

COVID-19: An Opportunity to Reset Policy Levers for Better Gender Equality in the Economy and Society^a

*Dr Tania Dey^b South Australian Centre for Economic Studies, University of Adelaide
Associate Professor Michael O'Neil South Australian Centre for Economic Studies,
University of Adelaide*

Abstract

This paper presents a discussion on economic incentives and social norms that have contributed to the changing participation of women in the Australian labour market. While that participation continues to increase there is still more that can be done to improve equality and equity in the workforce that will contribute to national productivity and income. COVID-19 offers the opportunity of looking freshly at changing social norms and our economic policies to maintain and reward the participation of women in the labour market. Australia as a nation will be better off and families and children likewise.

JEL Codes: J16, J18, J2

Keywords: Female workforce participation, social norms, public policy, gender equity, COVID-19

^a Acknowledgments. We would like to thank the following individuals, Leonora Risse, Duygu Yengin, Danielle Wood, Owain Emslie and Anthony Kosturjak for their comments. The views expressed in this paper are the views of the author(s), and should not be taken to represent the views of the South Australian Centre for Economic Studies nor the University of Adelaide.

^b Corresponding author: Tel: +61 8 8313 4915; Email: tania.dey@adelaide.edu.au

1. Introduction

In this paper we analyse key issues and potential barriers impacting women's career progression in Australia and ask:

- why it is important to increase women's participation in the paid workforce?;
- how increasing full-time participation of women can contribute to the three Ps of economic growth i.e. population, participation and productivity?;
- consider how education, employment, occupational outcomes and gender inequality issues impact women's earnings both now and in the future;
- is gender inequality only a workplace issue?; and
- can promoting gender equality enrich women financially and men socially?

In the year ending September 2020, net natural increase dropped by 3.8 per cent. The pandemic had its toll on net overseas migration, which dropped by a massive 65 per cent compared to the previous year (see, ABS, National State and Territory Population, 2021) mostly due to reduced international student numbers and other temporary visas. Fertility rates have decreased from 1.97 babies per woman in 2009 to 1.66 babies per woman in 2019 (see, ABS, Births, 2020). Female labour force participation fell last year but is bouncing back. Women were disproportionately affected due to the pandemic with more job losses (see, Melbourne Institute, 2020) and a larger share of unpaid work (see, ABS, Household Impacts of COVID-19 Survey, 2021). The backdrop to any review or understanding of trends in the Australian population is that the general population is ageing, fertility rates continue to be at a low level and overseas migration is a significant component of population growth. In a post-COVID-19 environment migration to Australia has been significantly curtailed impacting both the education and tourism sectors. We commence our discussion with an examination of women's increased participation in the workforce as one of the driving forces behind economic growth. We conclude with a general discussion of policy options to increase women's participation in the workforce.

2. Women and the Three Ps of Economic Growth

Population, participation and productivity are the three key drivers of economic growth. A steady improvement in these areas – and we ask to what extent can increasing the full-time participation of women in the workforce contribute to each of these – will ensure that a nation continues on its path to prosperity.

2.1 Population

Our analysis of ABS population projections indicates that between 2017 and 2066 there will be fewer children to refresh the population and fewer income earners will be responsible for taking care of a higher proportion of aged population. According to ABS Demographic Statistics, in the year ended 30 June 2018, net overseas migration contributed 61 per cent to total population growth whereas natural increase contributed 39 per cent.

The Baby Bonus provided evidence that fertility rates are responsive to policy influences and was successful in increasing the birth rate (see Drago *et al.*, 2011). Australia could solely rely on net overseas migration for population growth but it may be desirable to facilitate some growth through natural increase, in order to mitigate population ageing. Australia needs a policy which encompasses migration rates and fertility rates. That said, if Australia wants to rely on population growth as a driver of economic growth/prosperity then Australia needs policies that enable women to have children without having to trade-off their employment opportunities, i.e. policies that support their dual role of parenthood and work – both for mothers and fathers.

It becomes even more necessary under the current circumstances when not only the Australian economy but Australia's demographic composition is also suffering due to stalling migration inflicted by COVID-19. According to ANU demographer Dr Liz Allen the pandemic could lead to lower birth rates. This can be disastrous for generations to come. If Australia's birth rate (which is already low) drops to 1.5 or below which is considered well below the replacement level then there will be more people who would need to be cared for but less people to work towards a tax base for adequate delivery of services (see, Allen, 2020).

2.2 Participation

We note that ABS population projections shows that a smaller proportion of the working age population will be available to work over the period ending 2066 which has potential implications for economic growth (see, ABS, Population Projections, 2018). It follows that a suite of policy options will need to be explored to maintain and increase the participation rate of those who currently have relatively low participation rates. Participation rates are declining for both men and women. Hence in a post-pandemic world government stimulus is needed in both male-dominated sectors such as construction and mining as well as female-dominated sectors such as education and health and social services sector to create jobs for both men and women alike.

The Australian Government has used various policy levers to bring about increased workforce participation among older cohorts especially in terms of the age pension and superannuation. There are benefits to the individual and the economy from the knowledge and experience accumulated by older Australians over their working life. However, increasing participation from older Australians cannot be coerced by policy alone, there are other soft issues that must be addressed as well, such as age discrimination at workplaces, creating a safer and inclusive workplace for older Australians and taking care of mental and physical wellbeing of older workers.

In the same vein the 2015 Intergenerational Report was clear in support for 'boosting opportunities for women to reap the economic benefits of increased participation by women'. The report points out that even though the overall proportion of the working age population is projected to decline over time, female employment is projected to continue to increase. The report recommends that policies that help

boost female participation will help Australia achieve an even higher level of future prosperity.¹

Government policies will have a role to play. Childcare subsidies are one example, a subsidy to support and encourage women with young children to return or stay in the workforce. Affordability and accessibility of childcare is an ongoing issue for parents with young children who are currently in the work force and who wish to be in the workforce. The ABS Consumer Price Index (CPI) shows that childcare costs (out of pocket expenses only) have been increasing well in advance of overall inflation over an extended period. The CPI calculated from the weighted average of CPIs of capital cities in Australia indicates that prices for childcare grew at an annual average rate of 5.8 per cent over the decade to 2018/19 whereas the overall CPI rose at an average rate of 2.1 per cent over this period (ABS, 2019).

The Productivity Commission (2015) estimated that if childcare-related barriers were removed for the number of parents (working part time or not working) who reported having difficulties with the affordability and accessibility of suitable childcare, then 165,000 FTE workers could have been added to the labour supply in July 2014.

There is general agreement that access to childcare and cost thereof does impact a woman's decision to engage in the work force during the early years of a child or even during the primary school years. It might be expected that the participation gap would disappear once the children are in high school. However, the evidence points to the persistence of the participation gap (see, ABS, Gender Indicators, 2018).

Analysis of the new Childcare Subsidy (CCS) which came into effect on 1 July 2018 shows that secondary income earners, who are mostly mothers face a high effective marginal tax rate for increasing their workdays from part-time to full-time. And this effective marginal tax rate is higher than that faced by high earning full-time workers.² Hence, families as a unit decide that it is not rational for the secondary income earner, who in most cases are mothers to work full-time while the family has to bear the cost of formal childcare (Stewart, 2018).

In the post pandemic world some families are confronted with either job losses or pay cuts. Hence families may choose to opt out of childcare and in most cases women will undertake the caring responsibilities. On the other hand childcare is a service which is essential so that individuals can explore job opportunities. The Grattan Institute shows that the more government spends on childcare subsidies the higher is women's participation in the workforce and the macroeconomic impact in terms of GDP (see, Wood, Griffiths and Emslie, 2020).

2.3 Productivity

Productivity is the third lever of economic growth. The 2015 Intergenerational Report estimates that average annual productivity growth will be 1.5 per cent per year for

1 There is a recent divergence in thinking in terms of measuring growth by a more holistic "well-being" and inclusive growth which also accounts for the distribution of growth/inequalities as opposed to through GDP alone. See <https://www.weforum.org/agenda/2014/05/growing-disconnect-gdp-wellbeing/>

2 Information on the new Childcare Subsidy Scheme can be found here: <https://www.servicessaustralia.gov.au/individuals/services/centrelink/child-care-subsidy>

the next 40 years, which is substantially lower than the higher productivity growth of 2.2 per cent observed in the 1990s (see, The Australian Government, The Treasury, 2015). The report acknowledges recent advancements in technologies and suggests that both quality of life and productivity can be improved if technology is harnessed appropriately and proper reforms are undertaken.

