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14/2: IS WORKING FROM HOME GOOD WORK OR BAD WORK? EVIDENCE FROM AUSTRALIAN EMPLOYEES

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Is Working From Home Good Work or Bad Work?
Evidence from Australian Employees*

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ABSTRACT

There is concern that workers are finding it increasingly difficult to balance work and family life and face growing time stress. Working from home is one form of flexibility in working arrangements that may assist workers to juggle work and non-work commitments. However, it may also provide a pathway for greater intrusion of work into family life and for added work-related stress. Around 17% of Australian employees work some of their usual working hours from home, and one-third of these do so under a formal agreement with their employer. Based on evidence from the Household, Income and Labour Dynamics in Australia Survey, these proportions seem to have remained surprisingly stable over the past decade. Overall, the ability to work some hours from home is seen by employees as a positive job attribute that provides flexibility to balance work and non-work commitments and this is particularly so for employees who have a formal agreement to work from home. However, working from home is also associated with long hours of work and the evidence provides grounds for concern that working from home does facilitate greater intrusion into non-work domains of life through this channel.

I.   INTRODUCTION

There has been growing interest from policy makers and social researchers, notably from within the European Union, in the issue of the quality of work and what features of work characterise 'good jobs' and 'bad jobs'. A common perception is that the quality of work has been declining over time as workers have had to become more flexible and to give up standard working arrangements and conditions for more precarious employment.

Among key concerns on the job quality agenda are the number of hours worked and the ability for workers to balance work and family life. Australia and other developing countries have observed a growing incidence of non-standard work arrangements, in which employees work hours outside a typical Monday to Friday daytime schedule (Li et al. 2014). This is often seen as a response to demand side (firm) factors associated with the emerging '24/7 economy', globalisation and deregulation, but also reflects supply side preferences of workers, notably as the increased labour force participation of women leads to greater friction between work and family commitments. A related shift in working patterns that has received less attention is the growing proportion of employees working some hours from their home. As with non-standard work hours, such changes in work patterns can be a two-edged sword, providing both increased flexibility for workers to manage their work and non-work schedules, but also increasing the capacity for work time and work-related stress to impact upon families and leisure.

Using data from the Household, Income and Labour Dynamics in Australian survey, this paper explores the extent of work undertaken from the home by employees in Australia and key characteristics of that work. Following a review providing a background to the issues, Section 3 looks at the incidence of employees working from home in Australia, how that has changed since 2001 and who it is that is most likely to work from home. Section 4 presents evidence on the financial rewards to hours worked at home, and in Section 5 we assess whether employees who work from home view their jobs any more or less favourable than workers who do not work from home in terms of the ability to balance work and non-work commitments and overall job satisfaction. In the final section we summarise the evidence, concluding there is no straightforward answer to the question proposed in the title. The ability to work from home is generally a positive attribute of a job, but it is a cautionary tale and contexts are important.

II.   MOTIVATION

The issue of the quality of work has captured the attention of policy makers, notably in the European Union countries where improving job quality has become an explicit policy objective (see Burgess, Connell & Dockery 2013 for a recent review). In the theoretical world of perfectly functioning labour markets differences in job attributes that impact upon worker wellbeing may not be an issue: compensating differentials (such as wage differences) would exactly offset other attributes of jobs, so that the value workers placed on the pecuniary and non-pecuniary aspects of jobs equated to reflect worker and employee preferences in equilibrium. In the real world, however, there are a number of reasons to expect that markets may deliver sub-optimal outcomes and reasons for job quality to be considered an important social and policy issue in addition to the standard market imperfection arguments of asymmetric information and bargaining power.

Important among these are the balance between work and family life. It is well established that there are spillovers (externalities) between work and non-work domains extending beyond workers' own wellbeing and health to the wellbeing of other family members (Li et al. 2014). Understanding is limited regarding the consequences of some work patterns, such as the long-term effects of working night shifts. There are growing concerns about the phenomenon of 'overwork' (Schor 1992) and inequality between the unemployed/underemployed and those working long hours, or the divide in the distribution of work between households. There are a number of reasons to suspect that workers may seek to work more hours than is optimal: they may systematically overestimate the utility gained from added income and status and underestimate intrinsic benefit gained from non-work activities, such as time with family and friends (Dockery 2012; Frank 1999; Frey 2008: 127-137). Finally, there is considerable uncertainty regarding the productivity effects of work quality meaning significant welfare gains for both employers and employees may be going unrealised (Burgess et al. 2013: 12-13).

It is therefore important to know what the attributes of 'good jobs' and 'bad jobs' are. Increased flexibility – or the growth of non-standard working arrangements and schedules - has been highlighted as both a positive and negative trend in job quality. Working from home is one of these forms of flexibility. Telecommuting, as it is referred to in the United States, teleworking, as it is referred to in Europe, home-working, working-at-a-distance, off-site workers, or remote workers are all terms that are used to convey the idea that work is something you do, not someplace you go (Baruch 2001). There has been a growing trend of providing flexible working arrangements at the workplace with an intention to allow workers to continue productive contributions to the workforce while also attending to family and other responsibilities (Council of Economic Advisors 2010), increasing productivity (Kurland and Bailey 1999, Bloom et al. 2013, Council of Economic Advisors 2010), reduce absenteeism and turnover, to improve workers' health (Council of Economic Advisors 2010), to help employees balance work and family demands (Galinsky et al. 2008), discretion in determining the timing, pace and location at which role requirements are met (Greenhaus and Powell 2006), lowering work–family conflict (Gajendran and Harrison 2007, Thomas and Ganster 1995) , increasing job satisfaction (Baltes et al. 1999, Allen 2001), to reduce traffic congestion on the roads / reduce commute time (Kurland and Bailey 1999) and also saving firms costs (Bloom et al. 2013, Kurland and Bailey 1999, Council of Economic Advisors 2010).

However these alternative work forms bring both benefits and challenges to organisations, individuals and society (Kurland and Bailey 1999). For instance when the workplace is moved into the home environment, it is argued that there is the dual potential to exacerbate conflict, or to minimize it through increasing work schedule flexibility (Doherty et al. 2000). Working from home, from the employers' point of view, has been found to achieve organisational cost savings through lower employee turnover and absenteeism, higher productivity and profitability of the firms. At the same time there have been concerns associated with these arrangements, such as the effect on the work and family/ life balance of the employees or family conflicts (Kurland and Bailey 1999, Boston College Center for Work & Family 2012), longer working hours (Kurland and Bailey 1999), career stagnation and adverse effect on employees' performance (Baruch and Nicholson 1997), and feelings of social isolation (Kurland and Bailey 1999, Boston College Report 2012).

Working from home may have impacts on family functioning through time spent on children, the quality of relationships, the home environment and other family obligations. It impacts upon work

life balance when work interferes with family responsibilities, when overworking affects employees' social networking, and their balance between work and personal life. As Duxbury & Hinnings (2002) stated telecommuting can increase conflict between work and family when: employees who work at home spend a greater, or disproportionate, percentage of their time on paid work activities , flexibility gained through telecommuting benefits the work organization but not the employee's family, commuting serves as a buffer between the employee's home and work domains, and the lack of a commute decreases the opportunity for employees to reduce the transfer of stress from one domain to the other.

