Why Have Workers Stopped Joining Unions?

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November 2003

Abstract

This paper tracks the rise in the percentage of employees who have never become union members ('never-members') since the early 1980s and shows that it is the reduced likelihood of ever becoming a member rather than the haemorrhaging of existing members which is behind the decline in overall union membership in Britain. We estimate the determinants of 'never-membership' and consider how much of the rise can be explained by structural change in the labour market and how much by change in preferences among employees. We find a similar trend in the unionised sector, indicating that the rise in never-membership for the economy as a whole is not linked solely to a decline in the number of recognised workplaces.

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1. Overview

The decline in union membership in Britain since the early 1980s is well-documented (Millward et al., 2000; Machin, 2000; Sneade, 2001). Less well-known is the fact that this decline is attributable to a rise in the percentage of employees who have never become members ('never-members'). This is illustrated in Figure 1 with data for the period 1983-2001 taken from the *British Social Attitudes Surveys* described in detail in Section 2.

Between 1983 and 2001, the percentage of employees who had never been a member of a union or staff association rose by over two-thirds from 28% to 48%. Over the same period, membership fell by a third from 49% to 31%.[1] These figures are striking when we compare never-membership to other life experiences that mark the transition of persons from young to mature workers (Table 1). Degree attainment and marital status are reported for male and female workers aged 24 to 34 using the BSAS data for 1983-85 and 1999-2001 periods. These are cross-tabulated by whether a worker is employed in the union or non-union sector.

The probability of each life event varies with time with a growth in degree attainment and, for the most part, a decline in marriage rates, but the rise in never experiencing union membership overshadows these other changes. Among the male population of this age, workers in the non-unionised sector were twice as likely to have experienced union membership in 1983 than in 2001. A dramatic difference is even seen in the unionised sector. This suggests that by 2001, having never joined a union had become a common life event for the cohort of workers born between the mid 1960s and mid 1970s, sharply distinguishing their transition to maturity from the cohort born a decade or so earlier.

Since 1994, never-members have been more numerous than union members. Between one-fifth and one-quarter of employees say they have been members in the past, a proportion that has not differed much since the early 1980s. So union membership is not haemorrhaging. This suggests those who become members are no less happy with membership than in earlier years. This is supported by evidence for the period 1983-2001 from BSAS which shows no trend in perceptions of union effectiveness as measured by whether union members think the union is doing its job well or not (Bryson and Gomez, 2002: pp. 58-59). There are three possible explanations for the rise in never-membership.

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[1] Throughout union membership refers to membership of a union or staff association.

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First, the types of workers who never became members in the past are increasing as a proportion of the workforce. Secondly, certain types of worker who became members in the past are less inclined to do so now. This paper focuses on these two possibilities by looking at the determinants of never-membership over time. The third possibility is that, even if workers are similarly inclined to purchase membership, they are facing greater constraints in doing so, creating greater frustrated demand for membership. Other research shows frustrated demand for unionisation is quantitatively significant in explaining cross-sectional differences in unionisation in the late 1990s (Bryson and Gomez, 2003). Unfortunately, we do not have data on employees' desire for unionisation over time to assess directly whether frustrated demand has become more important. However, by focusing on the propensity of individuals to be never-members where they have the opportunity to join (that is, where there is a union on-site which is recognised by the employer for pay bargaining) we can gain insight into the reasons for declining union density in the unionised sector. It is the density decline in unionised workplaces, rather than the advent of new, non-unionised workplaces, which accounts for most of the decline in unionisation during the 1990s (Millward et al, 2000: pp. 90-94).

The remainder of the paper is set out as follows. Section 2 introduces the data. Section 3 presents empirical methods. Section 4 presents the results in five subsections. First, we establish whether there is an independent time-trend in the rise of never-membership having controlled for demographic, job, workplace and business cycle effects. Second, we use shift-share analysis to describe the extent to which the rise in never-membership across segments of the workforce can be attributed to changes in workforce composition, on the one hand, and within-group never-membership density changes on the other. Third, we estimate the proportion of the aggregate rise in never-membership attributable to compositional change in the workforce, and the proportion attributable to changes in the preferences of employees for never-membership. Fourth, we consider changes over time in the significance and quantitative importance of demographic, job and workplace characteristics in understanding changing employee preferences for never-membership, holding other factors constant. Fifth, we consider propensities for never-membership within the unionised sector, and how these have changed over time. Section 5 concludes and discusses the implications of the results for trade union recruitment and future unionisation rates.

2. Data

Our analyses use data from the *British Social Attitudes Survey Series (*BSAS) for the period 1983-2001. BSAS yields a representative sample of adults aged 18 or over living in private households in Great Britain. The survey has been conducted annually since 1983, with the exceptions of 1988 and 1992, and usually achieves a response rate of 60% or more. Analysis is restricted to employees working at least ten hours per week, a cut-off used to filter respondents on questions relevant to employees. All analyses are weighted to account for complex survey design so that survey results can be generalised with confidence to the population of employees in Britain working at least 10 hours per week. Most of the data are collected through face-to-face interview, supplemented by a self-completion questionnaire. (For further details of the survey see Park *et al.*, 2002).

Descriptions of the control variables, together with their mean values, are presented in Appendix A1.

2.1 Measures of unionisation

The BSAS series contains information on workplace-level unionisation and individual union membership for every year of the survey, making it one of the longest running series on unionisation in Britain. The questions are independent of one another in the survey so that for all employees we can establish individual membership and workplace union status.

Our measure of workplace unionisation is based on employees' responses to the question: 'At your place of work are there unions, staff associations or groups of unions recognised by the management for negotiating pay and conditions of employment?'[2] Current individual membership status is derived from two questions. First, employees are asked: 'Are you now a member of a trade union or staff association?'[3] If they are not currently a

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[2] Evidence from linked employer-employee data indicates that lack of awareness about union presence is widespread among employees (Bryson, 2001: 20 and Appendix Table A5). One may also be concerned that respondents may not fully understand the meaning of the phrase 'recognised by the management for negotiating pay and conditions'. This prompted the BSAS team designing the survey to ask those who said there was a recognised union or staff association 'Can I just check, does management recognise these unions or staff associations for the purposes of negotiating pay and conditions of employment?' This question has been added since 1998. In 2001, of the 775 unweighted cases saying 'yes' at the first question, 27 said 'no' to the check question and 17 said 'don't know'. Using weighted data, this adjustment reduces the percentage of employees saying they worked in a workplace recognising unions by 3.1 percentage points (from 46.9% to 43.8%).

