

Is the public sector pay advantage explained by differences in work quality?

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Forthcoming in Felstead, A, Gallie D and Green, F (eds) *Unequal Britain at Work*, Oxford: Oxford University Press.

Popular Perceptions of Sector Differences

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Public v private sector: Is the grass greener?

Research suggests private sector workers think the public sector has it better, but are they right? Two health managers who swapped spheres tell David Brindle about the pros and cons



David Brindle
The Guardian, Saturday 23 January 2010

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Popular Perceptions: (a) Better Pay

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MPs' pay rise: Scandal of £7,600 salary leap - '1% for us and 11% for them'

Dec 09, 2013 00:00 By Jason Beattie 39 Comments

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It will be a huge slap in the face to workers who have endured wage decreases in real terms since the last election



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AIR RAGE
Ralph Lauren's piece

- The *unadjusted* difference in average pay suggest higher pay in the public sector
- Parity would save £6.3bn a year (Policy Exchange)
- High profile pay rises for MPs reinforces the better pay image

Popular Perceptions: (b) Better Quality Work



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Despite budget cuts private sector staff think grass is greener in the public sector

David Woods , 29 Jan 2010



Private sector staff are envious of their public sector counterparts on issues including job security, training and workplace stress.

Is the grass really greener?

What private-sector workers think is better about the public sector



Do Public Sector Workers Really Enjoy a ‘Double Premium’?

- The popular perception is that public sector workers enjoy the best of both worlds
- This is contrary to the theory of compensating wage differentials – pay levels reflecting non-monetary benefits
- Aim is (a) to provide more evidence on sectoral differences in intrinsic work quality; (b) examine the extent to which these differences may account for the pay gap (over and above previously used controls)

Accounting for the Public-Private Sector Pay Gap

- Using LFS and ASHE data, large parts of the *unadjusted* pay gap have been accounted for by factoring in personal and employment-related characteristics
- Research by IFS suggests an overall 8% differential
- But when other factors are controlled for (such as workplace size) the gap disappears completely for men and shrinks significantly for women
- However, previous research has not controlled for the quality of work aspect of the 'double premium'

What Do We Know About Sectoral Differences in the Quality of Work?

- Popular perceptions are based on thin evidence
- But expectations that the public sector is likely to be a 'good employer' offering better terms and conditions
- Based on historic notions of the civil service in the mid-nineteenth century – not necessarily a high payer but offering greater job security, more consultation and fair treatment of employees
- The institutional environment also more conducive to better work quality (unionisation higher and regulation stricter)

Empirical Approach

- Examine inter-sector differences in job quality using *descriptive* statistics focused on: job skills; discretion and autonomy; work intensity; and insecurity and anxiety at work
- Examine what effect these work quality indicators have in explaining the unadjusted public-private sector pay gap using a series of *regression* models (in addition to, and separate from, previously used controls found in LFS and ASHE)

Skills and Employment Surveys Series Dataset (1986-2012)

- Social Change and Economic Life Initiative, 1986
- Employment in Britain, 1992
- Skills Survey, 1997, 2001, 2006
- Skills and Employment Survey, 2012
- Repeated cross-sectional survey of workers in Great Britain
- Main topics include
 - skills at work
 - quality of work
 - training and skills development
 - terms and conditions of employment
- Weights to account for differences in probability of sample selection, the over-sampling of certain areas and some small response rate variations between groups

Sector Definitions

- Sector definitions are based on self-reporting by respondents
- Here the public sector is defined as ‘a public sector body such as local or national government, schools or the health service’
- Non-profit organisations are categorised as the private sector (following ONS guidelines)
- For consistency, the focus is restricted to 1997-2012 surveys (max n=15,896; 30.8% public sector)

Pay Data

- Unlike LFS and ASHE, SES contains data on *both* pay and a range of measures of job quality
- The public-private sector pay gaps were compared across the three data sources
- Variation to be expected given sample and measurement differences
- But SES gives an unadjusted gap of 10-15%, which is greater for women and has declined – similar patterns observed in LFS and ASHE

Table 1: Public-Private Sector Percentage Pay Gaps, Gross Hourly Pay, 1997-2012

	1997			2001			2006			2012		
	SES	ASHE	LFS	SES	ASHE	LFS	SES	ASHE	LFS	SES	ASHE	LFS
All	14.4	8.1	15.7	10.7	3.3	8.4	11.7	9.5	10.4	12.9	15.7	10.0
Men	12.1	8.1	13.5	11.4	4.0	8.7	8.0	11.7	10.2	13.9	18.3	8.5
Women	33.8	25.6	31.6	24.1	19.3	20.3	26.8	23.6	22.3	19.5	28.7	22.2

Notes: The above figures are a percentage differential which is calculated as (public sector average wage-private sector average wage)/private sector average wage)*100.
SES estimates are trimmed (1 per cent top and bottom) throughout.