Telecommuting increases the permeability of boundaries (degree to which either family or work encroaches on the other because they occupy the same place and, potentially, the same time) in life domains, making it easier for one domain to intrude on the other, potentially leading to work–family conflict. Such permeability can also make psychological disengagement from work more difficult, increasing the likelihood of time-based conflict leading employees to work after normal work hours and this may be especially true for individuals who find it difficult to separate activities between home and work (Gajendran et al. 2007).

Bloom et al. (2013) conducted an empirical analysis of a Chinese travel agency and measured the impacts of working from home on employee productivity. Working from home was found to lead to a 13% performance increase and 30% increase in total factor productivity with improved work satisfaction and less turnover, but employees' promotion rate conditional on performance fell by about 50%. Also there was no impact on the quality of work done by employees, while the practice saved $2000 per year per employee. However employees working from home reported a feeling of social isolation. Two thirds of the control group (who initially had all volunteered to work from home 10 months earlier) decided to stay in the office, citing concerns over the loneliness of home working and lower rates of promotion, indicating that this practice worked in the best interest of the company but may not be that good for the employees.

In a study for the U.K. Felstead et al. (2000) found that the number of workers working mainly at home increased from 1.5% to 2.5% during 1981-1998; that working at home significantly raises the probability of being low paid, and the odds of working from home are significantly higher for women than men (more so for women with child care responsibilities) and the higher status occupational groups.

There has also been evidence that employees who work from home work longer hours. An estimated 42% of American telecommuters work 50 to 75 hours per week and one-half of European telecommuters work more than ten extra hours per week (Doherty et al., 2000; Pratt, 1999; Empirica, 1999). According to the Boston College Center for Work & Family, 46% of telecommuters worked while on vacation as compared to 34% of traditional office workers. In addition, only 24% of telecommuters rated their work/life balance as 'good' or 'very good' compared to 26% of traditional workers, and 38% of those using daily flexitime (the ability to alter working hours on a daily basis). These results would imply that telecommuting does not necessarily lead to greater feelings of work/life balance (Boston College report 2012). However, that same report finds that many employees see flexible work arrangements such as telecommuting as a privilege rather than as a way of working.

There is a lack of literature on working from home in the case of Australia, with only one recent study identified (Wooden and Fok 2013). The study, also based on the HILDA data, concentrated on 'home-workers', workers who worked the majority of their hours at home. That study found that only around 5 per cent of workers could be classified as 'home workers' and also finds that the trend in working at home appears to have declined over the period 2002-2010, with women working more hours at home than men (Wooden and Fok 2013: 113).

As Gajendran et al. (2007) note, despite the growing importance and widely spreading practice of telecommuting, reviews of the last 2 decades of research have been inconclusive on whether telecommuting is good or bad for employees. Given reports of the increasing importance of working from home, it is important to examine existing evidence for possible impacts on family functioning and assess the implications for policy and practice.

III. AUSTRALIANS WORKING FROM HOME

This section presents descriptive data on the incidence of working from home in Australia and trends in home working over the past decade. A multivariate analysis is presented to show which people are most likely to do so.

Data

The data used in this study come from the Household, Income and Labour Dynamics in Australia Survey. HILDA is a household panel survey in which respondents are tracked and interviewed each year. The panel was established through a random sample of private households in Australia, and within those households all persons aged 15 and over are interviewed. The bulk of interviews are conducted between September and December each year and, at the time of this analysis, data from eleven waves, spanning 2001 to 2011, were available. Around 13,000 individuals from over 7,000 households have responded in each year, with year-on-year attrition rates averaging below 10% (See http://www.melbourneinstitute.com/hilda/ for further details on the survey).

HILDA collects a wealth of data on respondents' demographic characteristics, their personal and family circumstances and on the nature of their employment. For the purposes of this analysis the sample is restricted to employed persons aged 15 and over who were employees (as opposed to employers, self-employed or unpaid family helpers). This results in a total sample over the eleven waves of 78,383 person-year observations on an unbalanced panel of 17,002 individuals for which working from home status could be determined.[1]

Each year persons in paid employment were asked the following question: "Are any of your usual working hours worked at your home (that is, the address of your usual place of residence)?" with the option to respond either 'yes' or 'no'. Employees who answered in the affirmative were then asked approximately how many hours each week they usually work from home. For those who indicated their hours varied, they were prompted instead "How many hours per week do you work at home on average over a usual 4-week period?". Finally, the home workers were asked "Are the hours worked

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[1] The exclusions reflect that our key interest is in the consequences of employment arrangements made between firms and employees. The sample available for multivariate analyses is lower due to non-response for some of the variables.

from home the result of a formal arrangement with your employer?".[2] For persons who held multiple jobs, the wording made clear that the responses should relate to their main job, defined as the one from which they get the most pay each week.

The responses to these questions form the basis for defining three variables used to capture employees' working from home status: two dummy variables indicating whether or not they work from home and whether this is part of a formal agreement with their employer; and a continuous variable for the number of hours usually worked from home each week. At face value, the term "your usual working hours" may seem somewhat ambiguous, and potentially resulting in an under-reporting of hours worked from home. Even though people may regularly work additional hours at home, would they necessarily consider these to be part of their 'usual working hours'? However, in the lead up to this question, respondents are specifically instructed to include any paid or unpaid overtime in their reckoning of 'usual hours', with an added note that this includes hours worked both at home and at the workplace.[3] Further, Wooden and Fok (2013) find that estimates based on HILDA suggest a slightly higher incidence of working from home relative to those from the main alternative data source for Australian employees, the Australian Bureau of Statistics' Location of Work Survey.

The incidence of working from home

For the pooled observations across all 11 waves from 2001 to 2011, 16.4% of employees indicated they worked some of their usual hours from home at any point in time, and for 5.3% of employees this was part of a formal agreement with their employer.[4] The proportion of women working any hours from home was marginally higher than for men (16.7% versus 16.1%), as was the proportion doing so under formal agreements (5.5% versus 5.2%), and both differences are statistically significant (at the 5% level).

For those doing so, the estimated average hours worked in the home was quite substantial at 7.7 hours per week – essentially a full day's work. On average, men report working more hours from home (7.9 hours per week) than women (7.5 hours). As expected, those who work from home as part of a formal agreement do so more intensively, working an average 10.4 hours in the home per week compared to 6.4 hours for others.

In contrast to the impression painted in much of the international literature of a growing intrusion of work into family life, the data show no evidence of an increase in the incidence of working from home between 2001 and 2011. This holds for both males and females, and for work under formal agreements and in total (see Figure 1). There also seems no obvious trend in the average hours worked, though a curious spike occurs for 2009 when an average 8.5 hours worked from home per

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[2] This was the sequence of questions for Waves 2 to 11. The order and wording of these questions were slightly different in Wave 1. In Wave 1 the question on whether any hours are worked at home was followed by the question on whether this was the result of a formal arrangement, and then the questions on the number of hours. For those who indicated the number of hours they worked from home varied, the follow up question was "Thinking about the last month, how many hours on average have you worked from home each week?".