[3] The union membership figures from 1989 onwards correspond closely to those obtained using the Labour Force Survey (Sneade, 2001), although there is a small increase in membership between 1990 and 1991 in the BSAS data which is not apparent in the LFS (Bryson and Gomez, 2002).

member they are asked: 'Have you ever been a member of a trade union or a staff association?' This second question was not asked in 1994 or 1997 so data for these two years are omitted from the analysis.

3. Empirical Methods

3.1 Shift-share analysis

To decompose the overtime change in never-membership we employ shift-share analysis. Following Green (1992), the change in the rate of 'never-membership' between the early years in our series (1983-85) and the later years (1999-2001) can be written as

$$[1] \quad \Delta N = \sum_g n_g^{9901} p_g^{9901} - \sum_g n_g^{8385} p_g^{8385}$$

where n_g is 'never-member' density within group g, p_g is the proportion of all employees in group g, superscripts delineate the grouped years, and the sum is over all groups. Shift-share analysis splits the rise in never-membership into three components so the first equation may be rewritten as:

$$\Delta N = \sum (n_g^{9901} - n_g^{8385}) p_g^{8385} + \sum (p_g^{9901} - p_g^{8385}) n_g^{8385} + \sum (n_g^{9901} - n_g^{8385})(p_g^{9901} - p_g^{8385})$$

The first term on the right-hand side of the expression is the rise in never-member density that would have occurred if the employee composition had stayed the same in 1999-2001 as in 1983-85 but within-group densities had risen. The second term is the rise that would have occurred due to change in employee composition if within-group density had stayed at its 1983-85 level. The third term is the interaction of the above two effects and is generally small by comparison.

3.2 Linear probability estimation of never-membership

All the multivariate estimates of never-membership are based on linear probability models. Linear probability models are a multivariate extension of the shift-share technique for assessing changing determinants of never-membership. Let

[2] $\quad Y_i = \boldsymbol{b}X_i + \boldsymbol{e}_i$

where Y_i is a 0/1 dummy variable denoting whether individual i is a never-member, X_i is a vector of variables representing the groups or workforce dimensions mentioned above, $\boldsymbol{b}$ is a vector of coefficients and $\boldsymbol{e}_i$ is an error term. The estimated predictions $\boldsymbol{b}X_i$ are interpreted as the probabilities that individual i will never have joined a union. There are two drawbacks to the technique. First, the value of $\boldsymbol{b}X_i$ may be outside the range 0-1, so that it can not be interpreted as a predicted probability. In fact, the linear probability model gives results close to the logit model which transforms the probability to avoid this problem. We ran all our models as logits, confirming that results were indeed very similar. Following Green (1992) we chose to use the linear probability model because it is the closest multivariate analogue to the shift-share analysis. The second drawback is that the model is prone to heteroskedasticity (Kennedy, 1998: 243). We employ the Huber-White robust variance estimator that produces consistent standard errors in the presence of heteroscedasticity.

4. Results

4.1 Time-trends in never-membership

Figure 1 showed a steady rise in never-membership over the period 1983-2001. This is reflected in Table 2 column 1 which shows a gradual rise in the probability that employees will be never-members relative to the base year, 1983. The trend is only significantly different from zero from 1987 onwards, with the size of the coefficients rising markedly in the second half of the 1990s. Without controlling for other factors, the probability of being a never-member rose by 19 percentage points between 1983 and 2001. If we group years into the periods 1983-85, 1986-89, 1990-93, 1995-98 and 1999-2001 we see more clearly that

there was a significant rise in never-membership in the 1990s relative to the 1980s and that this trend has been accelerating (Table 2, column 2). This trend is unaffected by the business cycle (Table 2, column 3, where the business cycle is proxied with the unemployment-vacancy ratio).[4] The time-trend coefficients become smaller with the introduction of basic controls for demographic, job and workplace characteristics but they remain sizeable and statistically significant (Table 2, column 4). As noted in Appendix A1, some controls (establishment size, sector, qualifications, and the left-right scale) are not available for all years. Inclusion of these variables truncates the time-series through the loss of earlier years. However, the pattern of results remains largely unchanged, with the significant rise in never-membership in the second half of the 1990s apparent in all specifications (results are available from the authors).

4.2 Rising never-membership across and within segments of the workforce

In this section, we quantify how much of the rise in never-membership is attributable to changes in the composition of the workforce, and how much of it is due to changes in the propensity for never-membership within different segments of the workforce.

In Table 3 we characterise British workers along thirteen dimensions. In a recent paper we illustrated how demand and supply of unionisation differed across categories within these worker 'segments' (Bryson and Gomez, 2003). It is clear from columns 3 and 4 of Table 3 that some types of worker are more likely than others to be never-members. For instance, ever since the early 1980s, young workers have been more likely to be never-members than older workers, as have low earners relative to higher earners, and those working in the private sector compared to those working in the public sector. Columns 1 and 2 of Table 3 track changes in workforce composition between the early part of our time-series (1983-85) and the latest period (1999-2001). They show that women, older workers, part-timers, those with qualifications, non-manual workers, those in services, and those in the private sector all increased their shares in employment by 5 percentage points or more. With the exception of older workers, the workforce segments that have increased their employment share are those where never-membership is traditionally higher. The drift to the political right has also contributed to rising never-membership. There has also been an increase in the share of employment taken by qualified workers. However, this has not substantially

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[4] We have a relatively short time-series and are only controlling for short-run shifts in the demand for labour.

affected the rate of never-membership because the growth in medium-qualified workers, where never-membership was traditionally highest, is offset by the growth in the highly-qualified who have the lowest rates of never-membership.

The last row of Table 3 reveals the extent to which the percentage of employees in unionised workplaces has declined – from around two-thirds in the early 1980s to under a half at the turn of the century. Since workplace-level unionisation is associated with rates of never-membership which are around one-quarter to one-third of those in non-unionised workplaces this compositional shift has also contributed to the rise in never-membership.

Although compositional change in the workforce has contributed to the rise in never-membership, columns 3 and 4 of Table 3 also show considerable within-group change in the percentage of employees who are never-members. Indeed, what is striking is that the rate of never-membership rose for every segment of the workforce over the period. The increase was particularly pronounced among young workers, even though they had the highest rate of never-membership at the beginning of the period.

