

# Unemployment Insurance: A recipe for more unemployment?

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## Introduction

When presenting Budget 2021 in May, Finance Minister Grant Robertson announced that an unemployment insurance (UI) scheme was being developed for New Zealand. Prior to this, the Productivity Commission had considered UI as part of its inquiry into technological change and the future of work, as had the Ministry of Business Innovation and Employment (MBIE).<sup>1</sup>

Details of the envisaged scheme are still very limited. However, initial indications suggest the scheme might pay out as much as 80% of an individual's previous wages if they were to become unemployed, subject to a cap.

Considering whether current policy settings support displaced workers adequately and exploring alternatives is understandable, given the economic turmoil that Covid-19 has unleashed worldwide. Early in the onset of the Covid-19 crisis, predictions of unemployment as high as 9% or more were not uncommon.

To help prevent that outcome from occurring, the government hastily implemented a wage subsidy scheme that arguably had the desired effect but was costly. Part of the thinking behind exploring the introduction of UI could be that compared to the wage subsidy scheme, UI might be better targeted and perhaps even less costly under certain conditions. The New Zealand Initiative proposed adopting a short-time work scheme for similar reasons.<sup>2</sup>

However, even if correct, this does not mean that UI should be introduced in New Zealand. In fact, determining whether UI is a good fit for New Zealand is far from straightforward.

This paper considers some of the biggest costs and potential benefits of introducing UI to New Zealand. Common features of UI schemes and how they differ across countries are also examined.

Because New Zealand's labour market outcomes are generally good, delivering consistently low levels of unemployment and long-term unemployment, the potential benefits of UI appear modest at best. On the other hand, a significant body of empirical work suggests that UI insurance has a detrimental effect on employment. Total unemployment is raised, as is the length of time people spend in unemployment. UI also comes at a considerable fiscal cost. For these reasons, the introduction of UI in New Zealand should be avoided.

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## The need for UI is limited

There are several reasons unemployment insurance is often proposed. Two of the most important of these relate to an effect known as wage scarring and potential weaknesses in the functioning of private insurance markets.

Proponents of UI argue that its provision allows unemployed people greater opportunity to search for and secure good jobs. Without it, they may be forced to accept low-quality jobs in the interim. This might diminish their ability to find a job that better fits their skills in the future, resulting in lower wages than might otherwise have been the case. However, UI may give more time for skills to deteriorate, thus reducing future wages. The empirical evidence on wage scarring suggests that UI may have a very slight negative effect on wages.<sup>3</sup>