[3] The authors would like to acknowledge and thank Mark Wooden for comments relating to this point, and for other comments on an earlier draft of the paper.

[4] All means and proportions presented in this section are calculated using the HILDA provided 'responding person population weight'.

week was reported. The absence of any upward trend in the incidence or intensity of working from home concords with evidence presented in Wooden and Fok (2013), as would be expected given that analysis is based on the same data. However, Wooden and Fok (2013) note that the ABS Locations of Work Survey also indicates a declining trend in the proportion of Australians working from home.

As expected, there are significant differences in the incidence of home working across occupations and industry. The stark difference across occupations is that for both managers and professionals, the proportion working from home is 36%, while for all other occupational groups it is below 10%. Similarly, managers and professionals are much more likely to work from home under a formal agreement. However, among those who work from home, managers and professionals are in fact less likely to do so through a formal agreement. Hence it appears managers and professionals are much more likely to work from home but not because they are provided greater provision or flexibility to do so by their employer. This may reflect that they have greater autonomy in deciding when and where to do their work, and thus implicit sanctioning from their employer to work from home, rather than entering into a formal agreement. Across industries it is employees in the education and training sector who have by far the greatest tendency to work hours from home (51%) but these workers are also not proportionately more likely to do so under a formal agreement.

Figure 1: Proportion of Australian employees working from home; 2001-2011
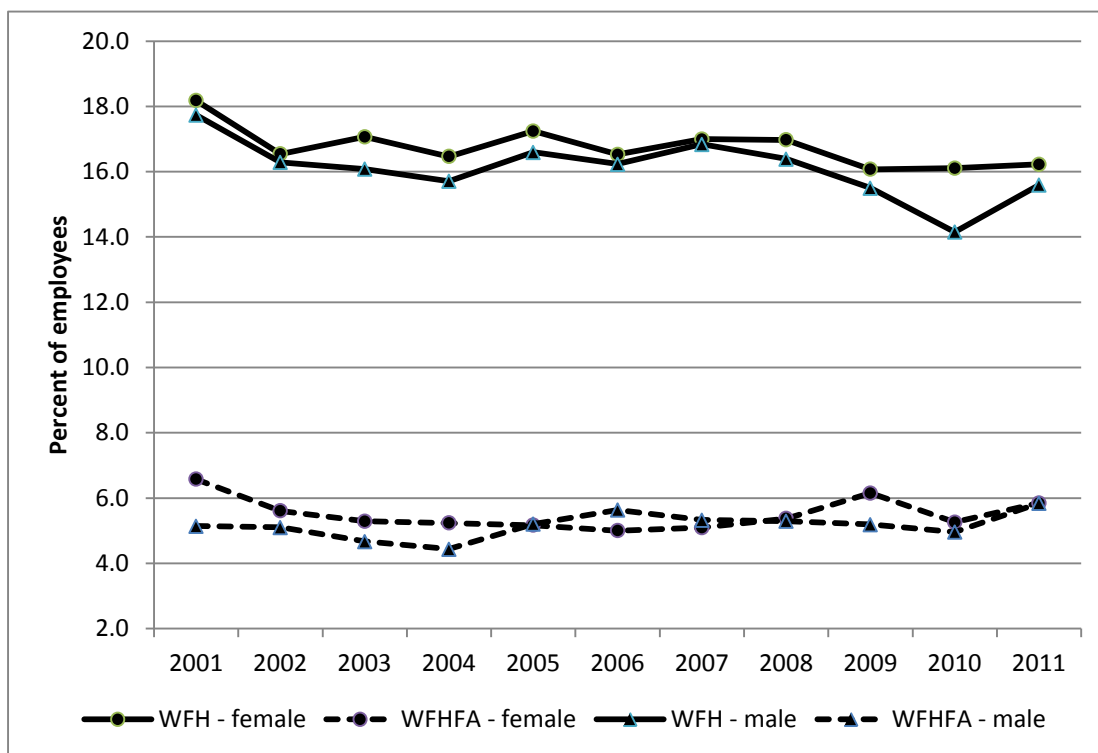
Notes: WFH - works from home; WFHFA – works from home under a formal agreement with employer.
Source: HILDA

Who works from home?

Of course differences across industries may be attributable to the occupational structure and gender composition within those industries, and vice versa. In order to identify independent factors that contribute to the observed incidence of working from home, multivariate logit models are estimated of the probability that an employee works any of their usual hours from home, and of the probability that they work from home as part of a formal arrangement with their employer. We also note that in 2010 and 2011 individuals were asked whether or not they had access to the internet at home. Just under 93% of persons reported having access, and as would be expected the incidence of working from home was substantially greater for those on-line (17% compared to 6% for those without the internet at home). However, home internet access is not included in the multivariate analysis because of the likelihood that it is endogenous.

Random effects panel models are estimated to utilise the fact that the data represent repeat observations on individuals.[5] Given arguments that the reasons Australians work from home vary between men and women (Powell & Craig 2013), separate models are estimated by gender. The contributions to differences in the incidence of working from home between men and women are explored further below. The results are reported in the form of odds ratios, which shows the estimated effect of a variable on the probability of working from home relative to its default category. A ratio of unity indicates no difference between the two categories. In the first model, for example, the coefficient of 1.129 for 45-54 year old females indicates that they are estimated to be 12.9 percent (that is 1.129-1=0.129) more likely to work from home than the omitted category of women aged 35 to 44 years. In contrast, women between 24 and 34 are estimated to be 17.7% less likely to work from home (that is, 0.823-1=-0.177). All variables have been defined in categorical form for convenience of interpretation, although entering some in linear and quadratic forms proved to be technically superior specifications.

The results indicate that the likelihood of working from home increases with age. It is markedly higher for women with a resident child aged 0-4 years whether they are married or single, and to a lesser extent the youngest child being aged 5-14.[6] The presence of children has a lesser impact on married men's work locations. The results for sole fathers are not significant, which is likely to be a reflection of the low sample numbers for sole fathers.

Characteristics of an individual's employment have a major impact upon the incidence of working from home. Compared to permanent employees, fixed term employees are more likely to work from home and in particular more likely to do so under a formal agreement (60% more likely in the case of females and 32% in the case of men). Casuals are between 20% and 45% less likely to work from home. Those employed under 'other' contractual arrangements are around 3 to 4 times more likely to work from home, but we suspect this results from a blurring between the definition of 'employee' and those who are 'own account' workers to some extent, such as employees paid on commission or possibly contractors or consultants. Relative to employees in the private sector, government employees are less likely to work from home. Perhaps surprisingly, this arises primarily from a reduced likelihood of working from home through a formal agreement and holds for

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[5] Specifically, the XTLOGIT procedure in STATA, with vce(robust) option to generate robust standard errors.
[6] The variables for the presence of children are based on the presence and age of the respondent's own resident children in the household.

employees in government businesses or statutory commercial authorities and other areas of the public sector.