Both compositional change in the workforce and within-group preferences for never-membership have contributed to the rise in never-membership. We quantify their relative contributions to the growth in never-membership in columns 5 and 6 of Table 3. We use 'shift-share' analysis, described in Section 3.1, which has been used on a number of occasions to analyse changes in union membership density.[5] The technique separates out the rise in never-membership that would have occurred through within-group density change with employee composition fixed at its 1983-85 level, and the rise that would have occurred through change in employee composition if within-group density had stayed at its 1983-85 level.

Comparing columns 5 and 6 in Table 3, we find that within-group increases account for most of the rise in never-membership in all but one segment. The exception is union recognition: around half of the rise in never-membership along the dimension of workplace-level unionisation is accounted for by an increase in the rate of never-membership within the

Hidden to us are macroeconomic cyclical fluctuations over the longer-term which influence unionisation.

[5] There are no studies analysing the rise of never-membership in Britain. Studies using shift-share analysis to quantify the impact of workforce compositional change on the decline in union membership density have produced disparate results. Booth (1989) attributes 42% of the density decline from 1979 to 1987 to compositional change, while Green (1992) found compositional change accounted for just under one-third of the density decline between 1983 and 1989. Others show relatively little impact from compositional change for the first half of the 1980s (Carruth and Disney, 1988; Freeman and Pelletier, 1990). Bryson and Gomez (2002) find that, over the period 1983-2001, roughly one-third of the decline in membership density was accounted for by compositional change.

'no union recognised' and 'recognised union' categories, while the other half is due to the declining incidence of unionised workplaces where never-membership rates are lower. The other compositional change that has a notable impact on the incidence of never-membership is the shift in employment away from the public to the private sector. There is only one workforce dimension where compositional change had a sizeable impact in slowing the rate of never-membership growth, namely the ageing of the workforce.

4.3. The impact of compositional and preference change on the total rise in never-membership

It is not possible to 'read off' the total contributions of compositional and within-group changes in never-membership to aggregate change in never-membership from the shift-share analysis because the workforce dimensions are not independent of one another. This requires multivariate analyses. We run linear probability models, discussed in Section 3.2, to estimate the probability that an individual will be a never-member for each year in our BSAS series. We compare two sets of estimates to identify the separate contributions of workforce compositional change and changes in preferences for never-membership.

The first set of analyses run models estimating never-membership for each year, or group of years, generating a mean predicted rate of membership based on employees' characteristics and preferences for that year or group of years. We call these our 'unrestricted predictions'. The second set of analyses are run for a base year, or base group of years, to predict rates of never-membership in later years, effectively holding preferences constant. The difference between predicted never-membership rates under the unrestricted models versus the restricted models indicates the contribution of compositional change to the increase in never-membership. The contribution of a change in preferences to the rise in never-membership is simply the difference between the actual never-membership rate for a year, relative to the baseline period, minus that amount of the change arising from employment shares.

Table 4 shows the contribution of change in workforce composition and changes in preferences for never-membership in explaining the rise of never-membership over the period 1983-2001. Column (1) tracks the rise in the actual rate of never-membership from 28% in 1983 to 48% in 2001. Column (2) shows the predicted rates of never-membership for each year based on estimates using data for that year. It turns out these are identical to the figures in column (1). Column (3) shows a second set of predicted rates of never-membership which

are generated by estimating individuals' probability of being a never-member for each year while holding preferences constant at 1983 values. Column (4) shows the contribution to the percentage point change in never-membership rates relative to 1983 that are accounted for by compositional change arising from growth and shrinkage in the segments making up the workforce. Finally, column (5) shows the contribution of changes in preferences while holding compositional change constant. We can see that, over the whole period 1983-2001, there was a 20 percentage point rise in never-membership: around sixty percent of the change (12 percentage points) arises from changing employment shares across segments of the workforce, while the remainder (8 percentage points) comes from changes in preferences for never-membership. Figure 2 presents the information in graphical form.

Table 5 presents similar analyses, this time grouping years into five periods: 1983-85, 1986-89, 1990-93, 1995-98 and 1999-2001. This helps overcome some of the sampling variance arising from estimates based on the single year samples. Comparing 1999-2001 with 1983-85, roughly half the rise in never-membership is accounted for by compositional change, and half by changes in preferences.

As noted earlier, the BSAS series contains a number of variables that are correlated with never-membership but are not available in all years. We tested the sensitivity of results to the inclusion of these variables. First we added sector and workplace size. The absence of sector from the survey in 1983 and 1995 means these years are excluded from the analysis. Workplace size was not significantly associated with never-membership. However, the probability of being a never-member was 7-13% (depending on the period) lower among public sector employees than private sector employees, controlling for other factors. With these additional variables in the model, and with the consequential truncation of the time-series, 7 percentage points of the 14 percentage point rise in never-membership between 1984-85 and 1999-2001 can be accounted for by compositional change in the workforce. The remaining 7 percentage points is due to a change in preferences.

Next we added workplace size and qualifications to the estimates presented in Table 5. We regroup the years due to the absence of qualifications data for 1983 and 1984. Neither qualifications nor workplace size have an independent effect on never-membership in our models. This time, compositional change accounts for 7 of the 12 percentage point rise in never-membership between 1985-89 and 1999-2001.

In our final sensitivity test, we incorporate workplace size, qualifications and attitudes towards distributive justice. The absence of the attitude data before 1986 means this analysis is confined to the period 1986-2001. Other research has established a strong association

between more liberal attitudes on this scale and an increased likelihood of union membership (Bryson and Gomez, 2003). We found being on the 'right' of this scale (that is, scoring 2.8 or more on a scale of 1 to 5) increased the probability of never-membership by 6-12% relative to being on the 'left' of the scale (scoring less than 2.20). With these variables included, compositional effects account for 7 of the 12 percentage points rise in never-membership between 1986-89 and 1999-2001.

These analyses indicate that compositional change and a change in preferences both contribute substantially to the rise in never-membership between the early 1980s and late 1990s. Although the precise contribution of both varies a little with model specification and the years included in the analyses, compositional change explains a little over half the change, with a change in preferences accounting for the rest.