Table 2: Public-Private Sector Gaps in the Non-Wage Quality of Work, 1997-2012

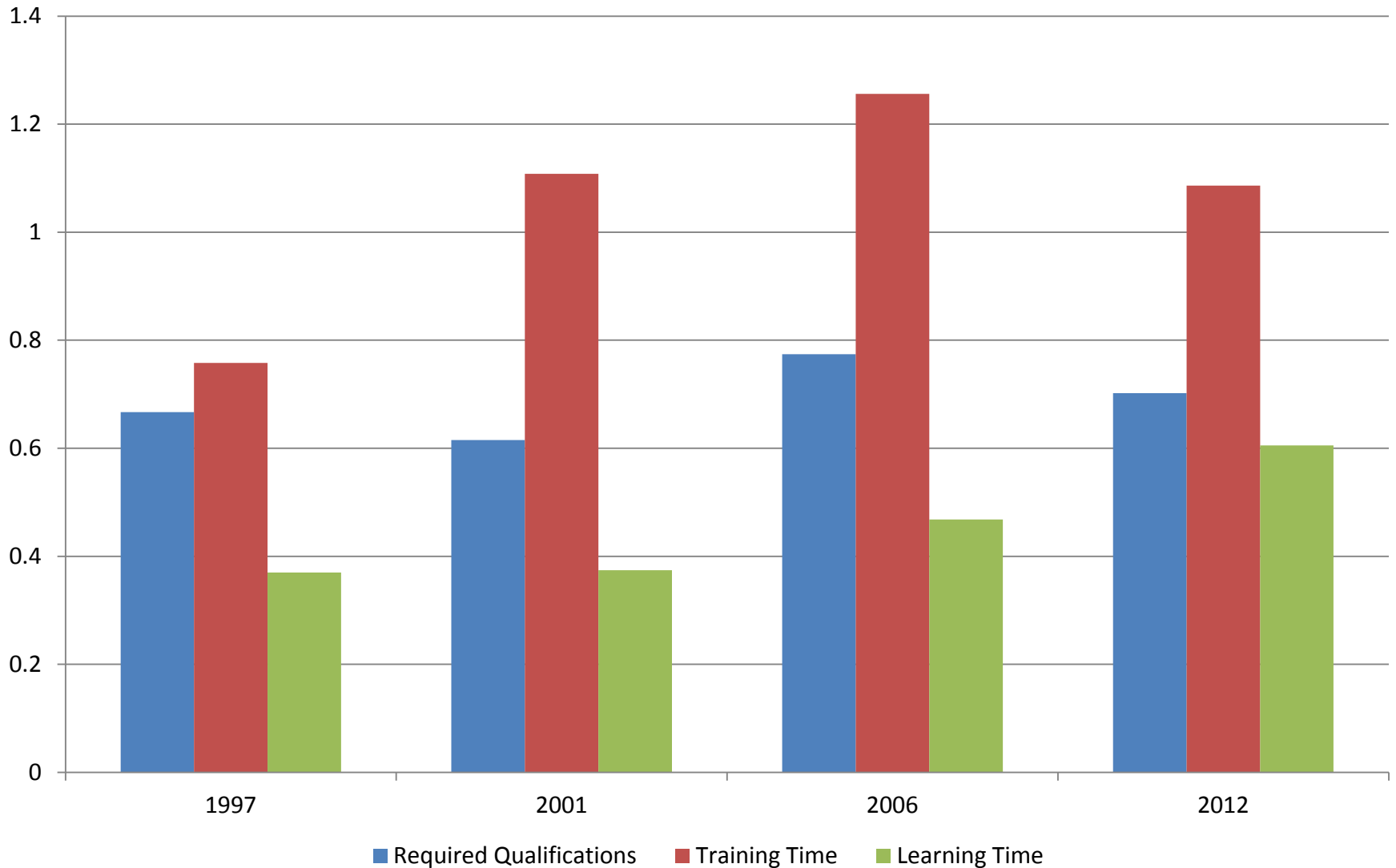
Dimensions of the Quality of Work (1)	1997	2001	2006	2012	2012 Interaction Coefficient (6)
	Public-Private Sector Gap (2)	Public-Private Sector Gap (3)	Public-Private Sector Gap (4)	Public-Private Sector Gap (5)	
A. Skill Requirements (scale differences)					
Required qualifications	0.667***	0.615***	0.774***	0.702***	0.035
Training time	0.758***	1.108***	1.256***	1.086***	0.328
Learning time	0.370***	0.374***	0.468***	0.605***	0.235*
Literacy	0.470***	0.434***	0.480***	0.456***	-0.014
Numeracy	-0.290***	-0.289***	-0.184***	-0.183***	0.107
Physical skills	-0.328***	-0.117***	-0.177***	-0.134**	0.194**
Influence skills	0.357***	0.308***	0.331***	0.329***	-0.028
Planning skills	0.291***	0.236***	0.244***	0.253***	-0.038
Client communication skills	0.011	-0.083**	-0.096***	-0.177***	-0.188***
Problem-solving skills	0.061	-0.018	0.040	-0.037	-0.098
Checking skills	-0.043	-0.056*	0.030	na	0.073
Emotional skills	na	na	0.362***	0.398***	0.036
Aesthetic skills	na	na	0.226***	0.245***	0.019
Computer-use skills	0.153*	0.158**	0.433***	0.307***	0.153
Sophisticated computer-use skills	0.087	0.098**	0.240***	0.148***	0.060
B. Discretion at Work (scale and percentage point item differences)					
Task discretion index	0.069**	0.006	-0.001	0.020	-0.049
Supervision index	-0.017	0.061**	0.127***	0.006	0.023
A great deal of say in decisions which change the way you do your job	na	-4.3***	-8.0***	-7.4***	0.661*
Should you have more say in decisions which affect work	na	2.3	10.7***	8.9***	1.31**

