Public Sector as Pioneer:
shorter working weeks as the new gold standard

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Contents

● Executive Summary

● Section 1: Pioneering shorter working weeks within public sector organisations
  ■ Why the public sector?
  ■ How much would it cost the public purse?
  ■ Which areas of the UK would it affect the most?

● Section 2: Pioneering shorter working weeks through relationships with the private sector
  ■ The role of public sector procurement in shaping market outcomes
  ■ A resurgence in socially-oriented public procurement

● Data sources

● References
Executive Summary

• A shorter working week in the public sector (with no loss in pay) is badly needed: burn out, work-related poor mental health and bad work-life balance plague public sector staff across organisations.

• A 32-hour week in the public sector is not just desirable for worker wellbeing and for reducing the costs of burn out and presenteeism; a 32-hour week would also create hundreds of thousands of jobs and establish a new standard for all employment in the UK.

  ▪ It would create between 300,000 and 500,000 new full-time equivalent jobs in the sector.

• Public sector employment takes up a relatively high proportion of employment in Wales, the North of England and Scotland – entailing that a 32-hour working week would benefit regions that have felt the hardship of austerity most.

• Such a policy is eminently affordable and achievable: on Autonomy’s conservative calculations a 32-hour week could cost around £9bn, but the true figure could be much lower at around £5.4bn.

  ▪ This figure is only 6% of the public sector employment salary bill and just over 1% of the total government spending budget.

• In addition to the public sector pioneering through its own working practices, we outline how procurement strategies aimed at private sector partners can encourage broader change across the UK labour market.
Section 1: Pioneering shorter working weeks within public sector organisations

Why the public sector?

Workers in the public sector often experience high levels of mental health problems relative to those in other lines of employment. A report by the BMJ (2017) found that public sector workers (15%) were more likely than those in the private sector (9%) to report poor mental health, and more likely to report anxiety at work on several occasions over the past month (53% versus 43%). The British Psychological Society reported that nearly half of its NHS-employed members had recently experienced depression (BPS, 2017).

A recent study by The Nuffield Foundation (2020) found that around 5% of teachers today are suffering long-lasting mental health problems, up from 1% in the 1990s, with a similar increase in prescribed antidepressant medication. This likely accounts for why employee retention in the sector is incredibly low, with the study further reporting that a third of new teaching recruits leave the job within the first five years (The Nuffield Foundation, 2020).

Beyond problems of recruitment and retention, Deloitte (2017) estimates that poor mental health in the public sector costs £1,794 – £2,174 per annum, per employee through presenteeism and absenteeism. In 2018/19 the government’s own study concluded that stress, depression or anxiety accounted for 44% of all work-related ill health cases and 54% of all working days lost due to ill health. The main work factors cited by respondents as causing these work-related strains were workload pressures.

A report by Johnson et al. (2017) also linked the high degree of mental health problems among public sector workers to significant overwork, stress and burnout. These findings are repeated in a survey on public and voluntary sector stress by The Guardian, which found that 93% of respondents were stressed at work, some, all or most of the time. Of those who said they were stressed all of the time at work, almost all reported working beyond their contracted hours (Guardian, 2015). On average, respondents put in an extra seven hours a week (Guardian, 2015). This represents a growing problem. Double the amount of NHS staff left due to problems of work-life balance in 2015 compared with 2011 (Johnson et al., 2017).
By preventing overwork and reducing stress, shorter working hours would reduce the prevalence of mental health problems among public sector workers. This would not only improve the wellbeing of employees but would help institutions retain staff at a time when turnover is incredibly high. All of these factors will, in turn, help productivity across public sector organisations.

As well as reducing stress and enhancing the free time of public sector workers, shorter working hours would reduce the potential for mistakes in lines of work where an error can be the difference between life and death. Medical mistakes become much more likely when practitioners are overworked and fatigued, with several studies pointing out that overwork can lead to serious accidents or diagnostic errors (Sparks et al., 2011) (Landrigan et al., 2004). Hospital workers, for instance, can make up to five times as many diagnostic errors when working excessively long weeks (Landrigan et al., 2004).
Which areas of the UK would a public sector shorter working week affect the most?

As Figure 1 below shows, public sector employment is concentrated in Scotland, the North of England and Wales, pointing to the potential regional effects of a 32-hour working week policy. Consider the so-called ‘Red Wall’ areas, including Barnsley, Bradford and Doncaster: around 20% of overall employment in these and surrounding areas exists in the public sector. Outside of London, the South East and West have relatively low rates of public sector employment (with some exceptions). A 32-hour working week in the public sector will therefore benefit those regions that have been worst hit by unemployment and deprived public services during the austerity decade and the Covid crisis.