4.4 Changes over time in the significance and quantitative importance of demographic, job and workplace characteristics

Let us turn to changes over time in the significance and quantitative importance of demographic, job and workplace characteristics in understanding changing employee preferences for never-membership, holding other factors constant. Earlier we showed that never-membership has risen across all types of worker. This analysis takes each worker segment (for instance, gender) and identifies whether differential rates of never-membership increase across worker types within that segment (men and women in the case of gender) were significantly different from one another, holding other factors constant.

Table 6 presents estimates of never-membership by grouped year. They are linear probability models so the coefficients can be interpreted as the percentage change in the probability of never-membership associated with a characteristic, holding other factors constant. We control for workplace-level union recognition, thus netting out the constraints and opportunities for membership associated with the availability of a union on-site. Thus, it is arguable that changing associations with never-membership identified in the models tell us about changes in preferences for membership.[6] We return to this in Section 4.5.

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[6] There are two reasons why we can not claim that our analysis fully accounts for the relationship between union availability and preferences for unionisation. First, other variables may not be independent of workplace-level unionisation because different types of worker may sort themselves into unionised and non-unionised workplaces according to the gains they may obtain by being unionised. Employers may also be able to select from among those desirous of union membership. Secondly, if differential sorting has gone on over the period of our analysis, this may affect the interpretation of the independent effects of other variables in our models.

The association between the three demographic characteristics in the model and never-membership probabilities change markedly over the period. Gender is not associated with never-membership in the 1980s. In the 1990s, women's probability of never-membership is about 6% higher than men's, but the differential closes by the end of the century and is no longer statistically significant. Until the mid-1990s, non-whites had a higher probability of never-membership than whites, but the difference is not apparent after the mid-1990s. Young workers have had a higher probability of never-membership since the beginning of the BSAS, but the size of the effect has grown. In the early 1980s, workers aged under-25 had a probability of never-membership that was 18% higher than older workers. This had risen to 29% by 1999-2001. A formal test of whether the coefficients altered significantly between 1983-85 and 1999-2001 indicates that the shift in preferences of non-whites relative to whites and the young versus the old are statistically significant.[7] Where employees live also matters, with those in the South significantly more likely to be never-members than those living elsewhere: variation in regional effects over time is not statistically significant.

Turning to job characteristics, the negative association between never-membership and full-time working apparent in the 1980s had disappeared by the 1990s. Throughout the period non-manual workers had higher probabilities of never-membership than manual workers, but the size of the effect did not differ much over time. Similarly, low-paid workers were more likely to be never-members throughout but the size of the effect did not differ significantly.

Perhaps most interesting of all is the effect of workplace-level union recognition. Employees in unionised workplaces had a 40% lower probability of never-membership than similar employees in non-unionised workplaces. The size of this effect has not changed significantly over the period. Recall that the shift-share analysis presented in Table 3 indicated that changes in preferences accounted for roughly half of the rise in never-membership along this dimension. The analysis in Table 6 shows that, controlling for other

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[7] The formula for this test is $\dfrac{b_1 - b_2}{\sqrt{se_1^2 + se_2^2}}$ where beta$_1$ signifies the coefficient in the first period,

beta$_2$ signifies the coefficient in the second period, se_1^2 is the square of the standard error for the coefficient in the first period and se_2^2 is the square of the standard error for the coefficient in the second period. The changes in the coefficients between the beginning and the end of the period on ethnicity and age are both statistically significant at a 99% level of confidence.

factors, the rate at which the preference for never-membership declined did not differ significantly across employees in unionised and non-unionised workplaces.

We also estimated the impact of workplace size, sector, qualifications and attitudes to distributive justice over time for the years that these variables were available. Workplace size and qualifications were never statistically significant. Being in the public sector lowered the probability of never-membership by 7-13% relative to private sector employment, but there was no trend over time. Similarly, being on the 'right' of the left-right scale raised the probability of never-membership by between 6-12% depending on the period relative to being on the 'left', but there was no time-trend.

In general, then, coefficients attached to workplace and job characteristics did not shift a great deal over the period. The exception was full-time employment, which was no longer associated with lower never-membership by the 1990s. However, there was substantial change in preferences attached to demographic characteristics.

4.5 Determinants of never-membership in the unionised sector

Above we showed that one of the reasons for the rise in never-membership was the decline in the presence of a union at the workplace. Others have highlighted the growth in non-union workplaces as contributing to the decline in union membership in Britain (Millward et al., 2000; Machin, 2000). The absence of workplace-level unionisation may affect individual employees' decisions to join a union because the cost of organising an unorganised workplace in order to become a union member is higher than the cost of becoming a member in an already unionised workplace (Farber, 2001; Green, 1990; Bryson and Gomez, 2002). An alternative perspective would be to consider individuals' propensity to join a union, on the one hand, and their opportunities for doing so, on the other, as important determinants of the union joining decision (Bain and Elshekh, 1976; Disney, 1990).[8] Those opportunities are greatest where there is already a union in place. In keeping with workplace-level analyses (Millward et al, 2000), we find the propensity to be a member has declined since the early 1980s even among those with the best opportunities to join (those facing the lowest costs) – that is, those in unionised workplaces (Table 7). Three-quarters of the 12 percentage point

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[8] In fact, these two perspectives are not that dissimilar because the extent to which individuals perceive an 'opportunity' to unionise depends to a large degree on perceived costs and benefits of organising.

drop in membership in unionised workplaces since the early 1980s is accounted for by the rise in never-membership.[9]

In light of the discussion above, an analysis of employees' decisions never to join a union, even when they have a recognised union on-site, provides an opportunity to understand possible reasons for the decline in union membership density within the unionised sector.

Table 8 presents results from linear probability models estimating never-membership for grouped years among employees working in unionised workplaces. Between 1983-85 and 1999-2001 never-membership in the unionised sector rose 9 percentage points. Under the models presented in Table 8, this change was due exclusively to compositional effects. It is possible that preferences are less important in explaining changes in the never-membership rate in the unionised sector than in the economy as a whole because some self-sorting plays a role in determining whether individuals are employed in a unionised or non-unionised workplace in the first place. Different types of workers may choose to apply in unionised and non-unionised workplaces according to the gains they may obtain by being unionised. Equally, employers may also select from among those most (or least) desirous of union membership (Abowd and Farber, 1982). If so, employees' characteristics dictate whether they choose (or are chosen by employers) to enter unionised workplaces, and thus have the opportunity to join a union without incurring the large costs of organising a non-unionised workplace.