C. Work Intensity (percentage point item differences)					
Strongly agree: 'my job requires that I work very hard'	9.2***	8.6***	12.3***	11.8***	1.09
Strongly agree: puts a lot of effort into job beyond what is required	2.1	2.8	4.0**	5.3**	1.17
D. Perceptions and Experiences of Insecurity (percentage point item differences)					
A chance of job loss	0.7	-7.2***	-3.7***	3.9*	1.18
Recent work reorganisation	na	7.1***	5.7***	10.0***	1.14
In future may have less say in job	na	na	na	11.2***	na
In the future may have less ability to use skills	na	na	na	5.2**	na
In the future may have pay reduced	na	na	na	10.7***	na
In the future may be moved to a less interesting job	na	na	na	5.3**	na

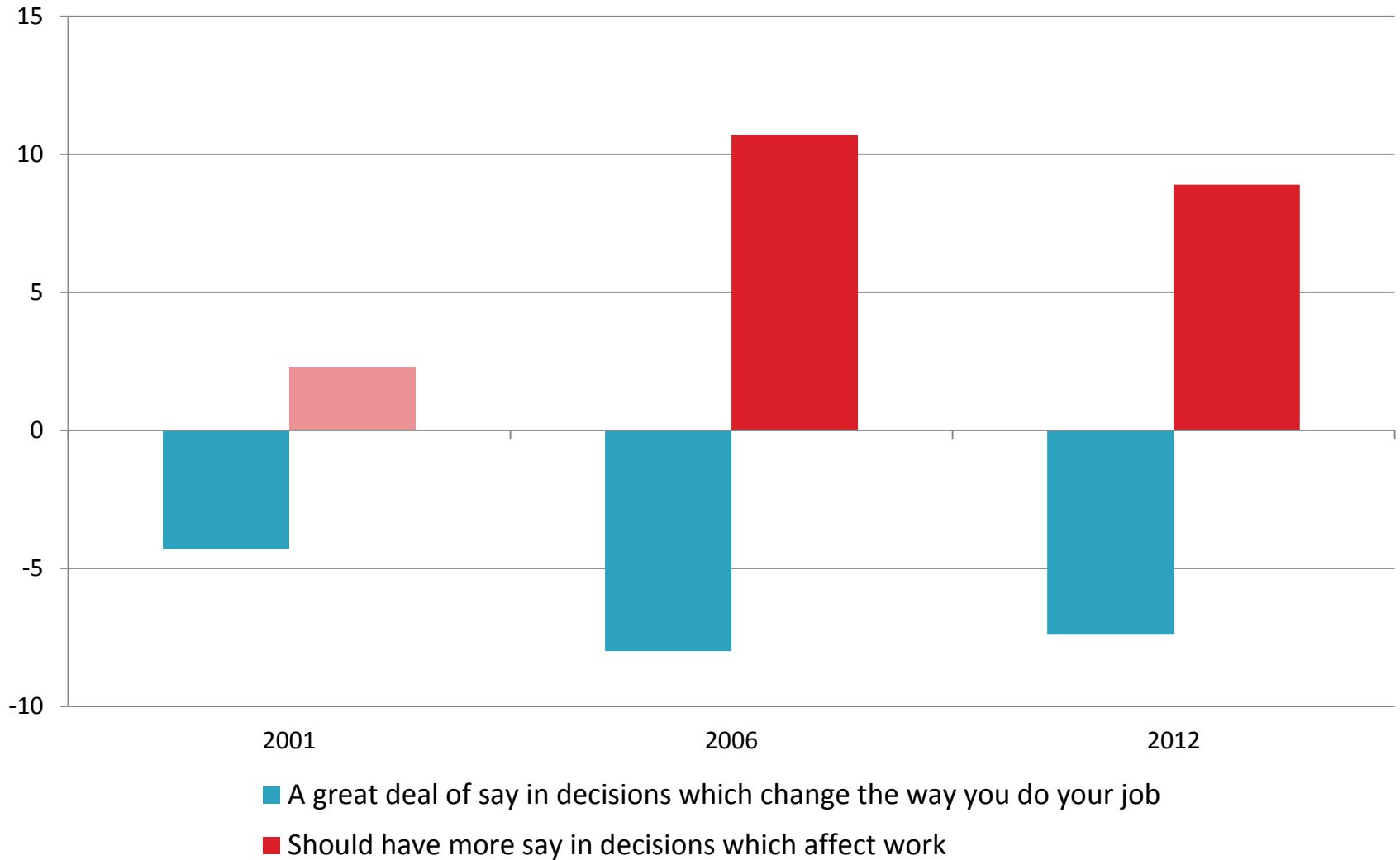
Notes: Both the descriptive data (columns 2-5) and regression results (column 6) are weighted. Columns 2-5 report t-tests of the public-private sector from the private sector differences, while column 6 reports the 2012*sector interaction variable (i.e. whether the public-private sector gap in 2012 is significantly larger than the gap in 1997 or the earliest year for which data are available). For linear regressions, the interaction coefficient equates, subject to rounding, to the difference between column 5 and 2. For logistic regressions (where items are reported using percentages), the interaction coefficient presented in column 6 is the odds ratio. *, **, *** indicate statistical significance at the 10%, 5% and 1% level respectively 'na' denotes question not available at the survey point.

