

What Do We Mean by an Unemployment Solution?

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1. Introduction

What unemployment level would be regarded as a solution to Australia's unemployment problem? If the US is taken as a guide, a solution would be an unemployment level similar to that which prevailed here in the 1960s. This suggests an unemployment rate of around 2 per cent. Keeping the US as a guide, it also suggests an increase of perhaps 12–14 per cent in the number of jobs. Such a change, at current per capita income levels, would make a large difference to the Australian economy: tax revenue would be boosted, government expenditure reduced. There could be substantial personal tax cuts. It would be a completely new world. But I cannot see such an unemployment level in the near future. To achieve 2 per cent unemployment would require a combination of growth and labour productivity outcomes far outside the range of experience of the past two and a half decades.¹ I am not alone in this judgment and it illustrates, in a very clear way, that almost all of us believe that Australia cannot easily or quickly separate itself from its recent economic history.

What about a more modest target of 5 per cent unemployment? This is very modest indeed, relative to recent US outcomes, but it also seems unlikely in the next three or four years. To achieve such a target would require large changes in the performance of the Australian economy against a world background which, over the next few years, is more likely to generate increases rather than reductions in unemployment.

This is a very pessimistic start to these comments, but it is only describing what has become commonplace over the past twenty-five years. Australia has become a high unemployment country in which it has proven very difficult to reduce unemployment significantly, quickly and permanently. It is important at the outset to realise that over twenty years have passed without a satisfactory unemployment outcome either in Australia or in almost all European OECD countries. The way forward is not easy or obvious. We can all agree that faster growth rates are needed but how are they to be achieved? We can all agree that if we had avoided recessions unemployment would be significantly lower, but how could that have been done? We all might agree that real wage moderation would help but how is that to be achieved? It is important to be a little humble in the promises that we might hold out or in what we might expect the economy to deliver.

Still, there are things to be learnt and things that can be done to improve the situation. Furthermore, just because reforms will not deliver improved outcomes quickly is no

1. There is another problem. It has never been adequately explained why US unemployment rates were so much higher than those of Australia during the 1950s and 1960s. Therefore, even if labour markets were fully deregulated, it is not clear whether a 2 per cent unemployment rate is compatible with a modern Australian economy.

argument against advocating and adopting sensible changes. But if we wish to emulate the US, and return to low unemployment rates of 2–3 per cent, then it is difficult to see how current policies will achieve this. Perhaps, we may be fortunate and the economy may be subject to favourable employment shocks that we have not yet foreseen, in much the same way that we did not foresee the adverse shock twenty-five years ago.

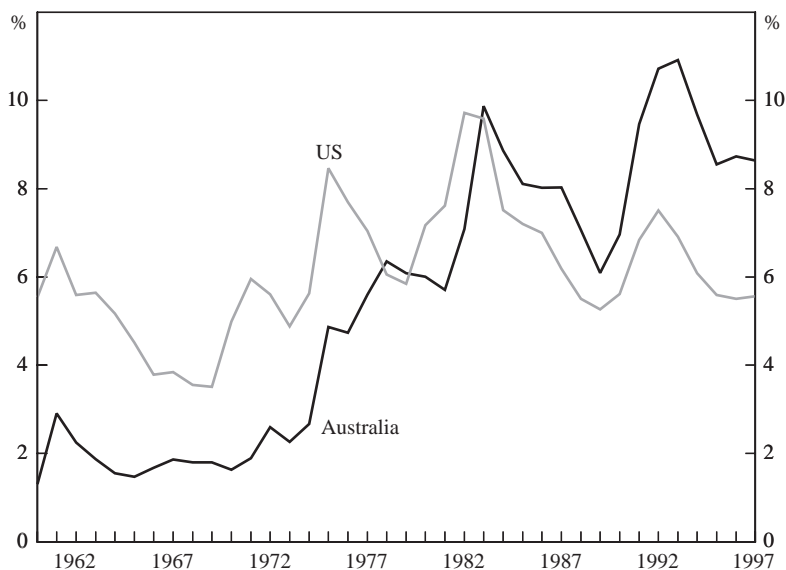
If we adopt a more modest approach and seek to reduce unemployment to, say, 6 or 7 per cent then this does not seem so difficult. But our main task over the next two years may well be to try and avoid unemployment increases.