This does not mean that preferences for never-membership within the unionised sector are of no consequence. As Table 8 shows, there were significant shifts in preferences within particular dimensions of the workforce. For instance, the probability of never-membership rose dramatically for young workers relative to older workers in the unionised sector over the period (the relative probability rising from 13% in 1983-85 to 28% in 1999-2001). The probability of never-membership also rose significantly among low and mid-earner employees relative to high earners. On other dimensions, there was a convergence in never-membership rates – for instance, between men and women, full-timers and part-timers and manual and non-manual workers.

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[9] The Workplace Industrial Relations Survey Series indicates that aggregate union density in recognised workplaces fell from 75% in 1984 to 56% in 1998, a drop of 19 percentage points (authors' calculations). Over the same period, BSAS indicates a decline from 71% to 60%, a drop of 11 percentage points. The discrepancies in density levels and rates of decline may be accounted for by differences in sample coverage. WIRS is confined to workplaces with 25+ employees but includes employees regardless of hours worked. BSAS has no employment size threshold but is confined to employees working at least 10 hours per week.

5. Discussion and Conclusions

Using repeat cross-sectional data from the *British Social Attitudes Surveys* we have shown that the decline in union membership in Britain is accounted for by the rising percentage of employees who have never been union members. There was a significant rise in never-membership in the 1990s relative to the 1980s and this trend accelerated in the second half of the 1990s.

In the economy as a whole, a little over half the rise in never-membership is due to compositional change in the workforce, in that segments with traditionally high rates of never-membership increased their share of employment. The remainder is accounted for by within-group changes in never-membership density. These within-group changes may be indicative of changing preferences for union membership.   The rise in young people's probability of never-membership relative to older workers over the period is particularly marked, and is apparent in the whole economy and the unionised sector. The estimated probability of never-membership over time did not vary much with workplace and job characteristics. The exception was full-time employment status which, by the 1990s, was no longer associated with a lower never-membership rate than part-time employment.

The biggest single factor determining the probability of never-membership is whether or not an individual is employed in a workplace with a recognised union. Employees in unionised workplaces had a 40% lower probability of never-membership than similar employees in non-unionised workplaces. The size of this effect has not changed very much since the early 1980s. However, the decline in workplace unionisation has contributed very significantly to the rise in never-membership in the economy. Intriguingly, three-quarters of the decline in union density within unionised workplaces is accounted for by a rise in never-membership, indicating that the rise in never-membership is not simply a function of overt employer opposition or the increasing organising costs of becoming a member implied by the rise in non-unionised workplaces.

These findings have a number of practical implications for the future of unions and union organising. Compositional changes in the workforce have conspired against unions because they have resulted in an increasing proportion of employment going to the types of workers who have traditionally been less inclined to unionise. If these changes continue into the future, we can expect further declines in union membership. Of course, it is by no means certain that these compositional changes will continue. For instance, in view of public

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concern about public services, one might anticipate some relative growth in the public sector (where unions are traditionally strong). Perhaps more unsettling for union organisers is the finding that the rate of never-membership rose across all segments of the workforce in the 1980s and 1990s. This universal move away from unionism makes it difficult for unions to know where to focus their organising energies. However, union organisers can take some comfort from the fact that changing preferences for unionisation accounted for nearly half the rise in never-membership. There is little unions can do to alter the nature of workforce compositional change but they may be able to persuade employees to alter their preferences for union membership - provided they correctly diagnose why it is that employees have stopped joining unions.

Of course, this last point is extremely important. Unions' ability to offer 'value' to employees is severely limited where they are unable to establish bargaining rights with employers. Getting onto a better footing with employers – one that brings the prize of recognition – may be the best way to make substantial membership gains in the longer-term. But with never-membership rates within the unionised sector rising by 64% since the early 1980s, this is not enough on its own. Unions are faced with the challenge of proving their relevance and effectiveness to the 23% of employees in the unionised sector who have never become members. Achieving this is probably less costly to unions than seeking to organise unorganised workplaces and, at least in the short-term, it may present the best opportunity for making substantial membership gains.

Figure 1: Trends in Union Membership, 1983-2001
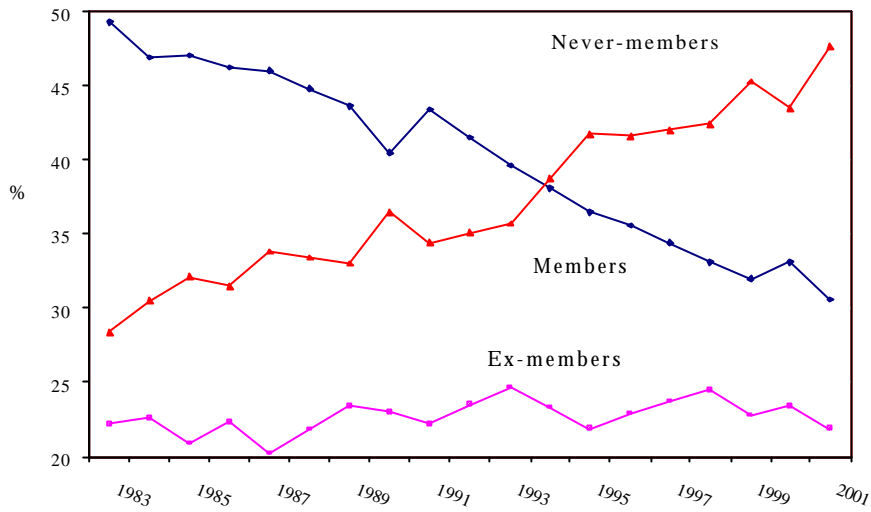
Note: Mid-point rates have been interpolated for years in which the survey was not conducted (1988 and 1992) and years in which the question on ex-membership was not asked (1994 and 1997).