![Figure 1: Public sector employment as a % of overall employment across local authorities in the UK. Source: ONS 2019 (ASHE), ONS 2020a.](image-url)
How much would it cost the public purse?

\[ \sim \£9bn \]

= Just 6% of the public sector employment salary bill.
= Just 1% total government spending budget.
= Between 300,000 and 500,000 new jobs created

The calculations use the following figures from the 2019 Annual Survey of Hours and Earnings tables:

1. There were 3,637,000 full-time public sector employees in 2019
2. The average full-time public sector employee had a basic work-week of 36.4 hours
3. The average full-time public sector employee had gross annual earnings of £35,233

Note that we are using basic working hours, i.e., working hours excluding overtime, alongside gross earnings, i.e., earnings including overtime. Thus, the exercise is predicated on a reduction of the normal working-week to 32 hours, as some public sector workers have to work overtime, including doctors, nurses, midwives, the police, the fire brigade, paramedics, and so on, and this will continue if a four-day week model is adopted.

Given these figures, the basic person-hours of full-time public sector employees in an average week in 2019 was 132,386,800 (i.e., 36.4 x 3,637,000).

**Gross cost with no productivity gains**

To maintain the same basic person hours if the average full-time employee worked a 32 hour basic week rather than a 36.4 hour week, and assuming no increase in productivity, the public sector would require 4,137,088 employees (i.e., 132,386,800 ÷ 32). This would require 500,088 extra full-time employees, at a gross cost of £17.6 billion.
Gross cost with productivity gains

However, it is unrealistic to expect no productivity gain whatsoever from a shorter working week, given the available evidence and successful implementations (see Autonomy, 2019). We therefore consider two potential productivity increases as a result of moving to a four day week: 2.5% and 5%. Initially, with no productivity gain, the 32 hour basic week requires 4,137,088 employees to achieve a fixed public sector weekly output. The formula linking this output with labour input is given by,

\[ 4,137,088 \times 32 \times A = Q, \]

where \( A \) denotes hourly labour productivity (output per hour) and \( Q \) denotes output. Now, let us suppose that productivity increases by some multiple \((1+a)\) and that the number of employees adjusts to keep output and hours constant. Thus, we have,

\[ E \times 32 \times (1+a)A = Q, \]

where \( E \) denotes the new number of full-time employees. Combining these two equations yields,

\[ 4,137,088 \times 32 \times A = E \times 32 \times (1+a)A \]

and thus,

\[ E = 4,137,088 \div (1+a) \]

So a 2.5% productivity gain would require 4,036,183 full-time employees (i.e., \( 4,137,088 \div 1.025 \)). This would require 399,183 extra full-time employees, at a gross annual cost of £14.1 billion.

Alternatively, a 5% productivity gain would require 3,940,083 full-time public sector employees (i.e., \( 4,137,088 \div 1.05 \)). This would require 303,083 extra full-time employees, at a gross annual cost of £10.7 billion.

Net cost with productivity gains: how much does a public sector employee cost?

According to the www.gov.uk income tax calculator, an individual earning £35,233 per year on the most common tax code would pay £4,545 income tax and £3,088 national insurance, leaving a disposable income of £27,600.

Calculating how much indirect tax net of benefits paid by individuals is difficult, as a lot of benefits and expenditure taxes are determined by household income, rather than personal income. However, according to the Effects of Taxes and Benefits on Household Income, UK, 2018/19 reference tables, an individual living in an average household pays £5,909 per year in
indirect taxes gross of benefits, excluding intermediate taxes and excluding council tax. A conservative ballpark for indirect taxation is therefore £6,000, yielding a conservative post-tax income of £21,600. This is an effective overall tax rate of just under 40%.

**Accounting for lost tax income from private sector employees**

If a newly arrived immigrant or school-leaver were employed as a full-time public sector employee at the average wage, an effective tax rate of 40% would imply a net wage cost to the public sector of 60% of £35,233, or £21,140. However, some new public sector employees will move from existing private sector jobs. The tax income from these employees net of lost taxes from previous employment would therefore be lower than 40%, and could even be negative if the employee transferred from a higher paying private sector job. Unfortunately, this is impossible to estimate with any precision, but is likely to be somewhat less than 40%.

