent to an extra month of work. At the most general level, this rising work effort can be traced to the economic problems that ended the era of high prosperity. The golden age of the 1950s and 1960s was followed by oil price increases, a slowdown in productivity growth, heightened international competition, and sluggish demand.
Corporate profits, which had been at record highs, fell substantially. Recessions became deeper and more damaging. Businesses were under increasing pressure to cut costs and improve profit margins. Predictably, a large portion of the burden was “downloaded” onto employees—particularly during the 1980s, when the squeeze on many U.S. corporations hit hardest. Their strategy has been to require workers to do more for less.

This economic distress has raised hours in two ways. The first method was direct: employers simply demanded longer hours and more work effort. The 1980s were a period of increased overtime and reductions in vacations, rest periods, and other paid time off. Among better-paid white-collar employees, large-scale layoffs and the cutthroat environment made greater commitment of time and energy necessary to retain one's job. At the low-wage end of the labor market, sweatshops reappeared, with nineteenth-century style conditions. The government contributed by eroding legal protections for employees, as well as failing to enforce existing regulations.

The second cause of longer hours has been a steady reduction in hourly rates of pay. Workers paid by the hour—a majority of U.S. employees—saw their average wage peak in 1973. Since then, it has declined substantially and now stands at its mid-1960s level. This erosion has had a profound effect on hours: in order to maintain their current standard of living, these employees must now put in longer hours. Like the piece-rate workers who were forced to produce more as the rates fell, a large number of American families are now in a similar bind. Many men—the group that bore the lion's share of the decline—have expanded their worktime through overtime and second jobs. Unmarried men especially have had a tremendous rise in hours (334 per year). Many of these men are young—the group that suffered the biggest earnings decline. Unmarried women have also increased hours substantially. Among married couples, wives, rather than husbands, have had the largest growth in worktime. By adding a second income or increasing the wife's hours, many families have averted a real decline in their material standard of living. The trends in income have led to a public consensus that it is no longer possible for families to "make it" on a single income—a view that eight out of ten Americans now hold. While our understanding of what we "need" turns out to be quite complicated (see chapter 5), there is no denying that the perception of financial necessity is widespread.

In one sense, workers are choosing these extra hours. No one forces Valerie Connor to work two eight-hour shifts or Bert Johnson to put in the overtime. But the pressure to work the hours has come from companies. In return for a 1970s standard of living, employers are now demanding far more hours. For the production and nonsupervisory employees who make up 80 percent of the labor force, these demands have been substantial. According to our calculations, just to reach their 1973 standard of living, they must work 245 more hours, or 6-plus extra weeks a year.

Among salaried workers as a whole, earnings have not declined. These employees also tend to have higher incomes to begin with, so they have been less affected by the financial hardship that has plagued many less well-off families. However, their hours have also risen. Some of the increase has come from employers, who have cut back on paid time off and subtly (or not so subtly) required longer weekly hours. But financial incentives have also affected salaried workers. Although their incomes have not fallen, they have not grown by much either. Therefore, to keep up with the ever-more-expensive middle- or upper-middle-class lifestyle, more work has been necessary. Finally, among women, the desire to pursue a career, independent of the monetary rewards, has also led to increases in total working time.

Only now are the consequences of labor's blindness to the hours question fully visible. Workers, both as individuals and through their unions, have been virtually powerless to stop the onslaught of work. Amidst the high unemployment and economic insecurity of recent years, there have been few solid impediments to long hours. And the problem is not only economic. The nation no longer possesses a culture of resistance to long hours or a political movement to press for government reforms. There have been few ideological vantage points from which to stake a claim to leisure.