2. Some Background Facts

My comments will be presented in the context of an Australian–US comparison. The US is chosen for comparison because, among OECD countries, it is the only one which has been able to achieve unemployment rates similar to those that prevailed during the 1960s. In addition, this comparison might be useful to complement the excellent paper by Larry Katz in this volume.

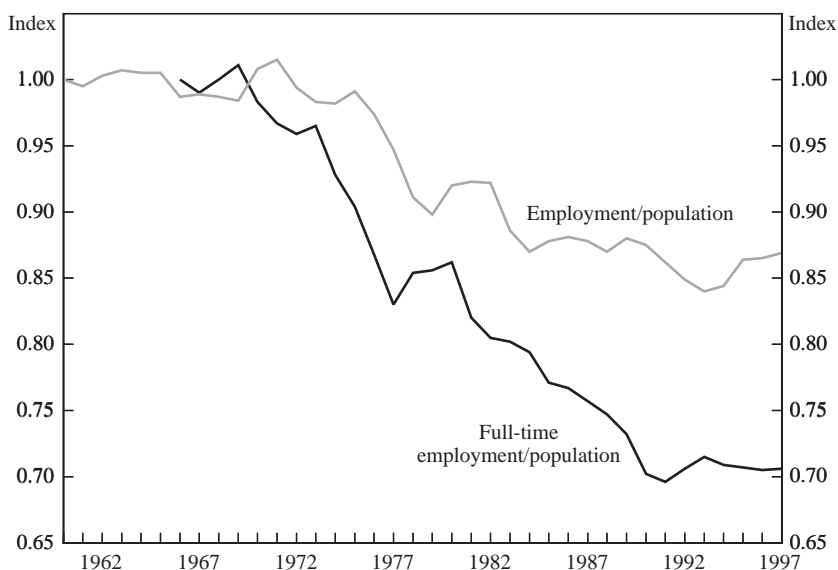
The Australian unemployment problem began in the early 1970s. Between the recession of 1972 and 1983, unemployment increased from 1.9 to 9.4 per cent (Figure 1). Over that decade, Australian unemployment increased from approximately 40 per cent of US levels to approximate equality. In the following eight or nine years unemployment in the two countries moved in a parallel fashion, but since 1990, Australian unemployment has increased to well above US levels and US unemployment has fallen to historically low levels.

Figure 1: Unemployment Rates



The extent of the Australian deterioration is even greater if measured in employment terms (Figure 2). Between 1970 and 1998, Australian employment, adjusted for population, fell 15 per cent relative to the US. In terms of full-time employment the reduction was 30 per cent.

Figure 2: Total and Full-time Employment/Population Indices
Ratio of Australia to the US



These data raise two important questions: What began the process of employment decline in Australia and why has it persisted?

The fundamental causes of our high unemployment problem are unlikely to be unique to Australia. Our changing labour market outcomes share many common features with other OECD countries. Indeed, the unemployment situation is so severe among most OECD countries that in a recent OECD paper (Elmeskov, Martin and Scarpetta 1998) Australia is declared as one of six 'success' countries which have succeeded in reducing structural unemployment following labour market reform and adoption of the OECD Jobs Strategy. In 1997, the average structural unemployment rate of the 'success' countries was 7.6 per cent. The structural unemployment rate of Australia was estimated to be 7.5 per cent (down from 7.9 per cent in 1986). By structural unemployment the authors mean that unemployment rate consistent with a non-accelerating rate of wage increases. To name Australia, with a 7.5 per cent structural unemployment rate, as a success among OECD countries is to illustrate the widespread pessimism that most economists feel and illustrates again that 5 per cent would be a very good unemployment outcome, relative to current expectations. It also suggests that 5 per cent may require a more radical policy approach to policy than is currently being adopted. But focusing on Europe reinforces the pessimism and perhaps should not be allowed to divert us away from the key fact: if the Australian economy had performed like the US, and we had maintained our relative positions, Australian unemployment would be around 2 per cent.