Source: SES

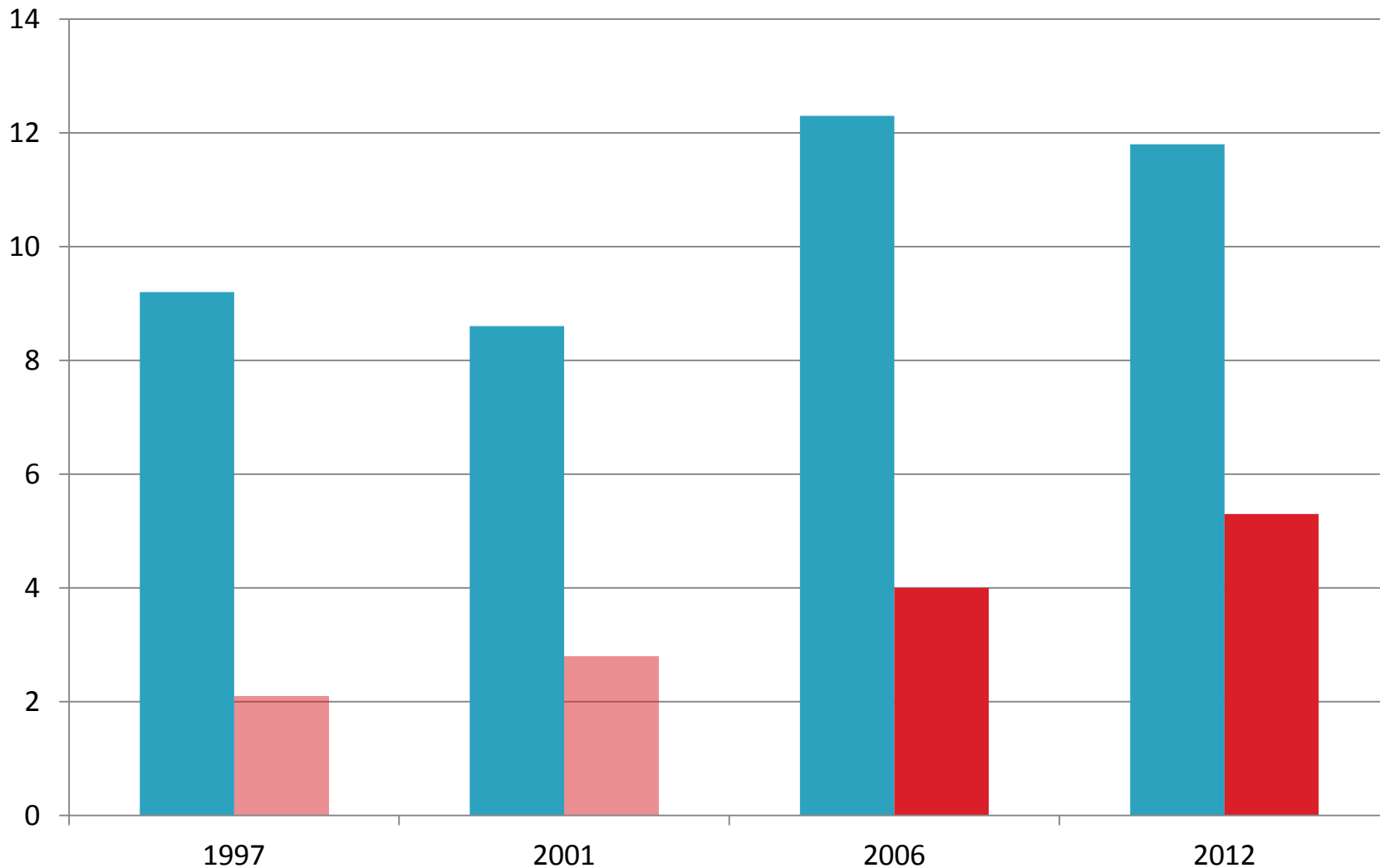
Public-Private Sector Gap: Skill Requirement