The incidence of working from home increases with the employees' length of tenure with their current employer. In terms of hours worked, the incidence follows a U shape. The default category is those working between 31 and 38 hours, which include the most common standard full-time working weeks of a 35 hour or 37.5 hour week. Compared to these 'standard full-time' workers, people who usually work part-time and people who work longer hours are more likely to do some of their hours from home. The effect is very strong for those working long (45-54) and very long (55 or more) hours per week. Union members are substantially less likely to work from home.

The occupation dummies confirm that it is professionals and managers that are most likely to work from home. The incidences are anything from 40% to 95% lower for all other occupations. As the descriptive statistics implied, employees in the education and training sector are much more likely than those in healthcare and social assistance services (the omitted category) to work from home after controlling for occupational structure and the other job and individual characteristics. A higher incidence of working from home for those in agriculture, forestry and fishing may again reflect that some people live on the properties where they work, as in the case of farms, or an overlap between employee and own account workers. The retail trade industry and hospitality (accommodation and food services) have the lowest incidence of home workers.

The results help to give some indication of whether or not working from home reflects employees' preferences, and the circumstances under which working from home is a privilege rather than an imposition on non-work life. We can be more confident that if someone indicates that hours worked from home are "…the result of a formal arrangement with your employer" then they have (or had at the time) a preference for working from home.[7] Most of the control variables have similar effects on both the probability of working from home at all, and the probability of working from home under a formal arrangement. The fact that demographic factors, such as age and the presence of young children have similar effects on both suggests workers themselves seek that flexibility: they both work from home more and enter into formal agreements to allow them to do so. Second, characteristics of employees that would be expected to be associated with higher status within an organisation and within the labour market more generally – being in a professional or managerial job, not being a casual, having longer tenure with the employer – are associated with being more likely to work from home. These associations suggest being able to work from home is a valued job attribute.

However, a notable exception is the fact that the hours effect is markedly stronger for working any hours from home. For example, females and males who usually work 55 or more hours per week are estimated to be 9 and 7 times more likely to work from home, respectively. In contrast, they are respectively around 2 and 3 times more likely to work from home via a formal agreement. This suggests that the dramatic increase in home working associated with long working hours is, by and

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[7] This is not to dismiss the possibility that some employees may have entered into formal agreements that do not reflect their preferences. The logic of this as a robustness check relies only on the assumption that those with formal agreements are *more* likely to have a preference for working from home than those who work from home without a formal agreement.

large, not a premeditated arrangement, but arises through a contemporaneous need to deal with demanding workloads and time stress.

Finally, the influence of being a union member is to reduce the likelihood of working from home, and to reduce the incidence of formal agreements much more. It appears that unions do not promote working from home and, in particular, do not facilitate formal arrangements with employers for such flexibility. If one believes that unions act to protect employees' conditions of employment and increase their members' bargaining power with their employer, then this points to the conclusion that working from home is something that detracts from the quality of working conditions: something employees are 'protected' against by their union. One can conceive of some circumstances – perhaps job sharing, space constraints or hot-desking - where employers 'impose' upon the employee an expectation that they will conduct some of their work from their own home. However, it seems hard to believe formal agreements are, on average, not desired by the employee *and* are even less desirable than working from home without a formal agreement. An alternative hypothesis is that unions discourage working from home because it undermines their ability to mobilise and recruit workers as members.

Table 1: Probability of working from home, and working from home under a formal agreement, Australian employees, logistic regression results, by gender, 2001-2011

	Women				Men			
	WFH		WFHFA		WFH		WFHFA	
	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|
Constant	0.038	0.00	0.010	0.00	0.048	0.00	0.011	0.00
Age (years)								
15 to 24	0.336	0.00	0.285	0.00	0.370	0.00	0.490	0.00
25 to 34	0.823	0.03	0.637	0.00	0.720	0.00	0.721	0.01
35 to 44	—		—		—		—	
45 to 54	1.129	0.16	1.093	0.44	1.093	0.30	1.174	0.21
55 to 64	1.093	0.48	1.209	0.27	1.248	0.07	1.521	0.01
65 plus	1.249	0.44	1.004	0.99	1.226	0.42	1.749	0.06
Family status								
Married with no kids	1.389	0.00	1.254	0.08	1.248	0.02	1.262	0.05
Married & youngest child 0-4	2.858	0.00	3.559	0.00	1.471	0.00	1.099	0.48
Married & youngest child 5-14	1.970	0.00	1.973	0.00	1.498	0.00	1.264	0.09
Married & youngest child 15-24	1.261	0.07	1.348	0.09	1.081	0.56	1.071	0.68
Single with no kids	—		—		—		—	
Single & youngest child 0-4	2.285	0.00	2.557	0.00	1.231	0.20	1.274	0.26
Single & youngest child 5-14	1.543	0.00	1.575	0.01	1.265	0.21	1.046	0.87
Single & youngest child 15-24	0.954	0.77	0.844	0.47	0.627	0.09	0.817	0.57
Has disability	1.146	0.06	1.220	0.04	1.014	0.85	1.095	0.38
Employment contract:								
Fixed term	1.298	0.00	1.605	0.00	1.166	0.05	1.321	0.01
Casual	0.720	0.00	0.820	0.09	0.555	0.00	0.637	0.00
Permanent or ongoing	—		—		—		—	
Other	3.372	0.00	4.059	0.00	2.675	0.00	4.042	0.00

	Women				Men			
	WFH		WFHFA		WFH		WFHFA	
	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|
Sector								
Private, for profit	—		—		—		—	
Private, not-for-profit	1.131	0.25	0.967	0.82	1.575	0.00	1.335	0.10
Government enterprise	0.714	0.01	0.487	0.00	0.773	0.05	0.716	0.05
Other Government	0.842	0.08	0.487	0.00	0.950	0.65	0.654	0.01
Other	1.505	0.02	1.034	0.89	2.174	0.00	1.644	0.08
Tenure with current employer								
1 year or less	—		—		—		—	
2 to 5 years	1.370	0.00	1.303	0.00	1.323	0.00	1.168	0.05
6 to 10 years	1.613	0.00	1.512	0.00	1.344	0.00	1.122	0.32
11 or more years	1.702	0.00	1.494	0.00	1.716	0.00	1.196	0.16
Hours usually worked in main job								
1 to 15 hours per week	1.201	0.10	2.135	0.00	2.394	0.00	3.630	0.00
16 to 30 hours per week	1.144	0.09	1.382	0.00	2.066	0.00	2.474	0.00
31 to 38 hours per week	—		—		—		—	
39 to 44 hours per week	1.930	0.00	1.235	0.05	1.713	0.00	1.744	0.00
45 to 54 hours per week	4.885	0.00	1.954	0.00	4.084	0.00	2.121	0.00
55 or more hours per week	9.244	0.00	2.293	0.00	6.996	0.00	2.924	0.00
Union/employee org. member	0.865	0.04	0.543	0.00	0.807	0.00	0.574	0.00
Occupation								
Manager	1.123	0.24	1.011	0.94	0.958	0.61	0.895	0.33
Professional	—		—		—		—	
Technician/tradesperson	0.192	0.00	0.218	0.00	0.184	0.00	0.292	0.00
Community/pers services worker	0.274	0.00	0.430	0.00	0.278	0.00	0.392	0.00
Clerical/administration	0.311	0.00	0.446	0.00	0.354	0.00	0.454	0.00