Harnessing technology for economic growth and boosting women's participation in the workforce offers two pathways to sustained economic growth and if appropriately implemented, will provide a boost to living standards (economic objective) and quality of life (social objective). Greater diversity in the workforce has been proven to generate greater creativity and exploration. These factors in turn drive up innovation and productivity, thus adding value not just at the business level but to the whole economy. An estimate by Deloitte shows that increasing gender diversity in Australian businesses could add \$10.8 billion to the Australian economy (see, Deloitte, 2019).

Furthermore, to support Australia's changing age structure, we need sustained investment in human services (health, aged care, childcare, education/training) – industries that are predominantly delivered by the female workforce - hence female workforce participation is critical to support Australia's ongoing productivity.

During the pandemic we have harnessed technology at a rapid rate. We have set up remote work spaces at our homes, cut back on commuting times and established a new work from home culture which was perhaps not so widely practiced before the pandemic. Even though these are early days, work from home has been found to increase productivity (see, Dockery and Bawa, 2020).

3. Women and GDP – A Macroeconomic Perspective

The significance of women's labour force participation and utilisation is not limited to the impact on individual and household incomes and future earnings potential. Access Economics (2006) analysed the 2002 Intergenerational Report and showed that changes in the percentage of women in the workforce has implications for Australia's output and productivity. Both will significantly affect Australia's capacity to meet the challenges of an ageing population. The report further noted that more women than men are year 12 graduates and obtain tertiary education. If a country fails to utilise its valuable human capital it is essentially losing out on potential productivity gains.

According to Daly (2007), reducing gender inequality in the labour market could play a key role in addressing the twin problems of population ageing and pension sustainability. Birth rates and female employment both tend to be higher in countries where it is relatively easy for women to work and have children. This presents a challenge for economies such as Japan and Italy, which are characterised by an ageing population and low female employment levels.

The Grattan Institute estimated that in 2012 if Australia could boost female workforce participation to the level of Canada (which at that time had six per cent higher female labour force participation) then Australia's GDP would be \$25 billion higher. In a recent report, advocating for cheaper childcare, the Grattan Institute estimated that under various proposed childcare subsidy schemes costing between \$5

billion to \$12 billion, women's participation would increase by 13 per cent (hours) to 27 per cent (hours) with an increase in GDP ranging from \$11 billion to \$27 billion. The more government spends towards boosting women's participation in the workforce, the higher is the economic impact of such policies (see, Wood, Griffiths and Emslie, 2020).

KPMG (2018) modelling suggests that if the gap between Australia's male and female workforce participation rates could be halved then Australia's annual GDP would be \$60 billion greater in 20 years' time (from December 2018 to December 2038).

Estimates by McKinsey Global Institute (2015) show that in a full-potential scenario in which women play an identical role in labour markets to men, as much as \$28 trillion, or 26 per cent, could be added to global annual GDP in 2025. If all countries were to match the progress toward gender parity of the best performer in their region, it could produce a boost to annual global GDP of as much as \$12 trillion in 2025. This \$12 trillion of incremental GDP represents a doubling of the output likely to be contributed by female workers globally between 2014 and 2025 in a business-as-usual scenario. If female participation in Australia matched the best in the region there would be a 12 per cent increase in GDP by 2025 or \$225 billion (see, MGI, 2015).

While the results from economic modelling and the time period over which the benefits would occur, all point in the same direction. So it is of practical significance to explore options for increasing the participation of females in the workforce if Australia hopes to continue on the path of uninterrupted economic growth and enjoy high living standards.

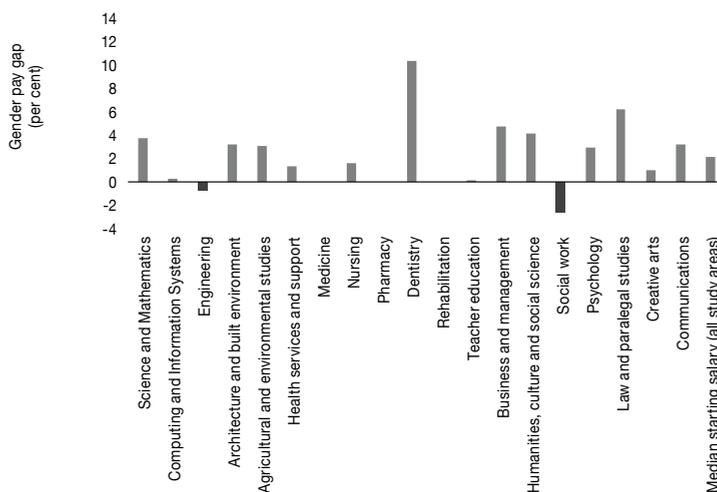
The shift from unpaid to paid work isn't costless, someone has to do the unpaid work. There are several factors affecting female participation in the labour force such as the pay gap, access to childcare, the tax and benefit system, discrimination and bias. A detailed discussion of these factors are provided in the following sections.

4. Gender Pay Gap

The gender pay gap in Australia can not only be attributed to shortcomings in Australia's Industrial Relations system but also to career choices made by men and women at the beginning of their career. ABS Gender Indicators indicates that the median undergraduate salary for women in their first full-time occupation is \$63,400 whereas for men it is \$65,000, which is a gender pay gap of 2.5 per cent.³ This gap while relatively small cannot be explained by structural differences in choice of industry – the gender pay gap exists for women in most streams of employment related to study with the exception of engineering where women earn 0.9 per cent more and social work where women earn 2.9 per cent more than men at the start of their career—Figure 1. The largest pay gap for women exists in dentistry where men earn 12 per cent more compared to women. Rehabilitation and pharmacy are the only two areas where there is no gender pay gap.

³ We calculate the pay gap using the typical approach used in the literature, which is the difference between male and female earnings expressed as a proportion of male earnings.

Figure 1. Gender pay gap for women (undergraduates) in their first full-time employment by study area, all ages, 2020



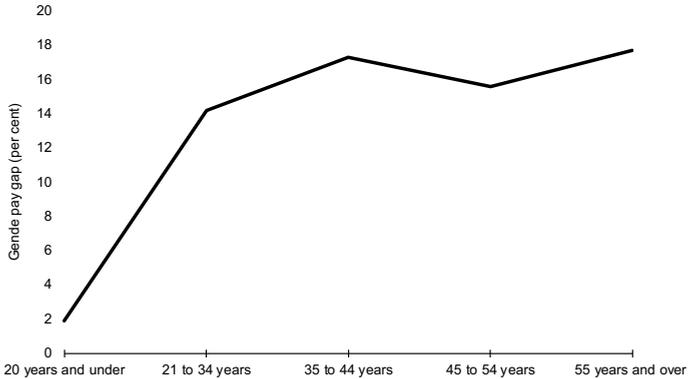
Source: ABS (2020), Gender Indicators Australia, Cat. No. 4125.0.

The ABS Average Weekly Earnings reveals that, full-time adult ordinary time earnings for men is \$1,804 per week whereas for women it is \$1,562.⁴ Nonetheless, ABS data shows that the gender pay gap has been narrowing over time.⁵ Figure 2 shows that the gender pay gap is least pronounced in the younger age groups aged 20 years and under and 21 to 34 years, beyond which it becomes more pronounced.

4 Some caution needs to be exercised when comparing gender differences in incomes when using average weekly earnings since differences may reflect compositional variations, including differences in occupations, industries and experience levels.

5 Gender pay gap can be calculated in different ways, from full-time adult average weekly ordinary time earnings, adult hourly ordinary time cash earnings.

Figure 2. Average weekly full-time earnings and gender pay gap by age, May 2018



Source: ABS (2021), Employee Earnings and Hours, Australia, Cat. No. 6306.0.