Public-Private Sector Gap: Discretion and Autonomy at Work

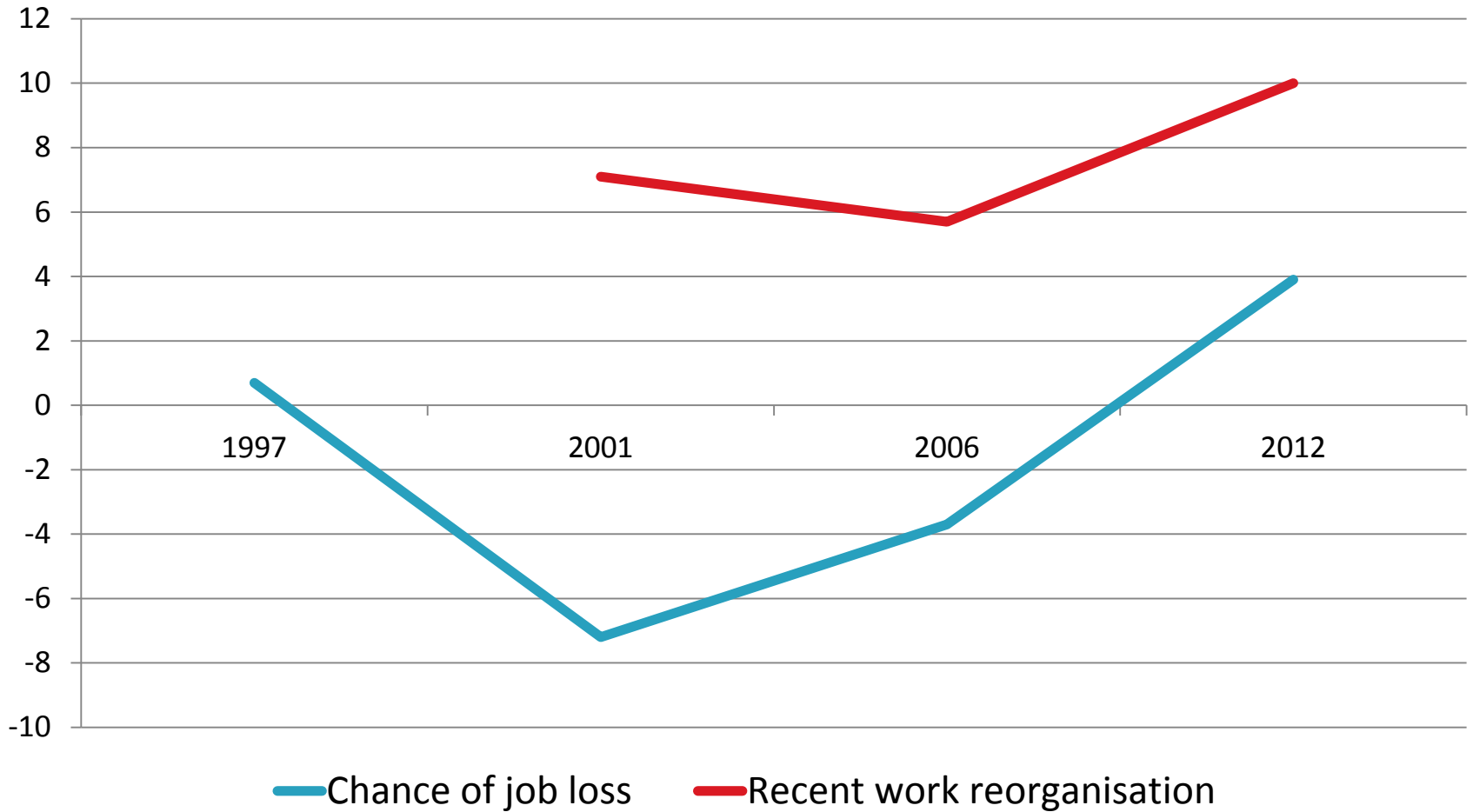


Public-Private Sector Gap: Work Intensity

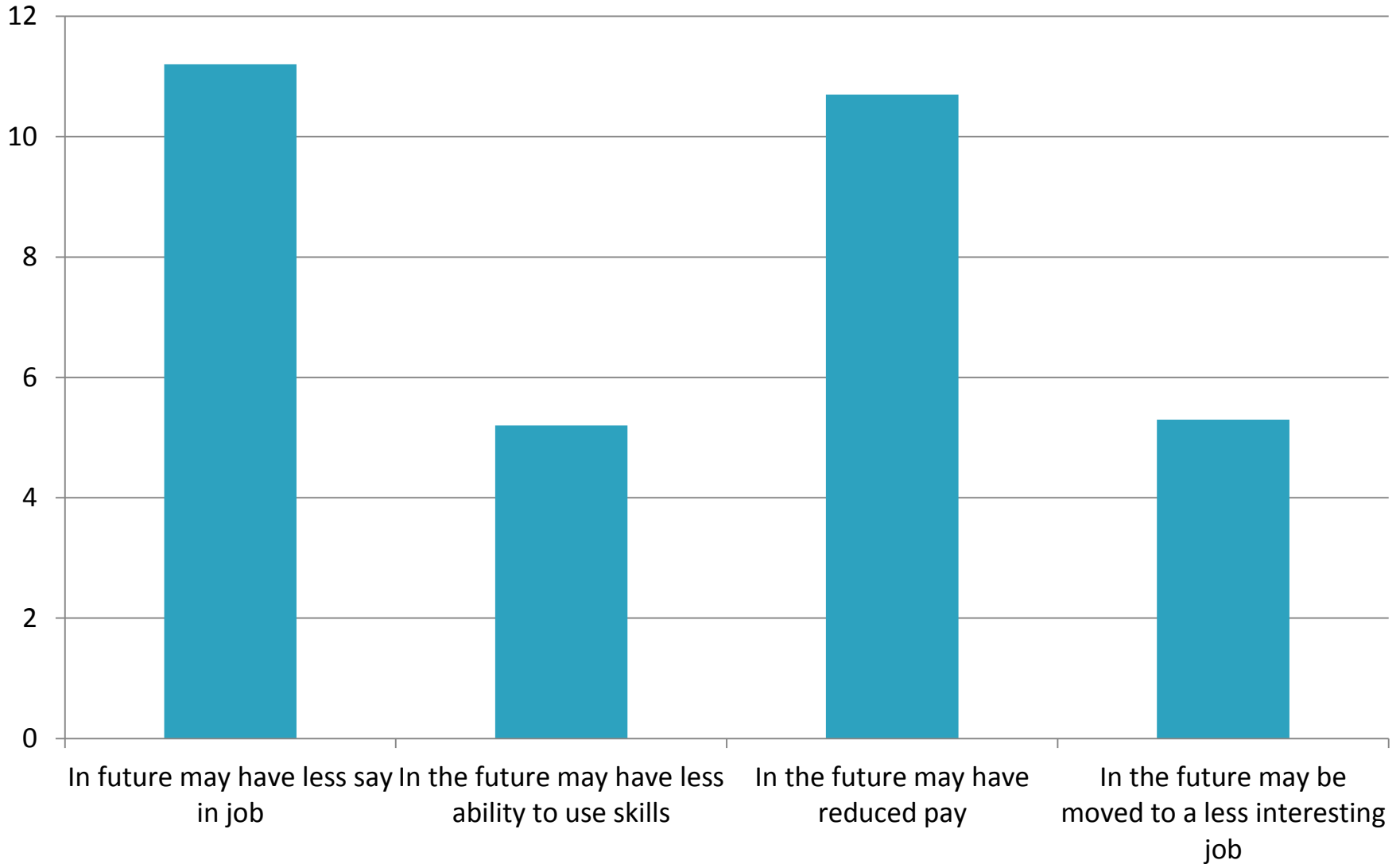


- Strongly agree: 'my job requires I work very hard'
- Puts a lot of effort into job beyond what is required