	Women				Men			
	WFH		WFHFA		WFH		WFHFA	
	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|
Sales worker	0.350	0.00	0.366	0.00	0.557	0.00	0.599	0.01
Machinery operator/driver	0.081	0.00	0.221	0.00	0.043	0.00	0.064	0.00
Labourer	0.108	0.00	0.168	0.00	0.104	0.00	0.191	0.00
Industry								
Agric, forestry, fishing	4.705	0.00	5.555	0.00	2.470	0.00	3.407	0.00
Mining	0.773	0.57	0.465	0.24	0.831	0.40	0.695	0.30
Manufacturing	1.218	0.26	1.585	0.04	0.771	0.11	0.913	0.71
Electricity, gas, water	0.962	0.95	1.832	0.29	1.019	0.94	1.366	0.39
Construction	2.662	0.00	3.222	0.00	1.249	0.19	1.318	0.25
Wholesale trade	2.071	0.00	2.215	0.00	1.788	0.00	2.417	0.00
Retail trade	0.564	0.00	0.477	0.00	0.526	0.00	0.561	0.03
Accommodation/food	0.634	0.02	0.580	0.03	0.658	0.05	0.512	0.03
Transport & storage	2.503	0.00	4.726	0.00	1.131	0.53	1.668	0.06
Information media/telecoms	1.546	0.04	1.742	0.04	2.061	0.00	1.675	0.08
Finance & insurance	1.016	0.93	1.221	0.44	1.907	0.00	1.509	0.15
Rent, hiring, real estate	2.266	0.00	1.771	0.12	2.532	0.00	1.449	0.36
Professional services	2.361	0.00	2.591	0.00	2.476	0.00	2.396	0.00
Admin support services	1.264	0.23	1.748	0.02	0.972	0.91	1.165	0.63
Public admin	1.054	0.73	1.491	0.05	0.873	0.39	0.833	0.44
Education & training	7.990	0.00	1.723	0.00	7.529	0.00	2.284	0.00
Healthcare/social assistance	—		—		—		—	
Arts & recreation	1.483	0.13	0.846	0.64	1.925	0.01	1.727	0.06
Other services	2.155	0.00	2.195	0.00	1.364	0.13	1.961	0.01

	Women				Men			
	WFH		WFHFA		WFH		WFHFA	
	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|	Odds Ratio	P>|z|
Observations	39016		39016		38928		38928	
Individuals	8532		8532		8424		8424	
Obs/person	4.6		4.6		4.6		4.6	
Wald Chi-sq	2892	0.00	846	0.00	2858	0.00	891	0.00
Log pseudo-likelihood	-11322		-6530		-11109		-6231	

The simple frequencies presented above show women are more likely than men to work from home, particularly with respect to formal agreements. The same result was observed for the UK by Felstead et al. (2000). Gender differences are explored further by estimating similar models for males and females jointly with the inclusion of a dummy variable capturing gender. As shown in Table 2, when such a model is estimated with only a male dummy variable and constant term, the odds ratio for males is not significantly different from 1 in the likelihood of working any hours from home or of working from home through a formal agreement.

The absence of significant differences between men and women employees holds with the addition of exogenous demographic characteristics (age, family status and presence of a disability). However, men are identified as being substantially less likely to work from home when the model controls for variables relating to the nature of the job (contract type, tenure, hours usually worked and union membership). Further exploration reveals this is driven by the inclusion of the variables capturing hours worked. Given the number of hours that men work each week, they are around 40 percent less likely than women to work from home and around 20% less likely to do so through a formal agreement.

Standardising for industry and occupation only has the opposite effect. For a given occupation and industry of employment, men are more likely than women to work any hours from home. The occupational distribution and industrial distribution of employment contribute relatively equally to this result. The difference between genders with respect to the incidence of formal agreements is insignificant when occupation and industry are controlled for.

Table 2: Probability of working from home - estimated odds ratio for the 'male' variable

Variables included	Work any hours from home OR (p>|z|)	Formal agreement OR (p>|z|)
Male only	0.990 (0.86)	0.913 (0.20)
Male + demographics[a] only	0.995 (0.94)	0.912 (0.19)
Male + job characteristics[b] only	0.668 (0.00)	0.827 (0.01)
Male + occupation and industry only	1.368 (0.00)	0.974 (0.73)
Full model	0.949 (0.38)	0.935 (0.39)

Notes: a. Includes age, family status and disability status; b. includes type of employment contract, sector, tenure; hours worked; union membership.

IV. IS HOME WORK WELL PAID?

To assess the financial pay-off that workers receive for hours spent working at home a standard Mincer wage equation was estimated in which the dependent variable is the log of real hourly wages.[8] The inclusion of a dummy variable indicating that the individual works some of their usual hours from home provides an estimated coefficient that is essentially zero and completely insignificant, indicating that workers receive neither a wage penalty nor wage premium for working from home (see Table 3). Differentiating further between those who work from home with and without formal agreements, evidence is found of a small wage premium for females who work from

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[8] These results are not reported in full, but the random effects model is well behaved with variables having the expected signs. The range of controls is the same as those shown in Table 4. The wages data are deflated using the December quarter CPI index for each year to be expressed in real 2001 dollars.

home through a formal agreement – a wage premium of around 2.7%, significant at the 5% level. No effect on the female wage rate is found for working hours at home that are not formally sanctioned by the employer. For men no significant impact is found on hourly wages. The result for female hourly wages could be taken to imply either that women who work from home under a formal arrangement have higher productivity, or that women who attract higher wages are more likely to also be afforded flexible working options.

Hourly wages in this specification are calculated by dividing the HILDA derived variable for 'current weekly gross wages and salary' by usual weekly hours worked. Note that this places the number of hours worked on the left-hand side of the estimated equation, where it acts as the denominator. Given (1) that many workers are not paid by the hour and (2) the sharp increase in the incidence of working from home for employees putting in long hours, this could misrepresent the impact on overall earnings. Restricting the sample to full time employees and estimating models for the log of weekly wages tells a very different story. Working from home is then estimated to be associated with around 4% higher weekly wages for men and women who work hours informally from home, and for men who have a formal arrangement. For women with a formal arrangement the associated premium is 2.1%, but insignificant (p=0.12). It seems that full-time workers who work from home do earn higher weekly wages, but not higher hourly wages.