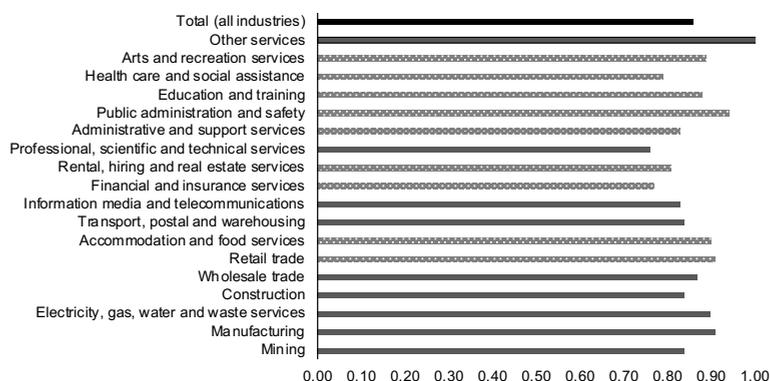
A widening in the pay gap with increases in age can be largely attributed to penalties women experience as a consequence of bearing children in terms of subsequent impacts on labour force participation, occupation, hours of work and promotion (for example see, Kleven *et al.*, 2018). A subsequent study of male's and female's earnings in six countries (Austria, Germany, Sweden, Denmark, the US and the UK) shows that men and women's earnings follow a similar pattern before parenthood (see, Kleven *et al.*, 2019). However, after the birth of the first child women experience a massive drop in their earnings while male earnings remain unaffected. Differences remained and 'plateaued' even ten years after child birth. Analysis shows that Scandinavian countries have the smallest long-run child penalties followed by English-speaking countries. German-speaking countries recorded the highest penalties. Child penalties or penalty for parenthood can originate from lower female employment hence reduction in labour supply, number of hours worked and wage rate. Kleven *et al.* (2019) found that parental leave and childcare policies could not explain the magnitude of these penalties. On the contrary, they found that gender norms have an important role to play in determining child penalties.

In terms of the disruptive effect of motherhood on workforce participation, research is growing that shows that it's not just about women taking a break from the workforce, it's also about the way in which this 'career break' is disfavouredly viewed by workplaces/employers in unconscious ways (see, Verniers and Vala, 2018). For example, when women take longer maternity leave, they are viewed by the colleagues as being 'less agentic/career-oriented', which then makes them less likely to be considered for future promotions (see, Fuegen *et al.* 2004). However if men take parental leave, they are not subject to this change in perception (see, Burgess, 2013).

Figure 3 shows that a gender pay gap exists across all industries irrespective of whether they are male or female-dominated. For example, in terms of industries with

high levels of female employment, the female to male ratios of mean full-time adult ordinary time average weekly earnings are 0.79 for healthcare and social assistance and 0.88 for education and training.

Figure 3. Female to male rate ratio of mean full time adult ordinary time average weekly earnings, by Industry, May 2020



Note: Patterned bar indicates industries where a higher proportion of women work.

Source: ABS (2020), Gender Indicators Australia, Cat. No. 4125.0.

In terms of occupations where a higher proportion of women are employed compared to men, the ratio for hourly ordinary time cash earnings is 0.87 for clerical and administrative support workers, 0.85 for community and personal service workers, 0.86 for sales workers and 0.87 for professionals. The ratios for these occupations falls further for weekly total cash earnings where the difference in total hours worked between males and females has a direct impact on total earnings (see Table 1).

Table 1. Female to male ratio of adult ordinary time cash earnings and weekly total cash earnings by occupation, 2018

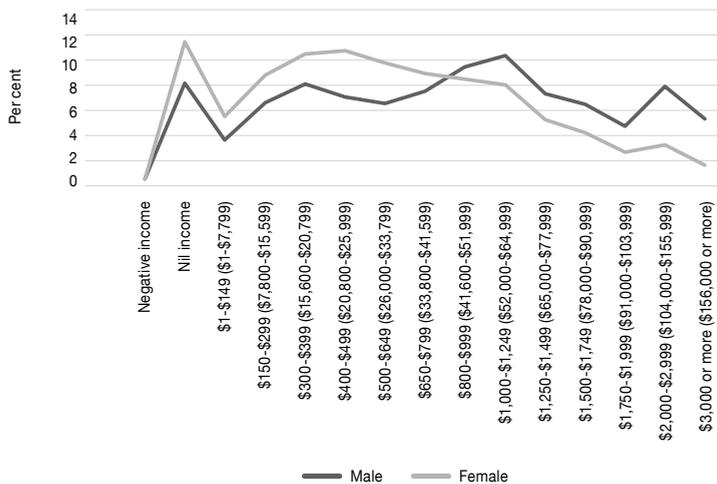
Occupation	Hourly ordinary time cash earnings	Weekly total cash earnings
Managers	0.87	0.85
Professionals	0.87	0.74
Technicians and trades workers	0.78	0.56
Community and personal service workers	0.85	0.74
Clerical and administrative workers	0.87	0.75
Sales workers	0.86	0.74
Machinery operators and drivers	0.89	0.72
Labourers	0.84	0.63

Source: ABS (2020), Gender Indicators Australia, Cat. No. 4125.0.

A recent report by Financy Women's Index found that the pandemic has widened the full-time employment gap between men and women in Australia (see, Financy Women's Index, 2020).

Figure 4 shows the distribution of men and women across various personal weekly income ranges from the 2016 Census. While a higher proportion of men earn personal weekly income in the higher income ranges, a higher proportion of women earn personal weekly income in the lower income ranges.

Figure 4. Proportion of men and women earning total weekly personal income at various levels, 2016 Census



Notes: 1) Calculations exclude "not stated" and "not applicable". Not applicable refers to persons under 15 years old.
Source: ABS (2016), Census of Population and Housing, Employment, Income and Education, Tablebuilder.

Our analysis of ABS Census data shows that:

- fewer men than women earn between the income ranges \$1-\$149 and \$650-\$799. (40 vs 54 per cent);
- more men than women earn between the income ranges \$800-\$999 and \$3000 or more (greater than minimum wage and equal to average wage (52 vs 34 per cent);
- This type of proportional income distribution is important to take into account for policy considerations.

A recent report found that gender discrimination, years off-work due to interruptions, industrial and occupational segregation are the major factors responsible for a pay gap (see, KPMG, 2019). An article by Risse (2019a) identifies the following factors as resulting in lower pay for women in Australia:

- higher engagement in part-time work;
- working in industries which pay less;
- working in lower risk occupations;
- working in more junior roles;
- lack ambition and confidence; and
- poor negotiation skills.

Lower pay results in less financial empowerment, less money in their name for home loans and less superannuation to cover their retirement years. One of the first steps in finding a solution for reducing/ eliminating the gender pay gap is to recognise that the gender pay gap exists in the first place. Other solutions that can be adopted by organisations are increased transparency about current rates of pay, salary bands and being clear about items that can be negotiated. Also reviewing and adopting strategies to remove ‘unconscious bias’ in hiring and rewarding employees can ensure that employees are hired and remunerated on the basis of merit and value. In addition, Australia’s Fair Work Legislation needs to consider how to meaningfully measure and compare the value of jobs done by men and women that are so different in nature (see, Risse, 2019b).

5. Barriers to Women’s Participation in the Workforce

Descriptive analysis

Unpaid work is not accounted for in GDP calculations and would consequently provide a sizeable boost to the economy if it were. A majority of this unpaid work is done by women (see Melbourne Institute, 2018). It is important to take these facts into account when formulating policies to incentivise women’s participation in paid employment.

A recent analysis by PwC (2017) estimated the value of unpaid work in Australia was \$566 billion (in 2016 terms) and if this was accounted for in the national accounts then Australia’s economy would be as big as \$2.2 trillion.

A time of use study by the ABS (2006) shows that women do twice the unpaid work than men per day and men do twice the employment related work compared to women each day. The Melbourne Institute’s (2018) report based on HILDA data also confirms that women spend more time in housework and caring for others and less time in paid employment compared to men. This gendered division of labour is more pronounced in families with children.

HILDA tracks couples for a period of time and hence is able to track whether the birth of the first child triggers more traditional divisions of labour (see, Melbourne Institute p, 2018). HILDA data suggest that couples might be negotiating the division of paid and unpaid work among themselves. In that case more equitable arrangements regarding care and housework should be observed among couples where both partners do equivalent shares of paid work.

A recent ABS survey found that in December 2020, women were twice as likely to have spent 20 or more hours in supervision of children compared to men (27 per cent vs 13 per cent) while women were also twice as likely to have spent five or more hours in unpaid indoor work (54 per cent vs 28 per cent) (see, ABS, Household Impacts of COVID-19 Survey, February 2021).