Public-Private Sector Gap: Perceptions of Insecurity



Public-Private Sector Gap: Sources of Anxiety



Public Sector Pay Gaps, 1997-2012

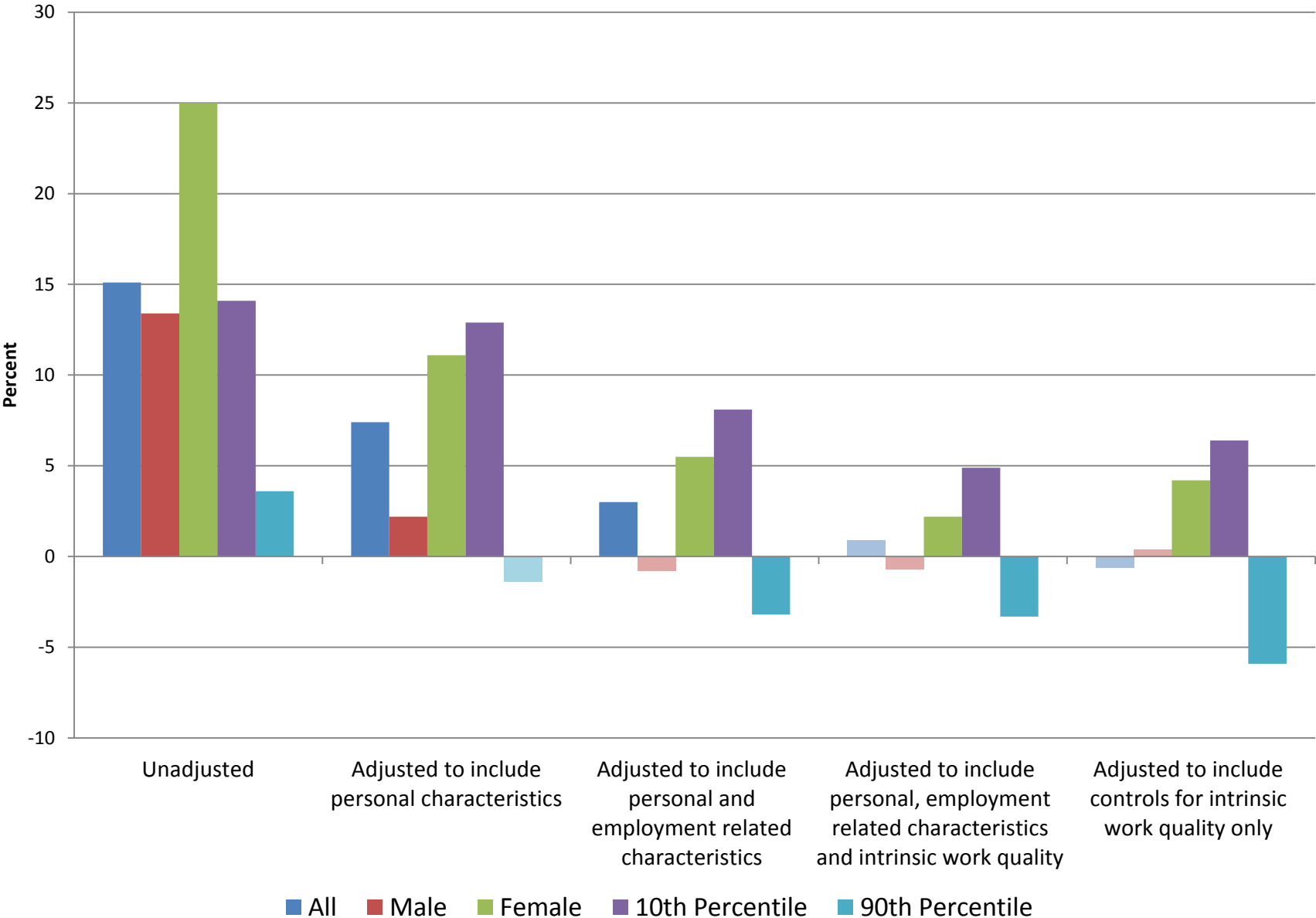


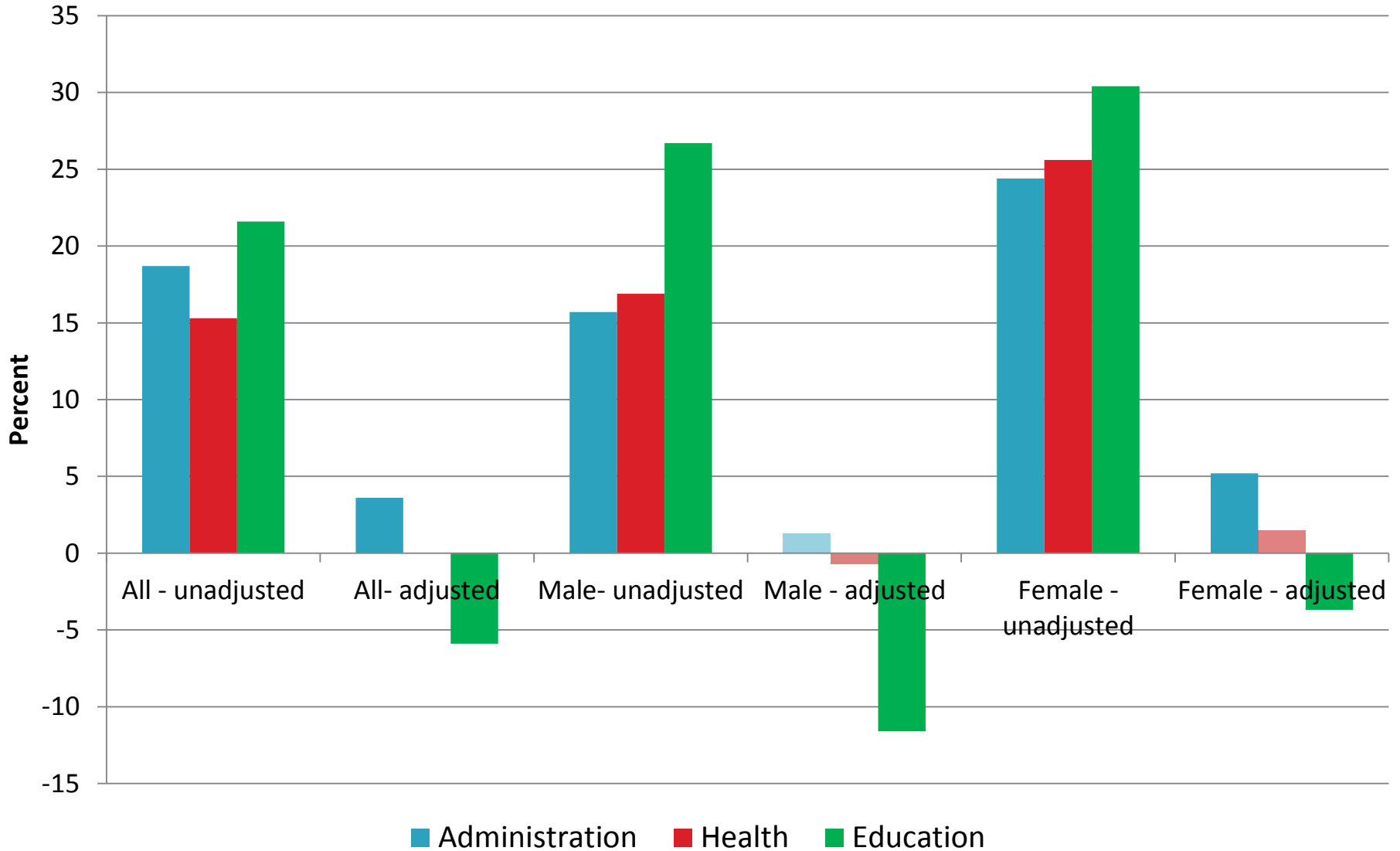
Table 3: Estimating the Public-Private Sector Pay Gap, 1997-2012