The importance of labor's inaction can be seen by a comparison with Europe. In Europe, labor did retain interest in shorter hours, keeping this issue at the top of its agenda throughout the postwar period. When economic crisis hit, unions were determined to resist the inevitable pressures for longer hours. Despite the severity of the economic downturn in Europe, weekly hours have continued to
TABLE 3.2
Paid Vacation in European Countries

<table>
<thead>
<tr>
<th>Country</th>
<th>By Law</th>
<th>By Agreement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austria</td>
<td>5 weeks</td>
<td>cf. law</td>
</tr>
<tr>
<td>Belgium</td>
<td>4 weeks</td>
<td>5 weeks</td>
</tr>
<tr>
<td>Denmark</td>
<td>-</td>
<td>5 weeks</td>
</tr>
<tr>
<td>Spain</td>
<td>30 civil days</td>
<td>41/2 to 5 weeks</td>
</tr>
<tr>
<td>Finland</td>
<td>5 weeks</td>
<td>5 to 6 weeks</td>
</tr>
<tr>
<td>France</td>
<td>5 weeks</td>
<td>5 to 6 weeks</td>
</tr>
<tr>
<td>Great Britain</td>
<td>-</td>
<td>4 to 6 weeks</td>
</tr>
<tr>
<td>Greece</td>
<td>4 weeks</td>
<td>cf. law</td>
</tr>
<tr>
<td>Ireland</td>
<td>3 weeks</td>
<td>+/- 4 weeks</td>
</tr>
<tr>
<td>Iceland</td>
<td>4 weeks, 4 days</td>
<td>cf. law</td>
</tr>
<tr>
<td>Italy</td>
<td>-</td>
<td>4 to 6 weeks</td>
</tr>
<tr>
<td>Luxembourg</td>
<td>5 weeks</td>
<td>25 to 30 days</td>
</tr>
<tr>
<td>Malta</td>
<td>4 weeks</td>
<td>cf. law</td>
</tr>
<tr>
<td>Norway</td>
<td>4 weeks, 1 day</td>
<td>cf. law</td>
</tr>
<tr>
<td>Netherlands</td>
<td>4 weeks</td>
<td>4 to 5 weeks</td>
</tr>
<tr>
<td>Portugal</td>
<td>30 civil days</td>
<td>41/2 to 5 weeks</td>
</tr>
<tr>
<td>FRG</td>
<td>3 weeks</td>
<td>51/2 to 6 weeks</td>
</tr>
<tr>
<td>Sweden</td>
<td>5 weeks</td>
<td>5 to 8 weeks</td>
</tr>
<tr>
<td>Switzerland</td>
<td>4 weeks</td>
<td>4 to 5 weeks</td>
</tr>
</tbody>
</table>


As a society we have been loath to acknowledge the chronic overwork that plagues the American household, preferring to romanticize the role of housewife and mother. Yet the shortage of time is not merely a problem of our paying jobs—we spend just as much time working in the home as we do outside of it. Houses, yards, and children devour our time, seemingly without limit. For many with two jobs—so-called working mothers—the burden is enormous. In addition to the forty-plus hours of work a week a full-time woman employee puts in on the job, different studies estimate that she does anywhere from twenty-five to forty-five hours in the home.

All this household work often seems unavoidable, like death and taxes. Children have to be cared for, and food needs to be cooked. When attention is directed to the time squeeze, it is rarely suggested that we should curtail household work. The message is that we need time so we can do more at home. And perhaps we do—at least with existing methods for taking care of home and family. But we need to consider the possibility that we have gotten locked into a household technology and a culture of domestic work that are
Chapter 3. "A Life at Hard Labor": Capitalism and Working Hours


2. One group for whom incomes did not rise were slaves in the New World.


   Because there is no significant "precapitalist" American past—for those of either European or African descent—we have to look back to the area of origin. In the African case, there is little doubt that American slavery entailed a massive expansion of work effort. Africans had been forcibly uprooted from their homes and labor traditions: the plantation was a veritable workhouse in comparison. By the time European settlers arrived in America, their work patterns had already been significantly altered by capitalism. Therefore, I make the comparison to medieval Europe, rather than early America. I have chosen to concentrate on England, both because the English made up the bulk of the settlers, and because the literature on England is most extensive.