Figure 2: Rising never-membership in Britain: the contribution of 'compositional' and 'propensity' change, 1983-2001.
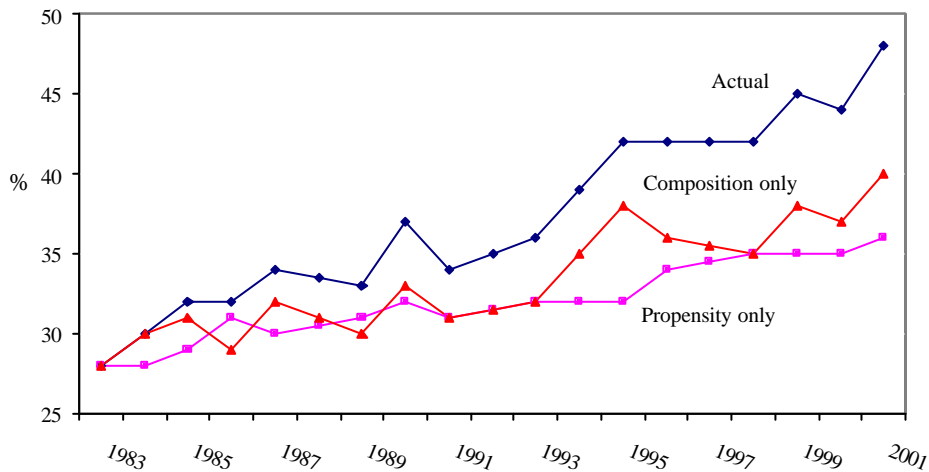

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Table 1: Union membership compared to other life events for those aged 25-34

Life Event	Total		Unionised Sector		Non-Union Sector	
	1983-85	1999-2001	1983-85	1999-2001	1983-85	1999-2001
Males						
Never-membership	26	57	8	34	52	75
Ever membership	74	43	92	66	48	25
Bachelor's degree	17	28	19	32	13	24
Marriage	78	68	80	65	76	71
Females						
Never-membership	37	59	14	31	68	83
Ever membership	63	41	86	69	32	17
Bachelor's degree	24	27	32	27	15	27
Marriage	70	68	72	70	66	66

Notes: Ever membership includes both current members and non-members who have been members in the past. Married includes living as married. Life events in 1983-85 are for birth cohort born between 1949 (aged 34 in 1983) and 1960 (aged 25 in 1985) and for 1999-2001 the birth cohort is born between 1965 (aged 34 years in 1999) and 1976 (aged 25 in 2001).

Table 2: Time-trends and rising never-membership

	(1)	(2)	(3)	(4)
1. Year (ref: 1983)				
1984	0.020			
	(0.83)			
1985	0.036			
	(1.56)			
1986	0.031			
	(1.50)			
1987	*0.054			
	(2.53)			
1989	*0.046			
	(2.19)			
1990	**0.080			
	(3.75)			
1991	**0.060			
	(2.67)			
1993	**0.073			
	(3.26)			
1995	**0.132			
	(6.05)			
1996	**0.131			
	(6.12)			
1998	**0.139			
	(6.42)			
1999	**0.168			
	(7.67)			
2000	**0.150			
	(7.01)			
2001	**0.191			
	(8.90)			
2. Year, grouped (ref: 1983-85)				
1986-89		0.024	0.012	0.006
		(1.96)	(0.85)	(0.48)
1990-94		**0.052	**0.048	*0.029
		(4.02)	(3.54)	(2.38)
1995-98		**0.115	**0.099	**0.063
		(9.06)	(5.92)	(4.40)
1999-2001		**0.151	**0.126	**0.085
		(11.88)	(5.93)	(4.66)
3. Unemployment-vacancy ratio			-0.002	-0.001
			(1.46)	(0.81)
4. Aged 18-24				**0.250
				(23.08)
5. Gross earnings (ref: high)				
Low				**0.079
				(7.57)
Mid-level				0.011
				(1.21)
Missing				**0.093
				(6.11)
6. Non-white (ref: white)				*0.036
				(2.26)
7. Female (ref: male)				**0.033
				(4.08)
8. Full-timer (ref: part-timer)				-0.016
				(1.46)
9. Manual (ref: non-manual)				**-0.085
				(11.28)

	(1)	(2)	(3)	(4)
10. Manufacturing (ref: Non-manufacturing)				0.012
				(1.43)
11. Region (ref: South)				
Midlands/North				**-0.077
				(10.53)
Scotland/Wales				**-0.089
				(8.92)
12.Union recognised (ref: Non-union)				**-0.411
				(56.63)
13. Constant	**0.285	**0.303	**0.336	**0.577
	(17.34)	(31.09)	(13.93)	(23.57)
Observations	19350	19350	19350	18601
R-squared	0.01	0.01	0.01	0.28
Joint significance of time variables	F(14,19336)=16.72	F(4,19346)=55.92	F(4,19346)=21.40	F(4,18597)=12.66
	P>F=0.0000	P>F=0.0000	P>F=0.0000	P>F=0.0000

Note: * denotes significance at a 95% confidence level, ** denotes significance at a 99% confidence level.

Table 3: Decomposing the rise of never-membership by workforce groupings

	Share of employees		Share who have never been members		Shift share analysis (Percentage Change Due to:)	
					Within-group density change	Compositional change
	1983-85	1999-2001	1983-85	1999-2001		
1. By Gender						
Male	56	49	25	44		
Female	44	51	37	47	91	9
2. By Age						
18-24	17	12	50	78		
25+	83	88	26	41	111	-11
3. By Ethnicity						
White	97	94	30	45		
Non-white	3	6	41	48	96	4
4. By Left-Right scale						
High	37	41	42	50		
Medium	29	31	30	43		
Low	35	27	25	38	97	3
5. By Hours						
Full-time	83	76	27	44		
Part-time	17	24	46	49	94	6
6. By Occupation						
Manual	46	37	25	45		
Non-manual	54	63	35	45	96	4
7. By Earnings						
High	37	50	22	39		
Medium	23	22	23	46		
Low	40	28	42	57	102	-2
8. By Qualification High						
Medium	25	36	27	42		
Low	32	39	36	50		
	42	25	32	44	100	0
9. By Workplace size <25 employees						
25+ employees	32	32	46	57		
	68	68	24	40	100	0
10. By Sector						
Public	36	29	13	22		
Private	61	68	42	55		
Other	3	3	42	50	83	17
11. By Industry						
Manufacturing	28	19	27	42		
Non-manufact.	72	81	32	46	96	4
12. By Region						
Scotland/Wales	13	14	25	35		
Midlands/North	43	41	24	42		
South	45	45	38	52	102	-2
13. By Unionisation Recognition						
No Recognition	64	47	14	23		
	36	53	60	66	50	50

Notes:
a. A description of the shift-share methodology is given in Section 3.1.
b. Left-right scale is not available before 1986 so base period is 1986-89.
c. Workplace size is not available in 1983 so base period is 1984-85.
d. Qualifications are not available in 1983 or 1984 so base period is 1985.
e. Sector figures are not available for 1983 so base period is 1984-85.