Given the above, we consider two conservative effective tax rates, net of lost tax income from previous employment: 20% and 10%. Combining these two effective tax rate scenarios with our two productivity scenarios gives four potential costs to the public sector of a four day, or 32-hour week:

**Key:**

High tax rate = 20%
Low tax rate = 10%

High productivity gain = 5%
Low productivity gain = 2.5%

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Finally, if we remove £3.12 billion of estimated overwork costs to the public sector (Autonomy, 2019), we arrive at a final overall cost matrix of:

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<td><strong>High tax</strong></td>
<td>5.4</td>
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<tr>
<td><strong>Low tax</strong></td>
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Taking into account savings to the public sector from overwork, the total cost to the public sector of moving to a four day week is therefore likely to be in the region of £5 billion to £10 billion. Without taking into account the costs resulting from overwork, the total cost is likely to be in the region of £8 billion to £13 billion. The average cost over each of these 8 potential scenarios is £9 billion, which is in the region of 6% of the total public sector salary bill in 2019 (of approximately £155 billion according to ASHE). This amounts to just over 1% of overall public spending.
Section 2: Pioneering new working weeks through relationships with the private sector

The public sector is a very important employer in large parts of the UK, employing 3,637,000 full-time public sector employees. Shorter working weeks in the public sector in areas of the country where public sector employment is particularly high could help push towards reduced working hours as a social norm — i.e. *l'état exemplaire*. With the added headcount forecasted for implementation in Section 1, the number of jobs with better work-life balance would be increased to over four million. However, the public sector is also a crucial procurer of goods and services.

The role of public sector procurement in shaping market outcomes

In areas with lower public sector employment, procurement based on select criteria could be utilised to encourage private sector contractors to adopt shorter working weeks as part of working agreements. Using tendering processes to give preference to firms that meet work-life balance targets — and in general, labour practices and hourly wages that go beyond the legal minimum — public sector organisations across the country could embed reduced working hours as a new standard across the economy.

The use of public procurement to achieve policy goals has a long history. In the UK, government contracting was used to provide work for disabled ex-servicemen after the First World War, and this was extended to the rest of the disabled population after the Second World War (McCrudden, 2007). The geographical distribution of procurement spending was also used to provide support to depressed regions in this country after the 1930s (Barnard, 2017), but in general the use of procurement policy to achieve social goals declined in importance from the 1980s onward.
A resurgence in socially-oriented public procurement

- Over the last decade, however, the tide has turned back toward the use of procurement policy as an active policy lever, at least in Europe. This followed the introduction of three directives on public procurement in 2014 within the European Union, which explicitly permit member states to take social objectives into account when awarding procurement contracts. In turn, this followed the earlier proactive examples of some member states, e.g. the incorporation of sustainability criteria in Dutch government procurement contracts from 2005 onward (Ludlow, 2016).

- Within the UK, the example of Preston Council has been well documented. Recognising that significant value was leaking out of the local economy, in 2012, the council began a progressive procurement strategy to shift spending toward local goods, services and suppliers. In 2016/17, an analysis of spending in the local economy found that the value of the procurement spend retained in Preston was £112.3 million, up £74 million on figures from 2012/2013 (CLES and Preston City Council, 2019). By retaining value in the local economy, progressive procurement has shaped the local area for the better. In this context, the 'community wealth building' work of CLES is a key resource.

- The Scottish government has taken a leading role in advancing social goals via procurement policy. Since 2014, all public sector contracting authorities in Scotland have been required to consider community benefit requirements for all contracts worth £4 million or more, as well as requirements related to sustainability.

- Sutherland et al. (2015) have demonstrated that community benefit requirements are widespread in Scotland, and have been effective in meeting certain social goals including improvement of labour market outcomes for certain priority groups. In addition, they argue that many contractors now view community benefit clauses as ‘business as usual’, and proactively adopt them in their business models (ibid., pp.9). The Scottish experience suggests that community benefit clauses could be profitably used on a UK-wide basis, and that they can in fact embed positive practices as social norms.
Data sources:

Gov.uk income tax calculator, accessed 12th August 2020, at: https://www.tax.service.gov.uk/estimate-paye-take-home-pay/your-results


References:


BMJ (2017). Lack of mental health support in the public sector. See: https://www.bmj.com/content/357/bmj.j2731


Nuffield Foundation (2020). Has the mental health and wellbeing of teachers in England declined over time? New evidence from three datasets. See: https://www.nuffieldfoundation.org/news/more-teachers-reporting-mental-health-problems-than-ever#-text=The%20findings%20show%20that%20around%20just%201%01%25%20of%20the%201990s