3. What is Causing the Unemployment Problem?

To simplify the analysis, the possible unemployment causes are placed in two groups which seem to be important from a labour market perspective. The two groups can be described as (i) average wages that are too high relative to the labour productivity level which is compatible with full employment,² and (ii) relative wages that are too rigid.

This dichotomy can be found in many of the papers delivered at the conference. It is not the only approach that may be adopted to analyse unemployment. For example, unemployment may be attributed to a range of factors that inhibit economic growth, such as balance of payments constraints and lack of savings, or to labour market institutions that, at high unemployment levels, lead to nominal wage increases incompatible with the Reserve Bank's inflation target.

3.1 The relationship between average real wages and the average level of labour productivity that is compatible with full employment

The initial increases in Australian unemployment were generated by the large increases in real wages that occurred in the early 1970s and which were initiated by an exceptional rate of growth of nominal wages. In the first half of 1974, for example, the rate of growth of nominal wages, measured at an annual rate, peaked at 30 per cent. Price increases lagged behind nominal wage increases and consequently real wages lifted. Wage indexation from April 1975 locked in the real wage increase by preventing subsequent price increases from eroding the real wage change.

Relative to the US, the Australian real wage increased by about 30 per cent during the 1970s. In retrospect, however, it appears that the large increase in real wages was not the only important shock. There are two reasons for this belief.

First, although the real wage shock was substantial, real wages remained constant for a few years after the shock, so that by 1979, real wages were at about the level they would have been if Australian trends before the shock had been maintained. And yet unemployment and employment did not return to previous levels. Either there was a very long response to the real wage shock or something else was occurring.

Second, in the US, which did not experience a real wage shock, labour productivity growth slowed markedly from around 1970, and real wages growth ceased and today they are not that much above 1970 levels. To the extent that the US and Australia are similar economies changing in a parallel way, Australia too may have experienced a substantial slowdown in labour productivity growth compatible with full employment.

A second shock – a marked slowdown in the underlying labour productivity growth consistent with full employment – would explain why low real wage growth for a few years after the real wage shock, failed to return employment and unemployment to previous levels.³ It would also explain why the Accord with its moderation of real wage growth during the 1980s was not more successful. The history of Australia's real wage growth alone cannot explain the long-run decline in employment, something else is

2. This group of arguments used to be referred to as the real wage overhang.

3. Some of the theory underlying this framework can be found in Bruno and Sachs (1985).

needed. That a real wage shock, concentrated in a few years, could have such a long-lasting effect seems such an unexpected outcome.⁴

We do not clearly understand what caused the sudden slowdown in the rate of growth of productivity consistent with full employment, and why its adverse effects have persisted.⁵ These issues are vital because they lie at the centre of the pessimistic outlook for unemployment.

The difficulty with a focus on the growth of full-employment labour productivity is that it is not observed unless there is full employment. What is observed is *actual* labour productivity which might be expected to disguise the slowdown in the full-employment labour productivity growth rate when there is a positive real wage shock.

To form a judgment about the role of labour productivity, I would turn to the US experience where the extent of the productivity slowdown, compatible with full employment, has been substantial and has persisted longer than was predicted.

We can investigate this issue by writing employment growth as the following identity:

$$e \equiv q - l \tag{1}$$

which states that a given rate of employment growth e can come about by various combinations of labour productivity growth l and output growth rates q .