Table 4: Contribution of change in composition and change in propensities to the never-membership rate, 1983-2001

Year	Actual rate	Unrestricted prediction	1983 Model prediction	Proportion of Total Change Due to	
				Change in Composition	Change in Propensity
	[1]	[2]	[3]	[4]	[5]
1983	0.28	0.28	0.28	0.00 (0)	0.00 (0)
1984	0.30	0.30	0.28	0.02 (100)	0.00 (0)
1985	0.32	0.32	0.29	0.03 (75)	0.01 (25)
1986	0.32	0.32	0.31	0.01 (25)	0.03 (75)
1987	0.34	0.34	0.30	0.04 (67)	0.02 (33)
1989	0.33	0.33	0.31	0.02 (40)	0.03 (60)
1990	0.37	0.37	0.32	0.05 (55)	0.04 (45)
1991	0.34	0.34	0.31	0.03 (50)	0.03 (50)
1993	0.36	0.36	0.32	0.04 (50)	0.04 (50)
1995	0.42	0.42	0.32	0.10 (71)	0.04 (28)
1996	0.42	0.42	0.34	0.08 (57)	0.06 (42)
1998	0.42	0.42	0.35	0.07 (50)	0.07 (50)
1999	0.45	0.45	0.35	0.10 (58)	0.07 (42)
2000	0.44	0.44	0.35	0.09 (56)	0.07 (44)
2001	0.48	0.48	0.36	0.12 (60)	0.08 (40)

Notes:

a. Meaning of columns is as follows: [1] actual rate of never-membership [2] Predicted rate of never-membership by year based on model for that year [3] Predicted rate of never-membership by year based on model for 1983 [4] Difference between [2] and [3], numbers in brackets express share of total change in percentage terms [5] Difference in actual rate relative to 1983 minus compositional change, numbers in brackets express share of total change in percentage terms.

b. No surveys were conducted in 1988 and 1992. Data on never-membership are unavailable for 1994 and 1997. Analysis for 1991 excludes ethnicity dummy due to large number of missing cases.

c. Predictions are probabilities based on linear probability estimation accounting for survey design.

d. Models incorporate gender, ethnicity, age, if full-timer, if manufacturing, if manual, banded earnings, region, union recognition.

Table 5: Contribution of change in composition and change in propensities to the never-membership rate by time period, 1983-2001

Period	Actual rate [1]	Unrestricted prediction [2]	1983-85 model prediction [3]	Proportion of Total Change Due to	
				Compositional change [4]	Propensity change [5]
1983-85	.30	.30	.30	0 (0)	0 (0)
1986-89	.33	.33	.32	0.01 (33)	0.02 (67)
1990-93	.36	.36	.34	0.02 (33)	0.04 (67)
1995-98	.42	.42	.36	0.06 (50)	0.06 (50)
1999-2001	.46	.46	.37	0.09 (56)	0.07 (44)

Notes:

a. Meaning of columns is as follows: [1] actual rate of never-membership [2] Predicted rate of never-membership by year based on model for that year [3] Predicted rate of never-membership by year based on model for 1983-85 [4] Difference between [2] and [3], numbers in brackets express share of total change in percentage terms [5] Difference in actual rate relative to 1983-85 minus compositional change, numbers in brackets express share of total change in percentage terms

b. No surveys were conducted in 1988 and 1992. Data on never-membership are unavailable for 1994 and 1997.

c. Predictions are probabilities based on linear probability estimation accounting for survey design.

d. Models incorporate gender, ethnicity, age, if full-timer, if manufacturing, if manual, banded earnings, region, union recognition.

Table 6: Linear probability models estimating never-membership by worker groupings, for 5 periods

Dependent Variable: Probability of Never Being a Union Member

Period

Independent Variables:	1983-85	1986-89	1990-93	1995-98	1999-2001
1. Female	0.003	0.011	**0.061	**0.062	0.019
	(0.13)	(0.66)	(3.07)	(3.77)	(1.13)
2. Non-white	**0.140	*0.078	**0.110	0.011	-0.020
	(3.23)	(2.10)	(2.79)	(0.36)	(0.69)
3. Age 18-24	**0.179	**0.226	**0.270	**0.288	**0.288
	(7.10)	(11.86)	(9.27)	(11.66)	(12.37)
4. Full-timer	**-0.108	**-0.067	-0.030	0.031	0.030
	(3.44)	(3.11)	(1.14)	(1.37)	(1.36)
5. Manufacturing	*0.039	0.006	0.013	0.029	-0.013
	(2.08)	(0.40)	(0.64)	(1.56)	(0.67)
6. Manual worker	**-0.104	**-0.092	**-0.099	**-0.083	**-0.066
	(5.55)	(6.28)	(5.48)	(5.17)	(4.03)
7. Gross earnings (ref: High)					
Mid-level	-0.004	-0.029	0.010	0.019	*0.043
	(0.19)	(1.58)	(0.45)	(1.02)	(2.18)
Low	**0.079	**0.050	0.044	**0.114	**0.098
	(3.19)	(2.58)	(1.76)	(5.13)	(4.09)
Missing	*0.079	**0.087	**0.110	**0.113	*0.077
	(2.22)	(2.94)	(3.27)	(3.27)	(2.25)
8. Region (ref: South)					
Scotland/Wales	**-0.070	**-0.084	**-0.069	**-0.080	**-0.118
	(2.73)	(4.51)	(2.67)	(3.80)	(5.65)
Midlands/North	**-0.101	**-0.067	**-0.083	**-0.062	**-0.081
	(5.63)	(4.65)	(4.67)	(4.01)	(5.21)
9. Union recognition	**-0.412	**-0.419	**-0.396	**-0.416	**-0.404
	(20.26)	(28.44)	(21.94)	(28.05)	(26.90)
10. Constant	**0.675	**0.650	**0.593	**0.554	**0.619
	(17.72)	(23.82)	(16.94)	(19.46)	(21.97)
Observations	2434	4344	3066	4366	4391
R-squared	0.29	0.28	0.27	0.27	0.25

Note: * denotes significance at a 95% confidence level, ** denotes significance at a 99% confidence level.