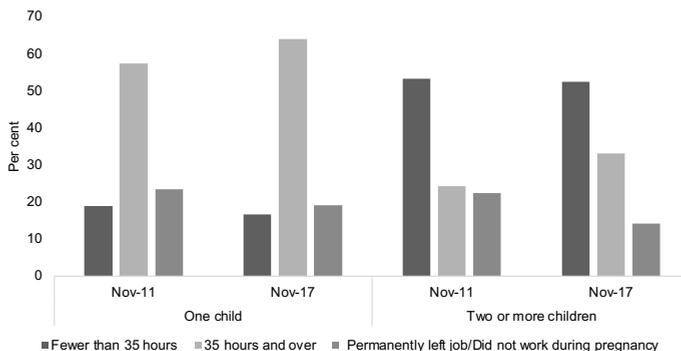
As female's participation in the labour market has increased over time, the distribution of unpaid work between men and women has become an increasingly important issue. This is potentially a social issue which involves taking non-market decisions between partners such as a decision to hire a cleaner and make more time available for paid employment. The unbalanced share of unpaid work done by women limits their availability in the labour market and can also act as a deterrent, forcing them to reduce their hours of paid work further or quit the labour market altogether. There are economic and social implications inherent in this for women and for government in the short run (e.g. lower tax revenue) and the long-run (e.g. demand on pensions and allowances).

5.2 Pregnancy

Our analysis so far shows that the birth of a child is a major turning point in a woman's professional life (in terms of employment options), earnings and personal life. Hence it is worth analysing more closely how pregnancy affects a women's life.

The social trend in Australia is that women increasingly shift to part-time work as they have children reinforcing the fact that childbirth is indeed a turning point in a woman's career. This trend is illustrated by Figure 5 which shows that women who already had at least one child were more likely to be working part-time hours.

Figure 5. Usual weekly hours worked in occupation while pregnant immediately before stopping for birth of child, by number of children, November 2017



Source: ABS (2018), Pregnancy and employment transitions, Australia, November 2017. Cat. No. 4913.0.

According to ABS and HILDA data, female workforce participation in Australia declines dramatically once a woman has a child and it never fully recovers (see, ABS, *Pregnancy and Employment Transitions*, 2018 and Melbourne Institute, 2018). ABS data shows that a significant numbers of highly qualified women are falling out of the workforce either partially or fully once they have children. If spending time with children is a normal good such that people do more of it as their incomes rise, it will be hard to change this preference with policies.

5.3 Childcare

Childcare is another reason that prevents women from increasing participation in the labour market. Analysis by PwC (2017) shows that childcare comprises the highest valued component of unpaid work in the economy. PwC (2017) found that mothers across all levels of socio-economic status are likely to take time away from paid employment to perform unpaid childcare. Interestingly, the analysis shows that even though more advantaged areas may substitute unpaid work for paid domestic help, the remainder of the unpaid work is still distributed in the same proportion between men and women. Interestingly, people in locations with higher education levels are more likely to spend more time on unpaid childcare. This is due to household earning capacity and ability of a mother to take time away from paid work and for the household to live off one income. This partly explains why despite being more educated than men women's participation rate is lower than men.

ABS has collected data on whether childcare affected parents' labour force participation, focussing on parents with children aged 0 to 12 years and who do not work full time but would prefer to do more work. Overall 40 per cent of women in this cohort were prevented from working more hours due to childcare responsibilities.

Table 2 highlights the proportion of women who were affected by childcare by various characteristics. The key impacts were:

- a significant proportion of women were affected by childcare irrespective of their household income or the type of childcare used;
- women working as an employee and women who have an unincorporated business were significantly affected; and
- irrespective of family composition, women reported being affected due to childcare.

Table 2. Impact of childcare on women with children aged 0-12 years old

<i>Characteristics</i>	<i>Impact of childcare</i>
Equivalised disposable household income quintiles	34 per cent of women belonging to lowest income quintile were affected 41-43 per cent of women belonging to second, third, fourth and fifth income quintiles were affected
Type of childcare	46 per cent women of using formal childcare were affected 45 per cent of women using informal care were affected 52 per cent of women using both types of care were affected
Main source of household income	42 per cent of women whose main source of income is employment 41 per cent of women whose main source of income is unincorporated business reported as affected by childcare
Contribution of government pensions and allowances to gross household income	46 per cent of women in households who receive 1 per cent to less than 20 per cent in government contributions reported being affected 34 per cent of women who receive more than 90 per cent in government contributions reported being affected
Family composition of households	In one family households 57 per cent of women belonging to families where both parents were working reported being affected In a one parent families 55 per cent women reported being affected due to childcare.

Note: (a) Estimates with relatively high standard errors have not been reported here; (b) See Table A24-A28 for detailed data.
Source: ABS (2015-16), Household income and wealth, September 2017, Cat. No. 6523.0.

5.4 Income tax and childcare subsidy

The tax system in Australia creates negative incentives for women to increase their workforce participation. Census data shows that more than 50 per cent of women in Australia earn income which can be classified as low income for tax purposes in Australia.

The new CCS implemented from 1 July 2018, has an underlying problem. For income tax purposes the individual is the taxing unit. However, the childcare subsidy is assessed based on household income. Hence, when a women decides to increase the number of work days the individual cost benefit analysis done by the family is based on the women's income not on household income. Our calculations show that if a female works three days a week she pays a total tax of \$138 per week and her daily take home pay after tax is \$245 – Table 3. If she increases her work week to five days then her tax liability more than doubles and her daily after tax take home pay per hour decreases in comparison to if she was working three days (\$31 vs \$28 per hour). In short, the tax system does not provide incentives to women to increase their participation in the workforce, women still end up working part-time.

Table 3 also shows how tax as well as childcare costs in combination can impact a female's decision to increase work days. We assume a household where the male member of the household earns *male full-time adult average weekly ordinary time earnings* and the *female member of the household earns female full-time adult average weekly ordinary time earnings*. We have also assumed a childcare cost of \$120 per day. We have then calculated the childcare subsidy based on household income. It should be noted that we haven't included the effects of withdrawal of benefits such as family tax benefit, rent assistance, parenting payment in our analysis. Including these will have a stronger effect on the take home pay of women.

In a typical household where both parents are working and given women are more engaged in caring for children, the need for childcare arises when the mother goes to work. Hence even though the childcare subsidy is calculated based on household income, the out of pocket child care cost would always be related to a mother's salary even though it is a joint household expenditure.

Table 3. Tax, childcare subsidy and female wages

<i>Working days per week</i>	<i>Wages (female)</i>	<i>Tax/ per week (female) (b)</i>	<i>Wages after tax/per week</i>	<i>Wages after tax/per day</i>	<i>Out of pocket childcare cost/ per week/child (after subsidy)</i>	<i>Wages after tax and childcare cost/ per week</i>	<i>Marginal wage after tax and childcare cost working an extra day per week</i>	<i>Pay per hour after tax for women irrespective of parental status (\$)</i>	<i>Wages after tax and childcare cost per hour, one child (\$)</i>	<i>Wages after tax and childcare cost per hour, two children (\$)</i>
Three days per week	873	138	735	245	133	602		31	25	20
Four days per week	1,165	240	925	231	202	723	121	29	23	16
Five days per week (a)	1,456	341	1,115	223	282	833	110	28	21	14

Note: (a) Wages for Five day work week is female full-time adult average weekly ordinary time earnings; (b) Tax per week is calculated from ATO's tax withheld calculator; (c) childcare subsidy calculated from Centrelink estimates assuming the male member of household earns a full-time adult ordinary time earnings and calculating the household income accordingly. Calculations done assuming an eight hour work day.

Source: (a) ABS (2018), Average Weekly earnings, Australia, February 2019, Cat. No. 6302; (b) based on an average daily wage of \$291(c) ATO; (d) Centrelink.

Table 3 shows that if a female increases her work day from three to four days or five days then her marginal wage from the fourth day is \$121 and from fifth day is \$110. Although her take home pay may be larger in aggregate if she works more days, the marginal decline in her daily take home pay is a strong disincentive to working more days. The situation worsens if a family has two children who go to childcare.

6. Future of Employment for Women

The future of work is changing with advancements in technology and automation. According to the Australian Jobs Report 2019 industries such as Healthcare and Social Assistance, Education and Training and Professional, Scientific and Technical Services are projected to grow fastest in the five years to 2023. And occupations such as community and personal service workers and professionals are projected to have highest growth rates.