   An important piece of evidence on the working day is that it was very unusual for servile laborers to be required to work a whole day for a lord. One day's work was considered half a day; and if a serf worked an entire day, this was counted as two "days-works." See H. S. Bennett, Life on the English Manor (Cambridge: Cambridge University Press, 1960), 104–6. The Statutes of Artificers passed between 1495 and 1563 set at work an average of nine and a half hours per day (author's calculations). However, these laws were passed in a period when worktime was falling, as an attempt to elicit more effort from laborers. There is evidence of widespread violations. For the Statutes, see B. W. Clapp, H. E. S. Fisher, A. R. J. Jurica, eds., Documents of English Economic History: England from 1000 to 1760, vol. 1 (London: G. Bell and Sons, 1977), 489–98. On violations see Bertha Haven Putnam, Enforcement of the Statutes of Laborers (New York: Longmans, Green, 1908). Detailed accounts of artisans' workdays are available. Knoop and Jones' figures for the fourteenth century work out to a yearly average of 9 hours (exclusive of meals and breaktimes).


6. See Fernand Braudel, The Structures of Everyday Life: The Limits of the Possible (London: Collins, 1981), 90, 112. According to standard texts, the range of contemporary requirements for average male farmers is from 3,420 to 4,000. In the past, people were considerably smaller, so their needs would be lower; however, their farmwork was also less mechanized and therefore more energy-intensive. Studies of food consumption indicate that both calories and effort levels have been increasing through the twentieth century. See O. G. Edholm, "The Society's Lecture," Ergonomics Research Society, Ergonomics, 13, 6 (1970): 625–43; and J. L. Hersch, "Allocation of Time and Human Energy and Its Effects on Productivity," Applied Economics, 17 (1985): 867–84. See also Chris Nyland's discussion in Reduced Worktime and the Management of Production (Cambridge: Cambridge University Press, 1989).


   Bennett, Life on the English Manor, 265.


On Spain, see Hill, *Puritanism*, 148–49. High as it seems, Hill believes the Spanish estimate is not "wildly out."


The 120 figure is from Ritchie, "Labour Conditions," 94.

Thirteenth-century figure is from Gregory Clark, "Impatience, Poverty, and Open Field Agriculture," mimeo, 1986. Clark concurs with my characterization of work patterns: "The poverty of the peasants thus seems to have stemmed more from too many rest days or very leisurely work, rather than from any constraint from agricultural technique" (pp. 25–24).

Manorial records indicate that virgaters worked "137 days in winter and summer and 38 during the harvest, on a basis of a 5-day week, four weeks' holiday at Christmas, Easter, and Whitsun, and 61 saints' days in winter and summer, and 4 in the harvest season." Ritchie, "Labour Conditions," 94.

Farmer-miners' figure is from Ian Blanchard, "Labour Productivity and Work Psychology in the English Mining Industry, 1600–1660," *Economic History Review*, 31, 1 (1978): 23, table B2–1. This figure is for 1600. The farming year (135 days) is consistent with Gregory Clark's figure; the remainder was spent in mining.

9. See Coleman, "Labour in the Seventeenth Century."


11. Le Goff, *Time, Work and Culture*, 43–52. See also Landes, *Revolution in Time*, who argues that clocks were introduced when they were economically valuable.


Quote on "owner's time" from Nigel Thrift, "Owner's time," 61.


A classic estimate suggests that at its peak, the workweek climbed to 70 hours in Britain and just under 80 in the United States. This is probably an overestimate for the United States. See W. S. Woytinsky, "Hours of Labor," in *Encyclopedia of the Social Sciences*, vol. III (New York: Macmillan, 1935). Manufacturing hours were lower than hours in agriculture and domestic service, the two largest occupational groups in each country in the nineteenth century. A serious flaw in most discussions of hours has been the exclusion of domestic servants.


The United States had fewer official holidays to begin with; however, regularity of employment increased throughout the nineteenth century.

15. The one exception was night work, which was generally prohibited, but apparently not absolutely prevented. See Le Goff, *Time, Work and Culture*, 44.