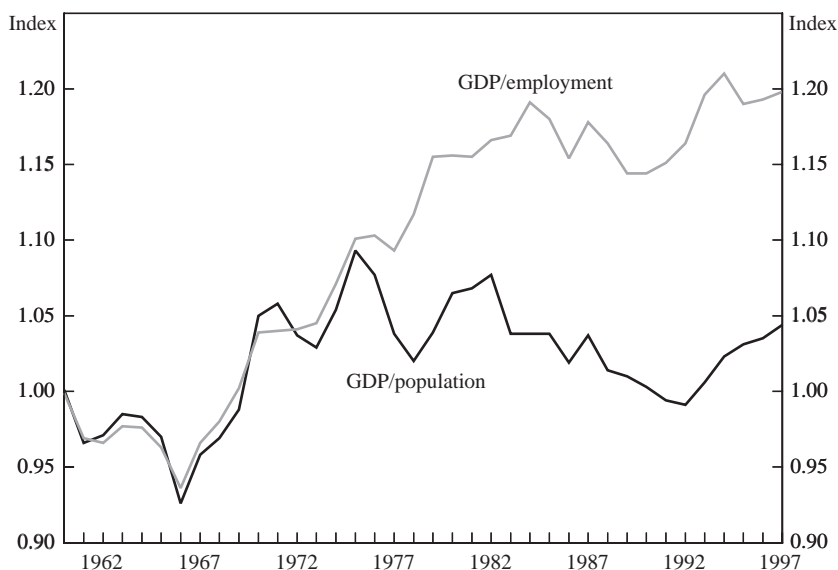
Figure 3 plots the ratio of Australian GDP per capita relative to that in the US, and the ratio of GDP per person employed in both countries, using 1960 levels as the base. Before 1975 labour productivity and output per capita evolved in an almost identical manner in both countries and the close association of the growth of GDP per person has continued. By 1997 Australian per capita output levels relative to the US, are much the same as in the early 1970s. In output terms, the US economy has performed no better than Australia and there is no obvious evidence of a break in the relative rates of output growth in the early 1970s and no sign of any differential shock with long-lasting effects. Consequently, this comparison suggests that there was a labour market shock that affected relative employment outcomes with minimal effects on relative output.

The relationship between the rate of growth of labour productivity across the two countries has changed a great deal and since the early 1970s Australian labour productivity has increased approximately 15 percentage points more than that of the US. The different employment outcomes of Australia and the US, therefore, are predominantly explained by a change in the observed labour productivity performance of the two economies, rather than by a change in relative output growth rates. The US has achieved higher employment growth rates because labour productivity growth rates have been lower. The marked difference in the change in the observed labour productivity relationship across the two countries lasted approximately a decade.

4. There is a long and complicated debate on these issues (Gregory and Duncan 1979; Norton 1979). Everyone who participated in the debate seems to have won some of their original arguments and lost others. No-one predicted, however, that unemployment would remain so high for so long.

5. Blanchard (1997) in a recent article is also revisiting this period. He adopts a twin-shock approach and argues that the real wage shock takes place in the 1970s, as we do, but the productivity shock takes place in the 1980s. We prefer to date the productivity shock from the early 1970s.

Figure 3: GDP/Population and GDP/Employment Ratios
Ratio of Australia to the US



What follows from this? First, it appears that the difference between the two economies since the mid 1970s, is the implicit income-sharing rule that is produced by each economy which leads to different sharing of an almost identical rate of output growth. In the US, the output growth has been associated with employment growth and very little income growth per employed person. In Australia, the same output growth per capita has been associated with additional income for a smaller group of employed. In Australia, government has reacted to the underlying labour productivity slowdown by increasing its role in income sharing and has distributed income to the not employed through unemployment benefits and various pensions. In the US, the sharing has been done by the labour market which has prevented average wage growth. This analysis suggests that the institutional structure of the labour market is important.

Second, the US labour market and the processes that have generated full employment have not led to more income being available for US citizens. The rate of growth of output has been the same across both countries. If this is the way labour markets respond to labour productivity shocks, then the comparison is not between Australia and the US unemployment rates alone, but there is a trade-off between less unemployment and lower wages.

To understand why productivity growth and employment growth have been negatively related across these two countries, and why differential productivity growth rates have not impacted more on output growth rates, seems to me to be the major research agenda needed at this time. The cross-country comparison does not suggest that the higher labour productivity in Australia, matched by wage increases, has led to faster or slower output growth.

Let me illustrate this point in another way. It might be argued that Australia needs more radical labour market reform and it is only in this way that we can reduce unemployment. The advocates of this approach, however, usually relate more labour market reform to higher rates of actual labour productivity growth. But, to the extent to which observed labour productivity is increased, unemployment will not be reduced unless the reforms lead to an even greater increase in output growth. To date this has not happened.