In a recent report Deloitte (2019) analysed the shift in the nature of occupations from 'hand' to 'head' to non-routine occupations which require use of both 'head' and 'heart'. However, many of the occupations expected to be created, such as teachers and nursing aides, typically have lower wage structures although it could be argued they create high social value. These occupations require higher levels of interpersonal skills, empathy and extensive human interactions and are less susceptible to automation.

Employment conditions, pay scales and social value in these occupations will require reviews and rewards in future years. This could entail a role for Fair Work Commission and equivalent state jurisdictions to reconsider how these awards are determined and the case for gender pay equity principles can be addressed in conjunction with wage inequality issues (see Gillian Whitehouse 2001). COVID-19 has further shown that frontline jobs held by women are essential even in times of crisis.

7. What Can be Done by Government, Organisations and at Societal Level

Our analysis emphasises the need for re-balancing family life, with more equitable distribution of caring for children, amount of domestic chores etc. with paid employment. These are matters of public policy, social change and equity.

7.1 Changes that can be made in female and male education and career choices

While women are equally, if not more educated than men, women still face gender discrimination at the very start of their career. Both unconscious bias against women as well as their lack of confidence in their abilities compared to men plays a role here. Studies using HILDA data shows that women over-invest in workplace capabilities. While men over-invest by 4 per cent, women over-invest by 11 per cent (see, The Conversation, 2018). In addition gender-linked stereotypes, roles and norms also prevent women from negotiating freely in the workplace leading to inequalities in pay and promotions (see, Wade, 2001). Women are also susceptible to encountering penalties and backlash for demonstrating too much ambition and assertiveness in the workplace (see, Bowles, 2007; and Bowles, 2019).

Merely promoting tertiary education for women is not enough; better mentoring programs for women who are young graduates and an end to 'pay discrimination' based on gender is required. For example, the Women in Economics Network which is part of the broader Economic Society of Australia has launched state-based mentoring programs for female undergraduate students studying economics to provide them with

a better perspective as they enter the profession of economics. Similar programs are required in other fields of study.

Women choose fields of study which ultimately orientates them to work in industries which mostly employ women and in low paid occupations. More women should be encouraged to take up fields of study which culminate in higher paid occupations such as STEM, as seen in Figure 1 where starting wages appear to be higher for females in engineering. However, given the demanding nature of occupations (e.g. STEM), more flexible work arrangements in careers for men and women with young children will help women retain and pursue their STEM careers even during the child bearing and rearing stages of their lives and will provide men in STEM with the option to spend more time with their children. While government is providing incentives to encourage more women to study and take up careers in STEM a recent study shows that an under-representation of women in STEM acts in the favour of women given the higher demand for skills in non-STEM careers such as health, education and society and culture over time and in the future (see, Dockery, Phillimore and Bawa, 2020) as seen in starting wages for social work in Figure 1.

Having said that, it is also important that industries such as healthcare and social assistance and education and training, which employ mostly women overcome their notion of gender stereotypes and provide equal employment opportunities for both men and women. These industries will be the growth industries of the future as structural changes in Australia continue to transition from more male-dominated industries such as manufacturing to service oriented industries where the majority of women work (see, DJSB, 2019). Breaking the gender stereotype in occupational roles will not only increase employment opportunities for men but also ensure the future labour supply in 'caring roles' (see, WGEA, 2016). There is also scope for public policy intervention here to promote educational choices and career choices in such future growth industries for men.

Women in leadership roles are also important. A female in senior management can have an important influence on career development through careful mentoring, illustrating leadership and management and productive workplace relationships. When a female in a junior position sees that all the leadership roles are occupied by men then she is less encouraged as compared to if there are more women in senior positions (see, Gould *et al.*, 2018).

The underlying mechanism here is that men tend to progress up the career ladder at a faster pace than women. Workplaces need to carefully scrutinise how they decide on promotional decision so they are not swayed by subjective/unconscious/institutional biases that favour men and redesign their organisational practices to be more objective and ensure the most competent candidate is appointed to the position (see Bohnet, 2016).

Also workplace policies that unintentionally/inadvertently disadvantage workers with parental duties e.g. scheduling meeting times that collide with school/childcare pick up times should be carefully considered. In addition, allowing remote access to participate in meetings while not in the office; providing flexibility/on-site care for children during school holidays can also help bridge the gap in participation.

7.2 Government policies to be considered

The future of work is changing with advancements in technology and automation. The McKinsey Global Institute (2019) states that occupations requiring physical activities and repetitive occupations will decline and occupations that are difficult to automate will grow in the future. It is predicted that there will be higher demand for social, emotional and cognitive skills, such as communication, empathy, critical thinking, creativity, and complex information processing. Women are known to possess many of these attributes which may provide women with an edge over men in the future. Occupations such as carers, education workers etc. will have higher demand in the future. Many of these occupations are categorised as low paid. Women are also in industries such as retail and tourism which have uncertain futures. Moreover, it would be unwise to ignore the positive externality to society that occupations such as teachers and carers generate. Higher wages negotiated through conventional industrial relations channels will be much more desirable as compared to pre-election boosts to wages in low paid female-dominated sectors such as child care (see, Wood and Chivers, 2019). Unions will have to play a stronger role in wage setting. Another option is to lower the tax rate for low paid occupations which have high ongoing demand – Risse (2019b).

The current policies on parental leave payments in Australia are also designed with women as the primary caregiver in mind. For example, if a woman earns more than a certain income threshold (\$150,000 per annum) while her partner earns less, the couple is not eligible to receive parental leave payment. On the contrary if the earnings are reversed in terms of gender then the woman can receive parental leave payments.

Caring is not a single gender prerogative. 'Care givers' are male and female. The focus of policy makers should be to design policies that respond to and influence culture and attitudes and are able to catch up with today's world. The current policy in regard to 'care givers' is reinforcing social attitudes when inclusive parental leave policies are required that reinforce gender equality. Equal treatment in policy and hence opportunities would reinforce equality in the labour market and promote non-discrimination. This requires balance in the design of leave between genders for a start.

Important lessons can be learned from other OECD countries, which provide different options of parental leave for mothers, fathers and a separate provision where a couple can share parental leave between themselves (see, Crabb, 2019). Parental leave policies are a crucial determinant of future labour supply.

Income tax and childcare subsidy arrangements currently prevent women from increasing their number of work days per week. Under the current tax and subsidy scheme it is not optimal for a female on an average wage to work more than three days a week. A female working four days or five days a week takes home daily wages which are well below minimum wages after paying tax and childcare costs.

KPMG (2018) has analysed four disincentives for women to increase their participation in the workforce. These are their marginal tax rate, loss of family tax benefit, loss of childcare subsidy and extra out of pocket childcare expenses. Making well researched changes to the tax system and childcare subsidies to ensure women do not face financial disincentives can help boost female participation in the workforce.

Our analysis of ABS data shows that part-time work for women in Australia is entrenched across all sectors of the labour market. Policies such as childcare subsidies should be based on gender equity analysis (as is done by the European Commission and countries like, Austria, Denmark, Belgium, Finland and Sweden) rather than taking household income as a yardstick for measuring subsidies.

In addition, in a country which is characterised by an ageing population, policy prescription might be required so that fertility rates do not fall further. Women are increasingly delaying having children or opting out altogether. This might be a rational choice guided by the preferences of women. However, if women prefer not having children due to the detrimental effect on their career and a higher share of unpaid work i.e. if women perceive their marginal private cost of having babies a lot higher than marginal private benefit and in economic terms, demand less babies despite the positive externalities to society from more babies being born, then that reflects a market failure which then requires policy intervention. Policies which are built around the right incentives and which take into account socio-economic circumstances should be able to incentivise women to work full-time or increase their participation in the workforce. Paid parental leave as well as current childcare subsidies are practical and functional tools but they need amendment and more government investment such that men can spend more time with their family and women can increase their participation in the workforce to strike a balance between work and life. In addition further scope exists to modify or introduce superannuation payments for low paid marginalised female workforce who work intermittently in casual employment.