Table 3: Estimated wage premium associated with working from home on wages – selected results from Mincer wage equations

Dependent variable/sample	Works any hours from home	Works from home	
		Has formal arrangement	No formal arrangement
Hourly real wage			
Female employees	0.009 (0.27)	0.027 (0.05)	-0.001 (0.92)
Male employees	-0.008 (0.29)	-0.005 (0.67)	-0.009 (0.24)
All employees	0.000 (0.98)	0.010 (0.28)	-0.004 (0.42)
Weekly real wage			
Female FT employees	0.035 (0.00)	0.021 (0.12)	0.040 (0.00)
Male FT employees	0.040 (0.00)	0.043 (0.00)	0.038 (0.00)
All FT employees	0.038 (0.00)	0.035 (0.00)	0.040 (0.00)

To more fully explore the returns to hours worked in the home, we depart from the standard wage equation and place hours worked on the right hand side, decomposed into the number of hours usually worked at the workplace, the number worked at home under a formal arrangement and the number of hours worked at home by those with no formal arrangement. For ease of interpretation wages are now expressed in real dollar amounts rather than in logarithmic form. The coefficient on the hours variables can then be taken as a direct 'hourly wage rate'.

Table 4: Linear regressions results for usual weekly wages ($2001)

	Females		Males		Persons	
	Coef.	P>|z|	Coef.	P>|z|	Coef.	P>|z|
Constant	-597.64	0.00	-975.43	0.00	-1006.01	0.00
Weekly hours worked						
At work	12.03	0.00	11.41	0.00	11.67	0.00
At home, formal agreement	11.16	0.00	10.08	0.00	10.50	0.00
At home, no formal agreement	10.01	0.00	11.66	0.00	10.79	0.00
Wave (1 to 11)	10.59	0.00	19.81	0.00	15.16	0.00
Male					142.66	0.00
Age (in years)	12.26	0.00	3.52	0.60	17.62	0.00
Age-squared	-0.17	0.00	-0.11	0.20	-0.25	0.00
Years of education	37.58	0.00	73.33	0.00	54.57	0.00
Married	5.39	0.29	48.84	0.00	31.43	0.00
Has Long-term disability	0.26	0.95	-12.08	0.05	-6.17	0.11
& disability restrict works	-10.92	0.03	-21.77	0.01	-17.66	0.00
Non-English speaking bkgrd						
& Eng proficiency good	-14.90	0.02	-48.70	0.00	-32.75	0.00
& Eng. Proficiency poor	-97.66	0.00	-54.96	0.15	-70.92	0.00
Works part-time	-61.44	0.00	-52.76	0.00	-61.83	0.00
Employment contract:						
Fixed term	7.28	0.24	37.56	0.00	22.22	0.00
Casual	-4.60	0.24	7.07	0.34	4.21	0.29
Permanent or ongoing	—		—		—	
Other	-37.18	0.26	66.31	0.36	16.92	0.69
Sector						
Private, for profit	—		—		—	
Private, not-for-profit	-21.12	0.00	-68.38	0.00	-40.97	0.00
Government enterprise	22.17	0.01	-0.25	0.99	11.00	0.23
Other Government	14.64	0.01	-26.65	0.03	-5.69	0.35
Other	-6.58	0.47	-51.21	0.01	-19.81	0.03
Union/employee org. member	19.23	0.00	44.06	0.00	29.36	0.00
Work experience (years)	10.04	0.00	33.15	0.00	16.19	0.00
Work exp-squared/100	-9.96	0.00	-42.12	0.00	-15.53	0.00
Tenure - current employer (years)	3.32	0.00	3.42	0.03	2.95	0.00
Tenure squared	-0.03	0.33	-0.02	0.57	-0.01	0.65
Occupation controls	Yes		Yes		Yes	
Industry controls	Yes		Yes		Yes	
Observations	30084		31585		61669	
Individuals	7291		7455		14745	
Obs/persons	4.1		4.2		4.2	
Wald Chi-sq	14643	0.00	7234	0.00	17821	0.00
R-sq: within	0.40		0.25		0.28	
between	0.65		0.48		0.54	
overall	0.60		0.45		0.51	

The full results (see Table 4) reflect established findings – wages increase with age (but at a declining rate), with years of education, previous years of work experience and time with the current employer. Wages are estimated to be higher for males by an average of $143 per week. There is an additional premium for married men ($49 per week) and for union members. A wage penalty is observed for persons with a disability and with lower English language proficiency. The coefficients on the wave variable suggest real weekly wages increased by around $10.50 per annum for women and $20 per annum for men over this time.

For each observation three weekly hours variables are included. To see how these are created, consider a worker who reports usual hours of 37.5 hours per week. If that employee does not indicate that they work some of their usual hours at home, then hours at work takes a value of 37.5, and both the variables capturing hours at home (with a formal agreement and without a formal agreement) are set to zero. If the employee indicated they usually work 7.5 hours at home through a formal agreement with their employer, hours at work would be set to 30 hours per week, hours at home under a formal agreement set to 7.5 and hours without a formal agreement set to 0. Similarly, if 7.5 hours are worked at home without a formal arrangement, hours at work are set to 30 and hours with a formal arrangement set to zero.

The results indicate that on average work undertaken at home is rewarded at a rate of around $10 to $11 per hour. However, this is a rate of about $1 per hour less than the return to hours spent in the office. The one-dollar penalty roughly holds for both men and women, and for hours worked at home with and without a formal arrangement. If the sample is restricted to full time workers a similar penalty of around $1 per hour relative to time put in at the workplace is observed. Given that many employees are not directly recompensed for additional hours worked, such as through overtime payments, it is not surprising that additional hours put in at home are estimated to attract lower reward in terms of current earnings. An interesting avenue for further investigation is whether or not such hours worked at home attract future pay-offs in terms of promotion or wage increases.

V.   DO EMPLOYEES PREFER TO BE ABLE TO WORK FROM HOME?

A number of data items are collected in HILDA which enable direct tests on whether working from home is generally a positive or negative attribute of jobs from an employees' perspective. Specifically we utilise responses to two questions relating to job satisfaction. Employed persons are asked to indicate how satisfied or dissatisfied they are with various aspects of their jobs and their job overall. A showcard is used which depicts a scale ranging from 0 (totally dissatisfied) to 10 (totally satisfied). The items include:

- The flexibility available to balance work and non-work commitments
- All things considered, how satisfied are you with your job.[9]

Differences in these two items are investigated conditional upon working from home status to see whether working from home is associated with higher or lower job satisfaction. Looking at the mean responses pooled over the 11 waves (Table 5) and taking all women who work from home, the

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[9] The other items covered were satisfaction with 'your total pay', 'your job security', 'the work itself (what you do)', and 'the hours you work'.

responses indicate that home workers are significantly less satisfied with the flexibility available to balance work and non-work commitments than women who do not work from home. However, those who work from home through a formal agreement report markedly higher satisfaction with their working time flexibility. For men, those who work any hours from home are more satisfied with their flexibility to balance work and non-work commitments than those who do not work from home; and the subset of those who have formal arrangements are more satisfied still. Employees who work some of the usual hours from home under a formal agreement also display higher overall job satisfaction. Unexpectedly, the increase in job satisfaction associated with having a formal arrangement to work some hours from home is no greater for those with resident children.