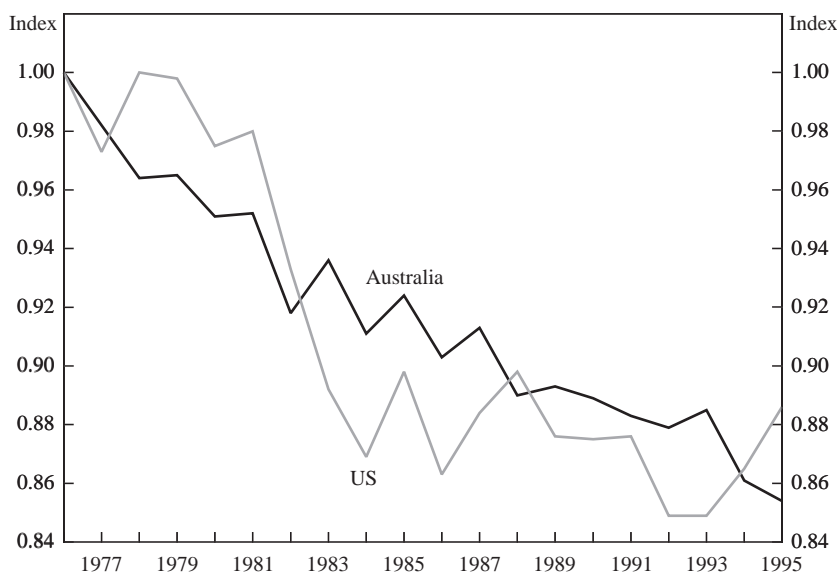
If this analysis is right and the twin shocks have had a long drawn-out effect, generated to a significant extent by the unobserved full-employment productivity slowdown, then the unemployment strategy should consist of a policy to increase the full-employment productivity level but not to increase average real wages and therefore not to increase observed labour productivity. How this might be done is not clear. Under the old labour market institutional framework, an Accord process was the ideal policy instrument and Figure 1 suggests some success, but such an approach does not seem possible today. The current strategy of relying on labour market deregulation and reducing trade union power in the hope that this leads to a reduced rate of growth of average real wages does not as yet seem to be successful. Real wage growth has been high, given the level of unemployment, and is generating increases in labour productivity. Employment, on the other hand, has not been increasing at a sufficiently fast rate.

3.2 Lack of relative wage flexibility

The second possible cause of high unemployment in Australia may be lack of relative wage flexibility. The argument is that there has been a demand shift away from unskilled labour which has led to significant wage falls for this group in the US. It is often argued that a similar shift away from unskilled labour has happened here, but, instead of the labour market responding with wage falls for the unskilled, it has responded with unemployment. But there is not much direct evidence supporting this view. Figure 4 plots changes in full-time weekly earnings of males at the 10th percentile relative to the median full-time earnings. These data do suggest that in the US there has been a marked shift in demand away from low-paid labour which has resulted in large falls in wages at the bottom end of the pay distribution. At the 10th percentile, for example, and relative to the median weekly earnings of a male full-time worker, earnings have fallen by approximately 12 per cent since 1976. It is apparent though that wages at the bottom of the pay distribution have fallen in a similar manner in Australia. Indeed the close association across the countries is surprising. Given this close association it appears that if relative wage rigidity has made a contribution to unemployment, it is probably not the major source of our difficulties. The change in relative wages is not sufficiently different across the two countries.

If relative wage rigidity, however, did explain the high rate of Australian unemployment, then this also suggests a pessimistic outlook. Quite large falls in Australian relative wages have already occurred and seem not to have had much effect on unemployment. If relative wage changes are needed, then the requirement may be for very large changes indeed. Large falls in low wages would require substantial redesign of the Australian social security system leading to reductions in benefits and pensions if employment disincentives are to be avoided. This would require an acceptance of a society in which there would be a large increase in the working poor.

**Figure 4: Full-time Male Average Weekly Earnings,
Ratio of 10th Percentile to Median**



4. Stepping Back a Little Further

If we look long enough at Figure 1, which plots US and Australian unemployment rates, and apply a little imagination, it is possible to see three separate periods, especially when the US data after 1980 are moved back one year.