	1	2	3	4	5
	Unadjusted	Adjusted to include personal characteristics	Adjusted to include personal and employment related characteristics	Adjusted to include personal, employment related characteristics and job skill requirements, discretion and autonomy, work intensity and perceived insecurity	Adjusted to include controls for job skill requirements, discretion and autonomy, work intensity and perceived insecurity only
1 All employees all years	0.151***	0.074***	0.030***	0.009	-0.006
2 1997	0.160***	0.074***	0.059***	0.031*	0.020
3 2001	0.134***	0.055***	0.014	0.007	-0.007
4 2006	0.150***	0.079***	0.028***	0.004	-0.014
5 2012	0.172***	0.089***	0.034**	0.013	0.002
6 Men all years	0.134***	0.022**	-0.008	-0.007	0.004
7 Women all years	0.250***	0.111***	0.055***	0.022***	0.042***
8 Full-time all years	0.136***	0.047***	0.015*	0.003	-0.010
9 Part-time all years	0.296***	0.169***	0.070***	0.034***	0.072***
10 10 th	0.141***	0.129***	0.081***	0.049***	0.064***
11 25 th	0.202***	0.120***	0.065***	0.041***	0.036***
12 50 th	0.211***	0.094***	0.051***	0.026***	0.001
13 75 th	0.169***	0.029***	0.023**	0.004	-0.042**
14 90 th	0.036**	-0.014	-0.032***	-0.033***	-0.059***

Notes to table: Data are unweighted. *,**,*** indicate statistical significance at the 10%, 5% and 1% level respectively. Column (1) includes controls for survey year in the models which pool data over time. Personal characteristics in (2) include gender (where appropriate), age band (20-29, 30-39, 40-49, 50-59, 60-65), highest educational attainment (NVQ level), marital status and region of residence. Employment related characteristics in (3) include occupation (1 digit SOC), workplace size (<25, 25-99, 100-499, 500+), part-time (as appropriate) and temporary employment. Job skill requirements in (4) include indices measuring required education level, pre-job training time, post-entry learning time and a range of generic skill requirements (literacy, numeracy, physical strength, influence, planning, client communication, problem solving, computer use, and sophisticated computer use). Controls for autonomy and discretion include the task discretion index and supervision index. Controls for work intensity include two dummy variables indicating that the employee strongly agrees that ‘my job requires that I work very hard’ and that the respondent puts a lot of effort beyond what is required. The control for perceived insecurity is a dummy variable capturing any positive chance of job loss in the next 12 months.

Source: SES

Intra-Public Sector Variation, 2006-2012



Conclusion

- Are public sector jobs better quality?
- Higher job skill requirements
- Modest differences in job autonomy
- Higher reported effort
- Changes in job security over time
- Anxiety job and organisational change?

Conclusion

- Is there a public sector earnings premium?
 - No, raw earnings advantage is predominately explained.
 - Intrinsic quality of work contributory factor.
 - Earnings premium confined to women and the low paid.
- Implications for pay review bodies
- Implications of public sector pay restraint