7.3 Changes in work-place for women and men, social changes and non-market arrangements

It is true that the Australian governments have sought to address maternity leave and workforce retention. Paid maternity leave has become more widely available, from both employers and the government. So when women have children they are increasingly choosing to take maternity leave instead of quitting the workforce. Paid parental leave reduces training and recruitment costs for women for businesses due to higher workforce retention (see, PC, 2009). As mothers who take maternity leave are more likely to return to work, female workforce participation has increased.

However, women face new challenges when they return to work from maternity leave. They face workplace discrimination, undertake more domestic work, face the high cost of childcare, and report lower satisfaction levels from life. The good news is that society is slowly adapting to parental roles and responsibilities, Australia is transforming (Broomhill and Sharp, 2004). Men with alternative views to traditional arrangements should be encouraged so that the social stereotype of men as the breadwinner and women as the carer and homemaker continue to evolve.

The changing social norms in Australia where fathers want to be more involved in caring should also be taken into account. Between 1996 and 2017, a father's use of flexible work arrangements and working from home to care for children has doubled (see, ABS, 2017). Yet men experience difficulties when trying to access flexible working arrangements. This in turn is a significant barrier for men who want to participate more in childcare and unpaid domestic labour (see, O'Leary and Russell,

2012). Research shows that men are more unwilling to use family-friendly work arrangements due to factors such as the perceived or actual impact on their occupation, personal identities and career progression (see, Bain and Company, 2015). More gender neutral policies which acknowledge the disproportionate share of household work done by women and incentives for men to utilise workplace flexibility can bring about better work life balance.

Non-market arrangements between couples regarding household and caring responsibilities cannot be enforced by government. If women choose to participate more in the work force then unpaid occupations such as cleaning, cooking, picking up children and other daily responsibilities can be outsourced. If men are also willing to work flexibly then couples can negotiate and come to an agreement on their unpaid workload. There is opportunity for development of a more structured market for these unpaid occupations which are usually categorised as low-skilled. Government can play an important role in regulating the rights of workers who work in these low-skilled occupations.

Workplaces have to be cautious and proactive about workplace discrimination. One approach that workplaces can adopt is to focus on achieving targets, timely completion of deadlines and looking at how productive their employees are rather than how much time they spend at work. Offering flexibility with regards to start and finish time at work may be useful in certain occupations but families with young children need more than that. Working collaboratively at workplaces is important but it is equally important to have the option of working from home. This balance can help young families to meet deadlines at work without being physically present at work and at the same time engage more in family activities. For example, some companies are paying full-time salary for a nine-day fortnight in recognition of the changing work patterns and requirements for flexibility.⁶

Gender equality at the workplace is very much linked to gender equality in society. Soft campaigns targeted towards more equitable share of unpaid work done by men and women can be effective in changing the mindset in Australian society. Soft campaigns should also be targeted towards changing workplace perspectives on flexibility not just for working mothers but 'working fathers' (a term not used as often). The ultimate objective is to balance childcare and family life while 'capturing and supporting' women's incentives and return to the workforce. No society can afford to disregard the knowledge, experience and productivity of such a large segment of the workforce. Culture in workplace, parental and roles within families are socially defined – they are malleable and can be changed for the better.

While economic prosperity is important for a family as well as a country, the importance of well-being is increasingly being recognised globally (New Zealand's Well-Being Budget). Policies need to recognise that 'quality of life, relationships and hence caring' are the key to a happy life, not just consumerism or spending (see, Brisbane Times, 2020).

⁶ A similar pay policy is adopted by a company called Grace Papers in an article in The Sydney Morning Herald. See <https://www.smh.com.au/lifestyle/life-and-relationships/the-four-day-fallacy-busting-the-myth-of-part-time-working-mums-20190906-p52ou1.html>

8. COVID-19 and the 'Pink-Collar Recession'

Between 14th March and 2nd May 2020 accommodation and food services (down 27 per cent), arts and recreation services (down 19 per cent), rental, hiring and real estate (down 13 per cent), professional and technical services (down 11 per cent) and other services (down 10 per cent) experienced most job losses (see ABS, Weekly Payroll jobs and Wages in Australia, 19 May 2020). These are all service based industries and four out of five employed Australians work in services.

During the previous recession the government took measures to boost fiscal spending in infrastructure projects to boost construction jobs, provided tax incentives to businesses to expand and hire. It is not just in previous recessions that the government has adopted policies to stimulate demand, it is really commendable how government has provided support to businesses and households during the COVID-19 pandemic through Job Keeper and early release scheme for Superannuation etc.

The IMF discusses the important role public investment spending can play in the fiscal response to the COVID-19 pandemic. It emphasises that in both during the immediate crisis and the recovery phase, there is a need for strong prioritisation and project selection processes, accompanied by clear policy objectives, dedicated coordination mechanisms, and high transparency.

In Australia, the government would do well to look closely at the composition of the unemployed before taking further action. According to the HILDA Survey data analysed by the Melbourne Institute approximately 3.5 million people (28 per cent) employed in the industries most impacted by the economic shutdown in response to COVID-19 tend to be low-wage workers, many of whom were doing short term casual jobs and are disproportionately female and/or young.

According to the OECD (2020b) policy action should be based on:

- protecting people and places left behind;
- supporting small businesses and vulnerable workers; and
- responsive and coordinated governance.

The COVID-19 pandemic is placing women at the frontline with women making up 70 per cent of the health care workforce, exposing them to a greater risk of infection. Women are also doing much of the unpaid work at home including increased caring responsibilities given school closures, taking care of elderly relatives (see, Cooper and Mosseri, 2020). As documented above women also face high risks of job and income loss and face increased risks of violence, abuse or harassment during times of crisis and quarantine (see, Boxall *et al.*, 2020). According to OECD (2020a), all policy responses to the crisis must embed a gender lens and account for women's unique needs, responsibilities and perspectives.

Job losses as well as safety concerns have led many parents to keep their children out of childcare to the effect that the sector was becoming less viable with a sudden and substantial reduction in numbers. The Government bailout announced

in April ensured that an essential service like childcare survived.⁷ This arrangement was to be in place for six months. However the government ended this scheme by 13th July 2020 ahead of the six month period initially announced. A recent survey of 2,200 parents reveals that more than half (60 per cent) of Australian households currently using childcare will have a parent forced to reduce work when full childcare fees return (Hislop, 2020). Many child care centres almost closed – due to the government making childcare free, but not providing adequate funding to child care centres to cover for the loss of fees, (remembering they still had to pay the salaries of staff).

Given the current labour market scenario and many second earners being affected it is unlikely that parents will be able to afford childcare fees. Under the circumstances it is unlikely childcare will see the same demand for its services which will make operating childcare economically unviable for many centres.⁸ But childcare must remain open to ensure that essential workers can go to work and also those who have lost their jobs can be successfully redeployed.

Government implemented several measures throughout 2020 through to 2021 to keep the sector viable which includes: a Relief Package (6 April to 12 July), a Transition Payment (13 July to 27 September 2020), and a Recovery Package (28 September to 31 January 2021). Despite these measures, employment in childcare services dropped by 25,200 jobs and preschool education shed 3,400 jobs (Australian Industry and Skills Committee, 2020).

Another important aspect that requires attention from government is boosting women's superannuation guarantee. Women already had lower super balances upon retirement compared to men. But the latest government policy of Early Super Release has accentuated this gender imbalance further as more women are withdrawing from their super. Unless this issue is properly addressed this will lead to more poverty among women in future.

The pandemic saw mass uptake and adoption of technology as workers shifted offices from CBD to our homes and found new ways of working effectively and efficiently. Latest data from the ABS Household Impacts of COVID-19 survey shows 46 per cent of the workforce worked from home in late April and early May. By comparison, the ABS's 2019 data showed slightly less than a third saying they 'regularly worked from home' – a number likely inflated by those catching up on work from the office.

Perhaps it is time to rethink our National Employment Standards to roll out wider flexibility and provision to work from home than was accorded in the pre-pandemic era. Reduction in commuting times and meetings has freed up more time for work as well as better work life balance. A recent survey by Metova⁹ shows that

7 Under the new system parents won't have to pay any out of pocket childcare fees. The government would provide centres with 50 per cent of their pre-COVID19 fees and the job-keeper package would help cover the wages of educators and staff.

8 Parent advocacy groups think that many centres cannot operate with just 50 per cent of pre-COVID19 revenue so increasing this to 75 per cent would be a significant step. Childcare centres could not operate viably if a third of families pull their children from care, meaning mass closures will result.