In the first period, 1970 to 1979, unemployment increases markedly in Australia. This is the effect of the twin shocks discussed earlier. There is then a middle period, 1980 to 1990, which coincides with the Australian Accord during which the unemployment histories of Australia and the US are very similar. Then there is the third period, which begins at the start of the 1990s recession, after which Australian unemployment drifts upwards relative to the US.

The analysis embodied in the conference papers and the surrounding discussions did not naturally fit into this three-period framework. There was wide recognition of the first and second period, and fairly widespread acceptance of the underlying explanations, but there was no suggestion that a third period had begun.

If Australia is embarking on a third period, how does it fit into the analysis? Is it a macro phenomenon generated by the fact that our asset-price bubble of the late 1980s and the subsequent adjustment was so much more pronounced than that of the US? If so, then perhaps we should not think of post-1990 outcomes as having any necessary long-run implications for structural reform of the Australian labour market? Or can post-1990 outcomes be fitted easily into the earlier analysis of average and relative wage changes and be thought of as a continuation of the forces that were important in the first two periods?

To throw more light on these issues, we utilise the earlier employment identity and apply it to quarterly data and a shorter time period to see more clearly the changes since 1990 (Figure 5). As suggested by the recent increase in Australian unemployment relative to the US, the Australian employment growth rate has fallen relative to the US. The relative change in output, however, is very different. Australia has recovered better from the 1990s recession and output growth rates are well above those which would be predicted on a US–Australian comparison.

Figure 5: GDP and Employment Ratios



Given that the recent US output performance is not as good as Australia's, why has the US managed to reduce unemployment relative to Australia? This answer is the same as it has been through all the period since 1970. Different unemployment and employment outcomes across these two countries are predominantly explained by different labour productivity outcomes. Although Australia has faster output growth than the US, this has been more than offset by an increase in the rate of growth of labour productivity in Australia relative to the US. It appears, on balance, that the recent Australian productivity lift has been associated with job destruction rather than job creation and understanding the different outcomes in the product and labour market is crucial to understanding this recent history.

Why has there been a lift in Australian productivity? Perhaps it is the result of enterprise bargaining. The deregulation of the labour market has brought wage increases and productivity increases closer together at the firm level and yet this is not what is required. It strengthens the insider-outsider dichotomy. If employees capture more of the productivity gains within firms, there is no room left for additional employment. Productivity increases are effectively directed towards income increases for the employed and not towards the unemployed in terms of extra jobs.

Finally, it might be worthwhile to look quickly at one other country. New Zealand has been subject to significant labour market reforms and it may be instructive to consider the changing balance among output, employment and labour productivity. Table 1 lists output and productivity changes for Australia and NZ over the periods 1979–90 and 1990–97. Since their labour market reforms, employment growth has been strong in NZ relative to the past but productivity growth has been low. Australia has generated the opposite pattern. Productivity has increased markedly but employment has not. Both countries have had much the same output growth record relative to the past.

Table 1: Australian and New Zealand Employment, Output and Productivity Growth
Per annum

Period	Australian employment			Australia			New Zealand		
	Full-time	Part-time	Total	Hours	GDP	Labour productivity	Hours	GDP	Labour productivity
	Thousands			Per cent					
1979–90	98	55	153	2.1	3.1	0.9	0.2	2.1	1.9
1990–97	3	68	70	0.8	3.0	2.2	1.7	1.8	0.1

Note: GDP calendar years.

Sources: DX Australian National Accounts, OECD historical services; Labour Force Australia, ABS cat. no. 6203.0, August (various issues).

Once again it is the differences in labour productivity growth rates that account for employment differences and it is low observed labour productivity growth rates relative to the past that are associated with the strong employment growth of NZ, rather than changes in output growth rates. The NZ reforms seem to have changed the income-sharing rules generated by the labour market rather than to have led to faster economic growth. The NZ experience, therefore, is similar to the US before and after 1970. Employment increases relative to the past are generated primarily by labour productivity increases lower than the past.⁶

5. Concluding Comments

The above analysis, which has been offered to stimulate debate, leaves me feeling uneasy on four counts.