Table 7: The rise of never-membership in the unionised sector, 1983-1998

			Period		
Membership Status	1983-85	1986-89	1990-94	1995-98	1999-2001
1. Current Members	72	71	68	63	60
2. Non-members	28 (100)	29 (100)	32 (100)	37 (100)	40 (100)
a. Ex-members	14 (50)	14 (48)	15 (46)	17 (45)	17 (42)
b. Never-Members	14 (50)	15 (52)	17 (54)	20 (55)	23 (58)
No. Observations	1574	2671	2090	2274	2094

Notes: Numbers represent percentages. Numbers in brackets represent share of total non-union membership rate attributable to ex and never members.

Table 8: Linear probability models estimating never-membership in the Unionised Sector by worker groupings, for 5 periods

	Dependent Variable: Probability of Never Being a Union Member				
			Period		
Independent Variables	1983-85	1986-89	1990-93	1995-98	1999-2001
1. Female	**-0.063	-0.018	0.026	0.028	-0.023
	(2.97)	(0.95)	(1.06)	(1.28)	(0.92)
2. Non-white	*0.111	0.053	0.059	-0.071	-0.063
	(2.14)	(1.22)	(1.03)	(1.83)	(1.54)
3. Age 18-24	**0.127	**0.128	**0.248	**0.271	**0.284
	(4.36)	(4.97)	(5.19)	(5.65)	(5.87)
4. Full-timer	**-0.208	**-0.084	-0.014	-0.008	0.031
	(5.46)	(3.16)	(0.43)	(0.26)	(0.96)
5. Manufacturing	**0.074	**0.052	*0.061	**0.088	0.045
	(3.77)	(3.01)	(2.41)	(3.44)	(1.67)
6. Manual worker	**-0.147	**-0.117	**-0.136	**-0.100	**-0.098
	(7.39)	(7.05)	(6.24)	(4.54)	(4.10)
7. Gross earnings (ref:High)					
Mid-level	-0.003	-0.018	-0.000	**0.060	**0.095
	(0.18)	(1.05)	(0.02)	(2.64)	(3.55)
Low	**0.100	**0.086	**0.112	**0.145	**0.181
	(4.06)	(4.13)	(3.53)	(4.59)	(5.09)
Missing	**0.075	*0.067	*0.102	0.056	**0.135
	(1.96)	(2.01)	(2.48)	(1.32)	(2.67)
8. Region (ref:South)					
Scotland/Wales	**-0.080	**-0.097	*-0.065	**-0.092	**-0.142
	(3.14)	(4.84)	(2.11)	(3.65)	(5.38)
Midlands/North	**-0.092	**-0.078	**-0.061	-0.062	**-0.101
	(4.89)	(4.79)	(2.86)	(3.00)**	(4.60)
10. Constant	**0.385	**0.265	**0.182	**0.172	**0.221
	(8.62)	(8.48)	(4.19)	(4.76)	(5.48)
Observations	1563	2652	1745	2253	2080
R-squared	0.12	0.07	0.11	0.09	0.09

Appendix A1: Description of control variables and their mean values

Variable	Mean
Female	.49
Non-white	.05
Aged 18-24 years	.14
Full-time employee	.79
Manual occupation	.40
Gross earnings	
High	.39
Medium	.21
Low	.34
Missing	.06
Qualifications	
High	.32
Medium	.37
Low/none	.32
Region	
Scotland/Wales	.13
Midlands/North	.42
South	.44
Manufacturing	.22
Union recognition	.55
Unemployment/vacancy ratio	14.8
Number of employees at workplace	
<10	.16
10-24	.16
25-99	.26
100-499	.24
500+	.18
Sector	
Public	.32
Private	.65
Voluntary/other	.04
Left-right scale	
High	.36
Medium	.31
Low	.32

Notes:
a.   For those data available since 1983, N = 19,350 employees.
b.   Number of employees at workplace not available in 1983, N = 18,533
c.   Sector unavailable in 1983 and 1995, N = 18,533
d.   Qualifications unavailable in 1983 and 1984, N = 17,555
e.   Left-right scale unavailable before 1986, N = 16,898

Data Derivation

Here we describe the derivation of variables where it is not self-evident what we have done.

Earnings

Respondents are asked to identify which of a number of gross earnings bands covers their own earnings. During the series the number of bands has increased from X to Y with values varying to reflect the rise in earnings over the period. We recoded the gross earnings bands into an ordinal variable with five categories ranging from 'much below average' to 'much above average'. 'Low' includes 'much below' and 'below' average'; 'Medium' is 'average' and 'High' is 'above average' or 'much above average'.

Qualifications

These relate to individuals' highest qualification. 'High' means degree or higher education below degree. 'Medium' means 'A-level' or 'O-level' or equivalent. Low means 'CSE' or 'none'.

Unemployment/vacancy ratio

The unemployment/vacancy ratio was constructed by the authors and is a consistent seasonally adjusted time-series for Great Britain derived from series provided by the Office of National Statistics. The unemployment measure is the number of unemployed in the Spring of each year using the ILO definition, and the vacancy data are the official figures for the same period.

Left-right scale

The left-right scale is an additive index drawing on responses to five statements to which the respondent is invited to 'agree strongly', 'agree', 'neither agree nor disagree', 'disagree' or 'disagree strongly'. These are: 'Government should redistribute income from the better-off to those who are less well off'; 'Big business benefits owners at the expense of workers'; 'Ordinary working people do not get their fair share of the nation's wealth'; 'There is one law for the rich and one for the poor'; 'Management will always try to get the better of employees if it gets the chance'. This well tried and tested index measures an underlying ('latent') attitudinal dimension relating to employees' perceptions of distributive justice. Those with

lower scores on the continuous scale running from 1 to 5 are more likely to favour government economic intervention and the reduction of inequality than are those with higher scores. We distinguish between 'low', 'medium' and 'high' scorers on the index. 'Low' scorers are those scoring below 2.2 on the scale, 'medium' scorers are those scoring 2.2 – 2.75 and 'high' scorers are those with above 2.75. Previous research shows union members are significantly more likely to be 'left-wing' (have a lower score) on the index than non-members (Bryson, 1999).

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