16. This occurred in England, but not all European countries.
17. "Lose control" quote from comments of Christopher Hill, who stressed that hostility to wage labor had deep "ideological roots," cited from the discussion in Thomas, "Work and Leisure," 63.


Thompson, "Time, Work-Discipline," 78.

On poverty, see Coleman, "Labour in the Seventeenth Century." See also Hill, Puritanism.


18. Karl Marx, Capital (New York: Vintage, 1976), vol. 1, chap. 10, p. 389. See also J. L. and Barbara Hammond, The Town Labourer 1760–1832 (London: Longman, Green, 1919). The aptly named "Hell's Mill" provides a grim example. Regular hours were 5 A.M. to 9 P.M., and twice a week the children were scheduled to work all through the night.


23. Ibid., 26.

24. From reports of the inspectors of factories, cited in Marx, Capital, 352.

25. On the occupational distribution, for England, see J. D. Chambers, The Workshop of the World (London: Oxford University Press, 1961), 21–22. In 1851, agricultural laborers (not all farm servants, of course) were 1,790,000 and domestic servants 1,039,000, more than double the workers in manufacturing and mining. (By contrast, there were only half a million textile workers.) For the United States, see David Montgomery, Beyond Equality: Labor and Radical Republicans 1862–1872 (New York: Knopf, 1976); and David M. Katzman, Seven Days a Week: Women and Domestic Service in Industrializing America (New York: Oxford University Press, 1978). According to Katzman, in 1870, 50 percent of all women wage-earners in the United States were domestic servants.

Quote is from Katzman, Seven Days, 111.


Ibid., 13.

One estimate puts slaves' annual hours at 2,798; however, this does not rely on direct evidence on the length of the workday. See Robert W. Fogel and Stanley L. Engerman, "Explaining the Relative Efficiency of Slave Agriculture in the Antebellum South," American Economic Review, 67, 3 (June 1977): 275–95. They also cite 3,130 hours as the early twentieth-century annual average for Northern farmers.


Pinchbeck, Women Workers, 232–33.

29. Cited in Stansell, City of Women, 262, n. 34.


31. This dynamic operates with piece-rate workers as well. A recent study makes the point: although employees were permitted to schedule their breaks whenever they pleased, they were obliged to be on the floor a total of eight hours per day. See Hersch, "Allocation of Time," 872.

If there are fixed costs of hiring and firing, such as personnel costs, training costs, severance pay, and so forth, then firms have an interest in longer hours. Fringe benefits are currently the most important cause of such a bias, as I will argue later. An early treatment of the fixed-cost argument was made by H. G. Lewis in his 1969 unpublished paper, "Employer Interests in Employee Hours of Work."


33. The "contract" which exchanges a worker's time for an hourly wage is "incomplete" in that the actual amount of labor to be done, the quality of that labor, and the precise nature of the tasks to be carried out are left unspecified. From the employer's point of view this ambiguity is often necessary. There are too many uncertainties, too many contingencies, to write a fully specified contract beforehand. Ambiguity also serves another purpose: it would be far more difficult for labor and capital to come to a mutually-agreed-upon definition of exactly what the work process consists of than it is to complete the straightforward transaction of dollars per hour. Economists have recently explored the effects of these contracts. See the collection by George Akerlof and Janet Yellen, Efficiency Wage Models of the Labor Market (Cambridge: Cambridge University Press, 1986).


37. Ford denied women eligibility for the pay increase on the grounds that they were not breadwinners. An alternate interpretation is that women were excluded because they presented fewer discipline problems: they did not drink as much and were more punctual.


Of course, employment rents were not the only effective strategy used by firms. A substantial literature has detailed a variety of other mechanisms, such as managers' monopoly on technical expertise, the use of bureaucratic "rules" to control behavior, and tactics of divide-and-conquer. Furthermore, it would be wrong to think that capitalists "solved" the problem of labor discipline. Even a passing acquaintance with the labor relations debates of the 1980s should put the lie to that idea. My claim is much more modest: that development of employment rents played a major role in stabilizing and containing problems of labor discipline in twentieth-century America.