Table 5: Means: satisfaction with flexibility to balance work and non-work commitments and overall job satisfaction; by gender and parent status

	Work any hours from home	WFH under formal arrangement	Don't work from home
Satisfaction with flexibility			
Females - all	7.23***	8.09***	7.58
Female parents[a]	7.30***	8.14***	7.60
Males - all	7.37*	7.95***	7.31
Male parents[a]	7.28**	7.84***	7.17
Overall job satisfaction			
Females - all	7.72*	7.89***	7.68
Female parents[a]	7.76	7.86**	7.75
Males - all	7.64***	7.89***	7.54
Male parents[a]	7.58*	7.79***	7.52

Notes: ***, ** and * denote the difference between the mean and the corresponding mean for those who do not work from home is significant at the 1%, 5% and 10% levels, respectively, by the standard t-test. a. Parents are those who have any resident own children up to the age of 24.

To control for a large range of other potential factors that may affect job satisfaction, and may be correlated with working from home status, multivariate models are estimated with the subjective ratings of job satisfaction as the dependent variables. For the explanatory variables, the variables capturing working from home status are now added to the set of covariates included in the models reported in Table 2. In the interests of parsimony, age, hours usually worked and tenure are now specified in linear and quadratic forms rather than categories, and the occupation and industry controls are included but not reported.[10]

The satisfaction rating scale provides an ordinal discrete variable, suited to estimation using the ordered probit or logit model. To estimate these as a panel model, however, requires collapsing the dependent variable into a binary dummy, and estimating the probability of the employee reporting being 'satisfied' versus 'dissatisfied', or having 'high' as opposed to 'low' satisfaction. This inevitably requires imposing a somewhat arbitrary cut-off on the scale. For ease of exposition, the specification used is instead a simple linear regression. Although this is technically an inappropriate specification for a dependent variable bounded between 0 and 10, results tend to be very similar whether such dependent variables are treated as cardinal variables or the more technically correct ordered logit or probit specifications are used (see Kristoffersen 2010, Ferrer-i-Carbonell and Frijters 2004).

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[10] Hours worked was also tested in logarithmic form, but this resulted in a lower R-squared.

Working from home status is now captured through three mutually exclusive states: works from home via a formal arrangement, works from home but without a formal arrangement and does not work from home.[11] Results of the random-effects panel model[12] are reported in Table 6. The key result is the positive and highly significant association between an employee working from home through a formal arrangement and their satisfaction with the flexibility their job offers to balance work and non-work commitments. To appreciate that the estimated effect is of some magnitude, consider the estimated coefficient of 0.397 for females. The literal interpretation is that home work undertaken through a formal arrangement, other things being equal, moves one up the 0 to 10 satisfaction scale by almost 0.4 of a point. Responses on these scales are tightly clustered around 7.5. For satisfaction with flexibility, 80% of employees nominate a figure from 6 to 10 in the 'satisfied' interval. For overall job satisfaction 89% indicate a figure from 6 to 10. Hence a 'shift' of almost 0.4 for females and 0.36 for males represents sizeable differences in average satisfaction. There is a smaller but positive association observed for overall job satisfaction.

In contrast working from home without a formal agreement is associated with marginally lower satisfaction with flexibility to balance work and non-work commitments and lower overall job satisfaction. The estimated effect is not significant for men's satisfaction with flexibility. Before exploring this result in more detail, we briefly comment on results for some other variables.

The presence of young and school aged children decreases women's satisfaction with flexibility, but otherwise the presence of resident children is associated (on average) with greater satisfaction. Employees with a disability that restricts everyday activities report lower satisfaction in all cases. Permanent employment and work in the not-for-profit and government sector appears preferable. Being a member of a union or employee association is associated with markedly lower satisfaction with flexibility and, for women, with overall job satisfaction. This result may be endogenous in the sense that dissatisfied employees may be more likely to join a union. However, it also fits with the results reported above suggesting that unions may actually act to oppose flexible working arrangement that include the possibility of working from home.

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[11] This contrasts to the earlier specification for working from home status as the dependent variable in which those with a formal arrangement were a subset of those working any hours form home.
[12] XTREG in STATA with the random effects and robust standard errors options.

Table 6: Job satisfaction: panel regression results, HILDA waves 1-11 (2001-2011).

	Satisfaction with flexibility to balance work and non-work commitments				Satisfaction with job overall			
	Female		Male		Female		Male	
	Coef.	P>|z|	Coef.	P>|z|	Coef.	P>|z|	Coef.	P>|z|
Constant	7.965	0.00	9.002	0.00	8.694	0.00	9.319	0.00
Working from home status								
Does not work from home	—		—		—		—	
Works from home: formal arrangement	0.397	0.00	0.356	0.00	0.113	0.01	0.201	0.00
Works from home: no arrangement	-0.130	0.00	-0.010	0.81	-0.042	0.21	-0.017	0.57
Age (in years)	0.024	0.01	-0.020	0.02	-0.049	0.00	-0.090	0.00
Age-squared	-2.2E-4	0.05	-3.6E-4	0.00	7.4E-4	0.00	0.001	0.00
Family status								
Married with no kids	0.098	0.04	0.063	0.19	0.163	0.00	0.090	0.01
Married & youngest child 0-4	-0.176	0.00	0.035	0.52	0.226	0.00	0.137	0.00
Married & youngest child 5-14	-0.091	0.12	0.020	0.73	0.230	0.00	0.146	0.00
Married & youngest child 15-24	0.005	0.93	0.081	0.24	0.259	0.00	0.136	0.01
Single with no kids	—		—		—		—	
Single & youngest child 0-4	-0.137	0.10	0.032	0.71	0.112	0.10	0.134	0.05
Single & youngest child 5-14	-0.234	0.00	0.177	0.09	0.201	0.00	0.193	0.01
Single & youngest child 15-24	-0.110	0.18	0.022	0.86	0.058	0.37	0.084	0.36
Has disability	-0.136	0.00	-0.078	0.03	-0.121	0.00	-0.079	0.01
Employment contract:								
Fixed term	-0.017	0.68	-0.071	0.09	-0.048	0.13	-0.023	0.46
Casual	0.056	0.13	-0.157	0.00	-0.079	0.01	-0.252	0.00
Permanent or ongoing	—		—		—		—	
Other	-0.408	0.06	-0.433	0.03	-0.722	0.00	-0.174	0.26
Sector								
Private, for profit	—		—		—		—	
Private, not-for-profit	0.210	0.00	0.162	0.02	0.075	0.07	0.175	0.00