First, there is no clear and easy way forward. The comparison with the US seems to point to the need for substantial moderation in real wage growth and probably significant average real wage reductions, and yet it is not clear how this will be delivered. The

6. It should be remembered that the NZ employment–population levels, although growing strongly out of the deep recession of the early 1990s, are yet to return to 1975 levels.

evidence suggests that the constancy of the average wage during the Accord helped employment but it was not sufficient to enable Australia to claw back any of the employment deterioration relative to the US. We did not go far enough. Furthermore, over the past few years, under the new and reformed labour market the economy is producing significant increases in average real wages but very little employment growth, which does not seem to be what we want. But it is not clear how to avoid this. A new Accord framework, which I would favour, seems politically impossible whichever government is in power.

Second, others, who believe in a real wage moderation seem not to share my concerns as to the ineffectiveness of relative wage changes and therefore advocate reducing wages at the bottom of the wage distribution as a method of reducing the average wage. There are three difficulties that make this not an attractive option. One is that the reductions in low wages would need to be substantial to have a large effect on average wages. Reform may just reduce the wages of low-paid workers with insufficient employment growth to make the reforms worthwhile or any guarantee that further wage increases among the well paid will not offset the changes. It also seems unlikely that the Industrial Relations Commission could deliver such a large reduction in the wages of the low paid and remain an effective body. This policy, therefore, may well involve the abandonment of the Industrial Relations Commission and a hundred years of history. It may also involve the abandonment of minimum wages at current levels. These would be large steps for us to take. Finally, as indicated earlier, substantial wage falls among the low paid is not possible without reform of the social security system which will inevitably leave low-income groups worse off while in work or out of work.

Third, the focus on the lack of growth of full-employment labour productivity, which I find myself increasingly emphasising, leads us into research areas that have been seriously neglected. The neglect is understandable because the centre of the analysis is something that is unobservable. But nevertheless the dynamics associated with a developing gap between observed labour productivity and that compatible with full employment is important and should be pursued.

Fourth, if the US–Australian comparison is regarded as a valid one then the US provides us with a counterfactual that is not very attractive. We can achieve full employment but at a large price that involves substantial falls in average wages and larger wage falls at the bottom of the wage distribution. Even if we put aside average real wage reductions, it is not easy to see how we can convert Australia into an economy in which average real wages do not increase for a long period of time. It is just not easy to see how we can undo the average real wage increases of the past. We seem to be left without a policy instrument to effect real-wage moderation.

Whichever way we turn therefore, the choices are difficult and desirable outcomes are not guaranteed. Perhaps the best way forward then is to try a little of everything. The government should keep emphasising training of the unemployed, try to moderate wage increases and try to foster growth. But when the OECD labels as a success an Australian unemployment rate of 7.5 per cent (a reduction from 7.9 per cent a decade earlier), we should not expect too much of an improvement.

Finally, two remaining comments. It is important to emphasise how much judgment is involved in these comments and it is disappointing that the evidence does not enable

us to be more prescriptive and optimistic. If the arguments developed above are right – that there has been a large and continuing productivity shock and the impact of this type of shock on different economies with different labour market institutions is primarily in terms of a wage-employment trade-off rather than variations in output growth – then unemployment does not involve any significant long-run efficiency loss. Unemployment is about the way income is shared rather than about lost output. This is a very radical idea which has not been consistent with the facts in normal time periods⁷ or in developing countries. Nevertheless it is an important issue that is raised in a comparison of Australia with the US, the only country that has managed to maintain unemployment at 1960s levels.

If full employment is defined as an unemployment rate over 5 per cent, say 6 or 7, then the problem becomes a different one and the target can be achieved and it is possible to be much more optimistic. But given that the unemployment level has been so high for more than two decades and given that unemployment in the US is around 1960s levels, shouldn't we try harder?

7. A comparison of Australia and the US in the 1930s suggests that the two economies behaved then in much the same way as they do today (Gregory, Ho and McDermott 1988).

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