39. So far, I have been deliberately vague about the exact definition of the employment rent. Although a variety of alternatives are possible, a standard formulation is the following: annual employment rent = annual income in original job minus [(weeks unemployed × weekly unemployment income) + (weeks at new job during year × weekly earnings in new job)].


40. In Johnson's case, this will be true as long as some period of unemployment is anticipated, or alternative jobs do not offer a comparable wage rate.

41. For the argument that reductions in daily hours can pay for themselves if the employment rent is not reduced, see Chapter 6, pages 152–57. The second argument put forward here is an "evolutionary" one: once a long hours equilibrium is established, there will be forces to perpetuate it. This will especially be the case if a shorter hours equilibrium is not more profitable than a long hours one.

42. Some readers may object to this analysis, pointing out that in recent years, employers have been eager to hire part-time workers. This development does not vitiate my point. In the first place, the lack of benefits can make these workers cheaper. (Part of the reason management is unwilling to pay benefits to part-time workers may be that they are, *ceteris paribus*, less profitable, for the reasons I have argued.) Second, I suspect that the substantial increase in employment rents during the 1980s (due to the rise of unemployment rates) has increased employers' room for maneuver, and that the growth of part-timers is one consequence.

43. Quote from Raff and Summers, "Did Henry Ford?" 881.


44. Quote from a forty-one-year-old automobile worker, in Laurie Sheridan, "Interviews on Working Hours," unpublished mimeo.

45. A classic work is Josephine Goldmark's *Fatigue and Efficiency: A Study in Industry* (New York: Charities Publication Committee, 1912). For a recent test of this hypothesis, which supports it, see Jeremy Atack and Fred Bateman, "How Long Did People Work in 1880?" mimeo, University of Illinois, 1989.

This discussion raises a number of complex issues surrounding our analysis of the employment rent and its effect on hours. If the employment rent is defined purely in income terms, then the employer will prefer to raise hours until physical constraints begin to impair productivity. If the estimated value of the employment rent also includes a value for leisure time, it may begin to fall after some level of hours, which limits employers' desired hours. The actual rate of the value of leisure time is empirically unclear, given the difficulties involved in measuring it. A second issue involves the neoclassical claim that on the margin employers will offer workers just that combination of pay and hours that maximizes their utility. In the neoclassical world, employers' preferences for long hours will have no particular effect, as employees choose their optimal level of hours. My approach is different, and implies that employers do not optimize on the hours margin, but rather set hours that employees adapt to. (The reasons for this are somewhat obscure, but I suspect that employers' preference for long hours is the underlying cause.) While this view is at variance with neoclassical theory, there is now a growing empirical literature to support it, which I discuss in chapter 5. Institutional labor economists have long denied that firms optimize on the hours margin. For more discussion of these issues, see Juliet B. Schor, "The Underproduction of Leisure: The Economics of Output Bias," mimeo, Harvard University, November 1990.

46. I have not found any evidence on why fringe benefits have taken this form.


49. H. G. Lewis, "Employer Interests.

50. Martin Morand, Indiana University of Pennsylvania, private communication, July 1987, on USX.

51. Solidarity, June 1990, p. 11, on auto industry.


55. Kanter, Men and Women, 65.
56. Sheridan, "Interviews."
57. Quote from ibid.

For a discussion of the fact that small firms face higher costs, see Charles Brown, James Hamilton, and James Medoff, Employers Large and Small (Cambridge, Mass.: Harvard University Press, 1990), 40-42.
58. Estimates are my own from the Current Population Survey. Weekly hours for men in the professional, technical, executive, and managerial categories rose from 47.0 to 47.8 from 1979 to 1987. Women's hours rose from 43.4 to 44.3 over that period. Annual hours also rose—by roughly 30 for men and 112 for women.

59. On Massachusetts, see Hill, Puritanism, 141. See also Daniel T. Rodgers, The Work Ethic in Industrial America 1850-1920 (Chicago: University of Chicago Press, 1978). Although it was a powerful force, it is important to remember that the work ethic was mainly a white bourgeois Northeastern ideology.