	Satisfaction with flexibility to balance work and non-work commitments				Satisfaction with job overall			
Government enterprise	0.028	0.67	0.070	0.27	0.048	0.32	0.170	0.00
Other Government	0.082	0.10	0.160	0.01	0.104	0.01	0.239	0.00
Other	0.099	0.29	0.265	0.05	0.120	0.10	0.105	0.27
Tenure with current employer (years)	0.010	0.10	-0.002	0.78	-0.034	0.00	-0.026	0.00
Tenure squared	-4.1E-4	0.04	-1.4E-5	0.94	0.001	0.00	0.001	0.00
Hours usually worked/week in main job	-0.024	0.00	-0.022	0.00	-0.005	0.09	-0.007	0.02
Hours squared	-2.7E-4	0.00	-2.2E-4	0.00	-3.4E-5	0.39	4.1E-5	0.23
Union/employee org. member	-0.331	0.00	-0.229	0.00	-0.187	0.00	-0.019	0.50
Occupation controls	Yes		Yes		Yes		Yes	
Industry controls	Yes		Yes		Yes		Yes	
Observations	38990		38884		39001		38919	
Persons	8529		8417		8530		8424	
Obs/person	4.6		4.6		4.6		4.6	
Wald Chi-square	1519	0.00	1295	0.00	546	0.00	757	0.00
R-squared: within	0.04		0.03		0.01		0.01	
Between	0.10		0.08		0.04		0.05	
Overall	0.08		0.07		0.02		0.03	

Satisfaction with flexibility to balance work and non-work commitments decreases markedly with the number of hours worked per week. Taking the coefficients on hours and hours-squared together, the estimated effect of working 55 hours per week as opposed to 35 hours per week is to reduce satisfaction with flexibility to balance commitments by almost a full point on the scale, and by 0.8 of a point for men. For overall job satisfaction the effects are much smaller.

Given these and the prior results relating to the impact of hours on the likelihood of working from home, additional models were estimated separately for the subset of long-hours workers, defined as those who report usually working 45 hours or more, and other workers. The positive effect of a formal arrangement to work from home on satisfaction with flexibility is evident for both groups. However, the negative association with informally working from home applies only for those working 44 hours or less. From this, we surmise that working informally from home does detract from employees' satisfaction with their work-life balance. However, for those who find themselves working long hours, working some of those hours from home becomes a 'necessary evil' to facilitate those long hours. For these workers it is the long hours that detract from work-life balance, not so much the fact that this often leads to work infiltrating the home.

Finally, separate models were estimated for parents and non-parents. The effects with respect to the association between working from home status and satisfaction with the flexibility to balance work and non-work commitments are in fact remarkably similar for those with and without resident children, and this holds for men and women. However, for parents satisfaction drops off more quickly with hours worked.

VI. CONCLUSION

We have sought to cast light on the issue of whether or not working from home is something typically associated with good jobs. This has been investigated primarily in terms of the effect of working from home on work-life balance. Is working from home a positive attribute that helps employees balance their commitments? Or is it one of the ways through which labour market deregulation is undermining standard working conditions?

We have found no simple answer. The descriptive analysis suggests that, in just over a decade of the HILDA survey, there has not actually been any increase in the incidence of employees working from home. If anything there has been a slight decrease in the proportion of employees working from home overall, while the proportion doing so through a formal arrangement with their employer has remained static. These findings for Australia seem to be in contrast to the impression painted in the international literature of a growing incidence of 'teleworking' and 'telecommuting'. Those who do so report working a substantial number of hours from the home - around one day a week and longer for those with formal home working arrangements - and this has also remained relatively stable over time.

Multivariate analyses show that managers and professionals are by far the most likely to work from home. Women with pre-school and school aged children, older workers, those who have been with their employer for longer and who are employed in the private sector are also more likely to work from home. Union membership is associated with a lower incidence of working from home.

The most marked variation in the likelihood of working from home comes with respect to the number of hours usually worked per week, and herein lies the double-edged nature of home-work. Working long hours goes hand in hand with working from home. Among full-time workers, it seems that jobs associated with working from home are higher paying jobs – typically paying around 4% higher weekly wages after controlling for a wide range of individual and job characteristics. However, this increase in wages does not fully compensate home workers for the number of additional hours they put in. We estimate that workers receive an hourly rate for hours worked in the home that is roughly 10% lower than they are compensated for hours at the workplace. Savings in commuting times may offset this difference, and it is also possible that working additional hours from home may contribute to future promotions and pay rises.

Irrespective of hours worked, employees' value having a formal arrangement that permits working from home and they feel this helps them to balance work and non-work commitments. It is clearly a positive attribute of a job. We must be careful of what can be taken from this in terms of implications for policy and practice. The positive association between having a formal arrangement to work hours from home will be driven to a large degree by selectivity - those who can benefit from such an arrangement will be much more likely to negotiate one, and so it is not surprising that they then express greater satisfaction with their flexibility to balance work and non-work commitments. We cannot assume that granting more employees formal arrangements for working from home will improve their satisfaction with work-life balance to the same degree. Certainly the *option* of entering into a formal agreement to work some hours from home is seen as a positive for employees, but employers also need to consider productivity and other issues associated such arrangements.

The complication arises with respect to employees working from home outside of a formal agreement. It is clear that many of these hours are worked from home as a means to cope with long hours of work and high workloads. Once hours of work are controlled for, it is women who are more likely to work from home. On the whole this intrusion of work into home life reduces employees' (notably women's) level of satisfaction with flexibility. For those working long hours, being able to do some of those hours from home does not necessarily impact negatively on their satisfaction with work life balance, but rather it is the long hours themselves that detract from satisfaction. In the sample used here, one in four male employees reported working 45 hours per week or longer and one in ten women. The important question is the extent to which the capacity to work from home facilitates longer work hours and hence contributes to the dissatisfaction with work life balance associated with longer hours of work and reduced leisure time. These effects are most clearly seen through the impacts on satisfaction with flexibility to balance work and non-work commitments, but they also filter through to overall job satisfaction.

Overall, we conclude that jobs which offer the possibility to work from home are 'good jobs' for part-time workers and those who work standard full-time hours. In fact, for any *given* level of hours worked, the option to work from home is a positive job attribute. But there is a sting in the tail. Once one works from home, hours are not given. There is reason to believe that working from home facilitates greater intrusion into life's non-work domains in response to increases in workloads.

To the extent that employees' choices to work from home will be primarily voluntarily, albeit in some cases a choice made due to high workloads, job insecurity and or other pressures, it might be

expected that the 'rational, utility maximising' worker would also report satisfaction with those arrangements. The possibility that employees do not fully appreciate the externalities associated with working from home, or mistakenly see it as a one-off or temporary response to their workloads, can be explored through HILDA thanks to the ability to link an individual's work patterns to third-party ratings about work-life balance and family functioning provided by other members of the household. This is the subject of ongoing research. The possibility of utilising the longitudinal nature of HILDA to test the impact of working from home in one year upon future promotion prospects and other future labour market outcomes provides a further avenue for future research. There is also a need for research using alternative constructs and richer information to add to what can be gleaned from the existing HILDA questions. This may come in the form of qualitative studies and other surveys addressing the topic, or through additional questions being incorporated into future waves of HILDA.

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