9 See infographic here: <https://metova.com/infographic-work-from-home-covid-19/>

48 per cent of those surveyed agree that they are more productive working from home while 57 per cent would prefer to work from home in the future. Some 76 per cent used video conferencing as their daily work. As the restrictions are lifted it is necessary to rethink the existing norms of work and how to reset existing policies to increase national productivity.

9. Conclusion

The starting principle with respect to gender should be in our view the principle of equality. Promoting equality between men and women ought to be the bedrock of public policy. From that basis it follows that the promotion of gender equality in the workplace is a subset of, but linked to, gender equality in society; we can go one step further to suggest that gender equality in the workplace is a key policy objective to promote gender equality overall.

In our efforts to achieve a ‘work-life balance’, promoting equality while eliminating inequality necessarily involves support for change for both men and women. Our discussion shows that from the perspective of equality objective indicators with respect to the workplace include:

- workforce participation rates for men and women;
- part-time work, un- and under-employment rates;
- gender pay gaps and barriers to career progression;
- occupational segregation; and
- assumptions and practices around caring roles for children and ageing elders.

Participation rates for women with dependent children have increased over time, while participation rates for men with dependent children haven’t changed much. Cultural and social attitudes likely play a role but policy has a role to play in workplace and gender equality.

Lower workforce participation rates for women with dependent children can largely be explained by:

- unbalanced design of work-life policies based on gender;
- the interplay between earnings, income tax and the childcare subsidy;
- availability and affordability of suitable childcare;
- career disruption and change in work patterns following pregnancy; and
- a higher share of unpaid household work and caring roles.

In our brief review of the gender pay gap in Australia we find that it is more pronounced for women in mature age groups, which can be partly attributed to the “motherhood penalty”. Contributing factors include the predominance of part-time work, gender discrimination, career disruption, industrial and occupational segregation, imbalance in the share of unpaid work and other behavioural factors.

It would be unwise to disregard the knowledge, experience and productivity of women who form such a large segment of the workforce. There are economic and social implications inherent in this for women (e.g. lower pay, less financial empowerment, lower superannuation balance) and for government in the short run (e.g. lower tax revenue) and the long-run (e.g. demand on pensions and allowances). Our discussion

suggests the Australian public policy with respect to children and families, childcare, responsibilities for aged care, parenting leave and employment and workforce participation requires a radical re-think. In thinking about the family unit (that is not homogenous) parental leave, support for children, the sharing of responsibilities and return to employment apply equally to men as they do to women. Gendered division thinking is too often the unstated assumption underlying public policy design.

We reiterate that the 'end objective' of society, workplaces and government should be to achieve 'work-life balance' for individuals and families. 'Facilitating and supporting' women return to the workforce and offering 'flexibility and incentives' to men so that they have the option to spend more time with their children are equal policy objectives to achieve a 'work-life balance'.

References

- Access Economics (2006), 'Meeting Australia's Ageing Challenge: The Importance of Women's Workforce Participation', report commissioned by The House of Representatives Standing Committee on Family and Human Services, November. Available at: <https://apo.org.au/sites/default/files/resource-files/2007/01/apo-nid2544-1102886.pdf>
- Allen, Liz (2020), 'COVID-19 could see thousands of women miss out on having kids, creating a demographic disaster for Australia', The Conversation. Available at: <https://theconversation.com/covid-19-could-see-thousands-of-women-miss-out-on-having-kids-creating-a-demographic-disaster-for-australia-142174>
- Australian Bureau of Statistics (ABS) (2020), Labour force, Australia, Apr 2020, Cat no 6202.0, May 2020.
- Australian Bureau of Statistics (ABS) (2021), National State and Territory Population, March, Cat. No. 3101.
- Australian Bureau of Statistics (ABS) (2020), Household Impact of COVID-19 Survey, May 2020.
- Australian Bureau of Statistics (ABS) (2021), Household Impact of COVID-19 Survey, February 2021.
- Australian Bureau of Statistics (ABS) (2020), Weekly Payroll Jobs and Wages in Australia, Week ending 2 May 2020.
- Australian Bureau of Statistics (ABS) (2019), Consumer Price Index, Australia, June, Cat. No. 6401.0.
- Australian Bureau of Statistics (ABS) (2018), Australian National Accounts: National Income, Expenditure and Product, Australia, September, Cat. No. 5206.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2018), Population Projections, Australia, 2017 (base) – 2066. Cat. No. 3222.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2018), Australian Demographic Statistics, June, Cat. No. 3101.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2018), Labour Force Australia, December, Cat. No. 6202.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2018), Gender Indicators Australia, September, Cat. No. 4125.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2021), Average Weekly Earnings, November, cat. no. 6302.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2018), Pregnancy and Employment Transitions, Australia, November, Cat. No. 4913.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2017), Childhood Education and Care, Australia, June, Cat. No. 4402. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2016), Census of Population and Housing, Employment, Income and Education, Tablebuilder. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (2015-17), Life Tables, States, Territories and Australia, September, Cat. No. 3302.0. Available at: <http://www.abs.gov.au/>

- Australian Bureau of Statistics (ABS) (2015-16), Household income and wealth, September, Cat. No. 6523.0. Available at: <http://www.abs.gov.au/>
- Australian Bureau of Statistics (ABS) (1997), Unpaid work and the Australian Economy, October, Cat. No. 5240.0. Available at: <http://www.abs.gov.au/>
- Australian Industry and Skills Committee (2020), 'Children's Education and care', December, 2020. Available at: <https://nationalindustryinsights.aisc.net.au/industries/community-services/childrens-education-and-care>
- Bain and Company (2015), 'The Power Of Flexibility: A Key Enabler To Boost Gender Parity And Employee Engagement'. Available at: https://media.bain.com/Images/BAIN_REPORT_The_power_of_flexibility_Boosting_gender_parity.pdf
- Bohnet, Iris (2016), 'What Works: Gender Equality by Design', Belknap Press.
- Bowles, Hannah Riley, Babcock, Linda and Lei Lai (2007), 'Social Incentives for Gender Differences in the Propensity to Initiate Negotiations: Sometimes It Does Hurt to Ask', *Organisational Behaviour and Human Decision Processes*, 103 (1) 84-103. Available at: https://www.researchgate.net/publication/222513313_Social_Incentives_for_Gender_Differences_in_the_Propensity_to_Initiate_Negotiations_Sometimes_It_Does_Hurt_to_Ask
- Bowles, Hannah Riley, Thomason, Bobbi and Julia Bear (2019), 'Reconceptualizing What and How Women Negotiate for Career Advancement', *The Academy of management Journal*, in Press. Available at: file:///C:/Users/a1225025/Downloads/BowlesThomasonBear_AMJinpress.pdf
- Boxall, Hayley, Morgan, Anthony and Rick Brown (2020), 'The prevalence of domestic violence among women during the COVID-19 pandemic', Statistical Bulletin 28, Australian Institute of Criminology. Available at: https://www.aic.gov.au/sites/default/files/2020-07/sb28_prevalence_of_domestic_violence_among_women_during_covid-19_pandemic.pdf
- Ray Broomhill and Rhonda Sharp (2004), 'The Changing Male Breadwinner Model in Australia: a New Gender Order?', *Labour & Industry: a journal of the social and economic relations of work*, 15:2, 1-23. Available at:
- Burgess, Noël (2013), 'The Motherhood Penalty: How Gender and Parental Status Influence Judgements of Job Related Competence and Organizational Commitment', University of Rhode Island, Digital Commons @URI, Schmidt Labour Research Center, Seminar Research Paper Series. Available at: https://digitalcommons.uri.edu/cgi/viewcontent.cgi?referer=https://www.google.com/&httpsredir=1&article=1035&context=lrc_paper_series
- Conversation, The (2018), 'The Gender Qualification Gap: women over-invest in workforce capabilities' by Leonora Risse, November. Available at: <https://theconversation.com/the-gender-qualification-gap-women-over-invest-in-workplace-capabilities-105385>
- Cooper, Rae and Sarah Mosseri (2020), 'Pandemic has impacted on women most significantly', *The Sydney Morning Herald*, 5 June 2020. Available at: <https://www.smh.com.au/business/workplace/pandemic-has-impacted-women-most-significantly-20200604-p54ziu.html>
- Crabb, Annabel (2019), Men at Work: Australia's Parenthood Trap, Quarterly Essay: 75.