"Elevation of work" from ibid., 7.
"Never penetrated very far" is from ibid., 15.
None of this is to deny that for some, work is an addiction. The problems of "workaholics" cannot be solved solely with structural changes, but require personal transformation.

The desire to escape authority and attain control in one's job is very strong.
61. The workweek is estimated at 70 hours for 1850. See Joseph S. Zeisel, "The Workweek in American Industry 1850-1956," Monthly Labor Review, 81 (1958): 23-29, chart 1, p. 24. For the range of estimates in manufacturing, which are lower, see Whapples, Shortening the Work Week, 33, table 2.1. In the postwar period the full-time workweek (for nonagricultural workers) has generally stood at 43 hours, and for all workers (all industries, all schedules)

is now in the neighborhood of 39 hours. See Bureau of Labor Statistics, Employment and Earnings and unpublished data.
62. Roediger and Foner, Our Own Time, 7, 56.

64. Whapples, Shortening the Work Week.
65. Roediger and Foner, Our Own Time, 22, 57, 141.

On NAM and Saturday work, see Hunnicutt, Work Without End, 40. One prominent executive proclaimed that "any man demanding the forty-hour week should be ashamed to claim citizenship in this great country."
66. Bienefeld, Working Hours, 177.

The "real" rate of unemployment roughly doubled during the 1980s, if one includes discouraged workers (those who have given up looking for a job but still want work) and those who are involuntarily working part-time. The government collects data on these categories, but excludes them from the unemployment rate. More ambitious measures would also include involuntary part-year workers and involuntary early retirees, and would drive the jobless totals up even more.


70. Roediger and Foner, Our Own Time, 259.
wages declined in all but the very top income group. For this 80 percent of American families, the modest goal of maintaining a constant level of income is likely to have required increases in work effort. See Stephen Rose and David Fafanest, "Family Incomes in the 1980s: New Pressures on Wives, Husbands, and Young Adults," Working Paper 103, November 1988.

Seventy-nine percent of those polled believe that "it is getting to be impossible to support a family on just one income." Half (52 percent) agree strongly with that statement. See MassMutual Family Values Study (Washington, D.C.: Mellman & Lazarus, 1989), 36. In the words of one Chicago housewife: "You either buy a home, both of you work and your kids suffer, or one of you works and you live in a rental. Paying rent feels like digging a hole and crawling right in." Cited in Sylvia Ann Hewlett, "Running Hard Just to Keep Up," Time, Special Issue entitled Women: The Road Ahead (Fall 1990): 54.

78. Author's calculations from the changes in average hourly earnings of production and nonsupervisory workers, Economic Report of the President (Washington, D.C.: Government Printing Office, 1991), 336, table B-44. In constant 1990 dollars, the 1973 wage rate was $11.31 and the 1990 wage rate was $10.03. At the 1973 level of 1,919 annual hours, the difference in annual incomes is $2,456. At $10.03 an hour, it requires 245 additional hours to make up this amount.


Chapter 4. Overwork in the Household

1. The Michigan studies, on which my estimates are based, yield much lower estimates of household work, and especially child care, than virtually all the others for at least two reasons. First, recall methods typically yield higher hours than diary methods. Second, Michigan uses a restrictive definition of child care. According to Joseph Pleck, the higher estimates are more consistent with small-scale studies. My estimates should be seen as conservative, lower bounds. See Joseph H. Pleck, Working Wives, Working Husbands (Beverly Hills: Sage, 1985), 48–49.


3. Nancy Folbre, "The Unproductive Housewife: Her Evolution in Nineteenth-Century Economic Thought," Signs, 6, 3 (Spring 1991): 463–84. Statistical conventions have helped to define and perpetuate this devaluation of domestic labor. According to Folbre, in the early federal censuses, families were considered as entities, and allocated to specific sectors of the economy. It was not until 1850 that individuals' occupations were requested by enumerators, and