- Daly, Kevin (2007), 'Gender Inequality, Growth and Global Ageing', Global Economics, Paper No. 154, published by Goldman Sachs, April. Available at: <https://www.empowerwomen.org/en/resources/documents/2013/8/global-economics-paper-no-154-gender-inequality--growth-and-global-ageing?lang=en>
- Deloitte (2019), 'The Path to prosperity: Why the future of work is human', Building the lucky country No. 7. Available at: <https://www2.deloitte.com/au/en/pages/building-lucky-country/articles/path-prosperity-future-work.html>
- Department of Jobs and Small Business (DJSB) (2019), Australian Jobs 2019. Available at: <https://www.employment.gov.au/australian-jobs-publication>
- Dockery, Mike and Sherry Bawa (2020), 'Working from home in the COVID-19 Lockdown', Bankwest Curtin Economics Centre Research Brief COVID 19 #5.
- Dockery, Alfred M., Phillimore, John and Bawa, Sherry (2020), 'Changing demand for STEM skills in Australia and gender implications', *Australian Journal of Labour Economics*, 24 (1), 71-110. Available at: <https://businesslaw.curtin.edu.au/wp-content/uploads/sites/5/2021/05/AJLE-Vol-24-No-1-Paper-4.pdf>
- Drago, Robert, Sawyer, Katina, Sheffler, Karina, Warren, Diana and Wooden, Mark (2011), 'Did Australia's Baby Bonus Increase the Fertility Rate?', *Population Research and Policy Review* 30(3), June 2011, pp. 381-397. Available at: https://www.researchgate.net/publication/226217532_Did_Australia's_Baby_Bonus_Increase_Fertility_Intentions_and_Births
- Department of Social Services (DSS) (2010), 'Men's Uptake of Family-Friendly Employment Provisions'.
- Financy Women's Index (2020), 'The pandemic impacts progress and timeframe to economic equality', June quarter 2020.
- Fuegen, Kathleen, Biernat, Monica, Haines, Elizabeth and Kay Deaux (2004), 'Mothers and Fathers in the Workplace: How Gender and Parental Status Influence Judgements of Job-Related Competence', *Journal of Social Issues*, 60 (4) 737-754. Available at: https://www.researchgate.net/publication/229866757_Mothers_and_Fathers_in_the_Workplace_How_Gender_and_Parental_Status_Influence_Judgments_of_Job-Related_Competence
- Grattan Institute (2018), 'Good News and Bad News for Women in Australia', September. Available at: <https://grattan.edu.au/news/good-news-and-bad-news-for-the-women-of-australia/>
- Gould, Jill A., Kulik, Carol T and Sardeshmukh, R. Shruti (2018), 'Trickle-down effect: The impact of female board members on executive gender diversity', *Human Resource Management*, 57 (4) 931-945. Available at: <https://onlinelibrary.wiley.com/doi/full/10.1002/hrm.21907>
- Hislop, Madeline (2020), 'A return to pre-COVID childcare fees will force women out of work', *Women's Agenda*, 3 June 2020. Available at: <https://womensagenda.com.au/latest/a-return-to-pre-covid-childcare-fees-will-force-women-out-of-work/>
- Kleven, H., Landais, C., Posch, J., Steinhauer, A. and J. Zweimüller (2019), 'Child penalties across countries: Evidence and Explanations', NBER working paper series. Available at: <https://www.nber.org/papers/w25524.pdf>

- Kleven, H., Landais, C., and SØgaard, J.E. (2018), 'Children and gender inequality: Evidence from Denmark', NBER working paper series. Available at: <https://www.nber.org/papers/w24219.pdf>
- KPMG (2018), 'Ending workforce discrimination against women', April. Available at: <https://home.kpmg/au/en/home/insights/2018/04/ending-workforce-discrimination-against-women.html>
- McKinsey Global Institute (2019), 'Navigating a world of disruption' by Jacques Bughin and Jonathan Woetzel, Jan 2019. Available at: <https://www.mckinsey.com/featured-insights/innovation-and-growth/navigating-a-world-of-disruption>
- McKinsey Global Institute (2015), 'The Power of Parity: How advancing Women's equality can add \$12 trillion to Global Growth', September. Available at: <https://www.mckinsey.com/featured-insights/employment-and-growth/how-advancing-womens-equality-can-add-12-trillion-to-global-growth>
- Melbourne Institute (2020), Who's hit hardest by the economic effects of COVID-19? Available at: <https://www.austaxpolicy.com/news/melbourne-institute-whos-hit-hardest-by-covid19-economic-impact/>
- Melbourne Institute of Applied Economic and Social Research (Melbourne Institute) (2018), 'The Household Income and Labour Dynamics in Australia (HILDA) Survey: Selected Findings from Waves 1 to 16'. Available at: https://melbourneinstitute.unimelb.edu.au/_data/assets/pdf_file/0005/2839919/2018-HILDA-SR-for-web.pdf
- O'Leary, J. and G. Russell (2012), 'Men Get Flexible! Mainstreaming flexible work in Australian business', The Diversity Council of Australia. Available at: <https://xyonline.net/sites/xyonline.net/files/Russell%2C%20Men%20Get%20Flexible%202012.pdf>
- OECD (2020a), Women at the core of the fight against COVID-19 crisis, Tackling Coronavirus Series.
- OECD (2020b), Protecting people and societies, Tackling Coronavirus Series.
- Productivity Commission (2009), 'Paid Parental Leave: Support for parents with Newborn Children, February. Available at: <https://www.pc.gov.au/inquiries/completed/parental-support/report/parental-support.pdf>
- Productivity Commission (2015), 'Childcare and Early Childhood Learning: Public Inquiry', February. Available at: <https://www.pc.gov.au/inquiries/completed/childcare/report>
- PwC, (2017), 'Understanding the unpaid economy', March. Available at: <https://www.pwc.com.au/australia-in-transition/publications/understanding-the-unpaid-economy-mar17.pdf>
- Risse, Leonora (2019a), 'Myth busting: The Gender Pay Gap Edition', Women's Agenda. Available at: <https://womensagenda.com.au/latest/myth-busting-the-gender-pay-gap-edition/>
- Risse, Leonora (2019b), '50 years after Australia's historic 'equal pay' decision, the legacy of 'women's work' remains', The Conversation. Available at: <https://theconversation.com/50-years-after-australias-historic-equal-pay-decision-the-legacy-of-womens-work-remains-118761>

- Stewart, Miranda (2018), 'Personal income tax cuts and the new Childcare Subsidy: Do they address high effective marginal tax rates on women's work?', Tax and Transfer Policy Institute, Crawford School of Public Policy, Australian National University, Policy Brief 1/2018, August. Available at: https://taxpolicy.crawford.anu.edu.au/sites/default/files/publication/taxstudies_crawford_anu_edu_au/2018-08/complete_gender_tax_cuts_m_stewart_august_2018.pdf
- The Australian Government (The Treasury) (2015), '2015 Intergenerational Report'. Available at: <https://treasury.gov.au/publication/2015-igr>
- Verniers, Catherine and Jorge Vala (2018), 'Justifying gender discrimination in the workplace: The mediating role of motherhood myths', PLOS ONE 13(7): e0201150. Available at: <https://doi.org/10.1371/journal.pone.0201150>
- Wade, Mary E. (2001), 'Women and Salary Negotiation: The Costs of Self-Advocacy', *Psychology of Women Quarterly*, 25, p. 65-76. Available at: <https://journals.sagepub.com/doi/pdf/10.1111/1471-6402.00008>
- Whitehouse, Gillian (2001), 'Recent Trends in pay Equity: Beyond the Aggregate Statistics', *The Journal of Industrial Relations*, 43 (1) 66-78. Available at: <https://journals.sagepub.com/doi/pdf/10.1111/1472-9296.00005>
- Wood, Danielle and C. Chivers (2019), 'The gaping holes in Labor's 20% pay boost for childcare workers', published in *The Sydney Morning Herald*. Available at: <https://www.smh.com.au/politics/federal/the-gaping-holes-in-labor-s-20-percent-pay-boost-for-childcare-workers-20190502-p51jh7.html>
- Wood, Danielle, Kate Griffiths and Owain Emslie (2020), 'Cheaper Childcare, A practical plan to boost female workforce participation', Grattan Institute.