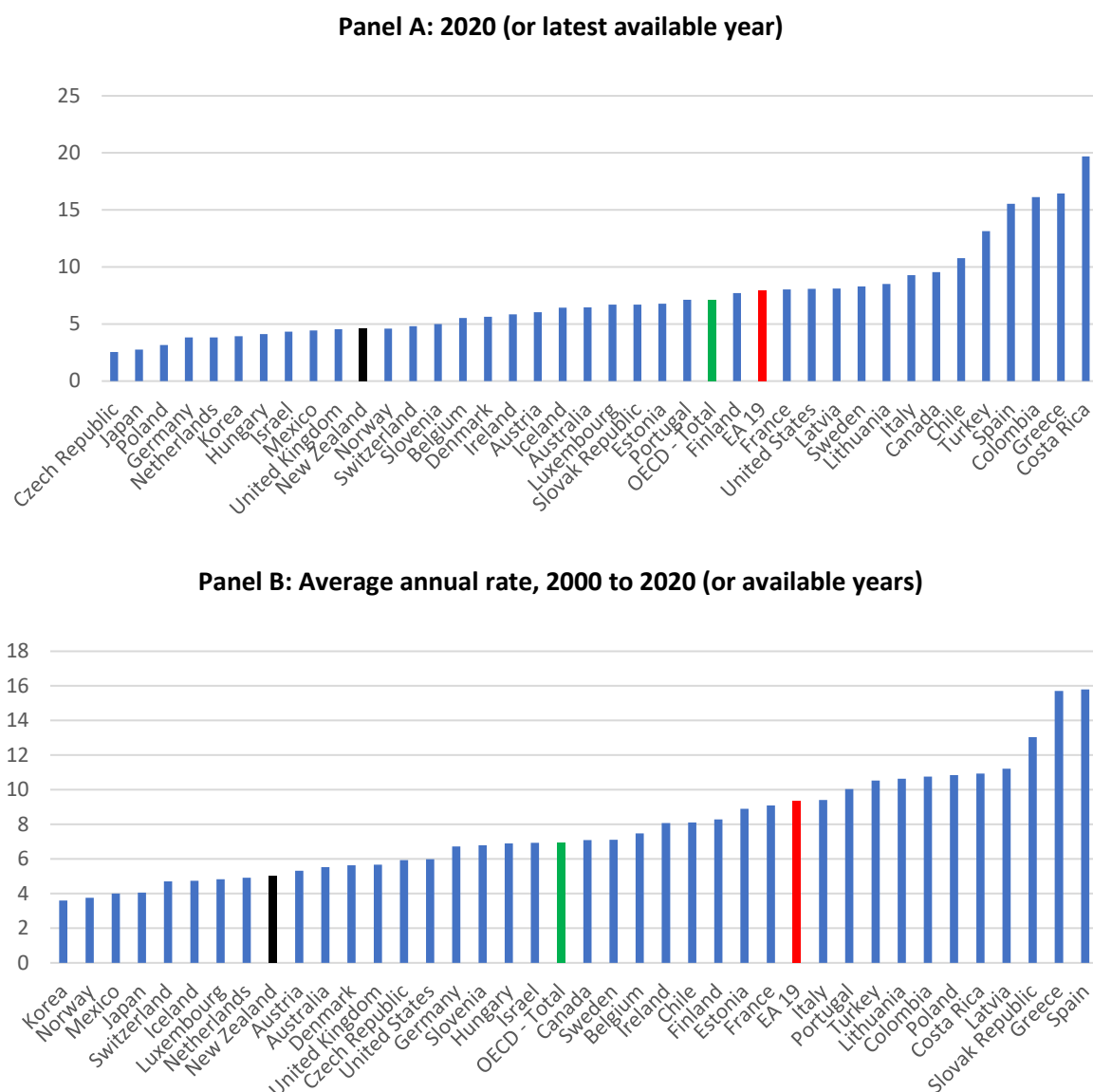
The second argument used by proponents of UI relates to the functioning of private insurance markets, or rather two potential issues with them. The first is moral hazard, where the insured individuals' incentives to protect themselves from risks are diminished. The more significant issue for UI is adverse selection; that is, higher risk individuals will be more inclined to want to purchase insurance.

With imperfect information available to insurers to differentiate risk, this drives up costs. Insurance contracts are less attractive for lower risk individuals, and the private market may break down. In some jurisdictions, insurers are even prohibited from using certain information for pricing insurance contracts. Making unemployment insurance compulsory can potentially solve this adverse selection problem.<sup>4</sup>

However, whether making unemployment insurance compulsory is welfare enhancing is a different matter and would depend upon the risk appetite of the population, loading, i.e. costs of administering the scheme, and other costs and benefits. The biggest problems appear to be that unemployment insurance can create perverse labour market incentives and that the fiscal costs of such schemes can be large. Both of these are discussed in more detail later in this paper.

In the case of New Zealand, thanks to well-functioning labour markets, any potential benefits from UI seem likely to be modest at best. Indeed, New Zealand's unemployment rate is consistently among the lowest in the OECD. In 2020, the annual unemployment rate for New Zealand was 4.6% compared to the OECD average of 7.2% (Figure 1, Panel A). From 2000 to 2020, New Zealand's average annual rate of unemployment was 5%, compared to 6.9% for the OECD (Figure 1, Panel B).

**Figure 1: Unemployment rate, % of labour force**

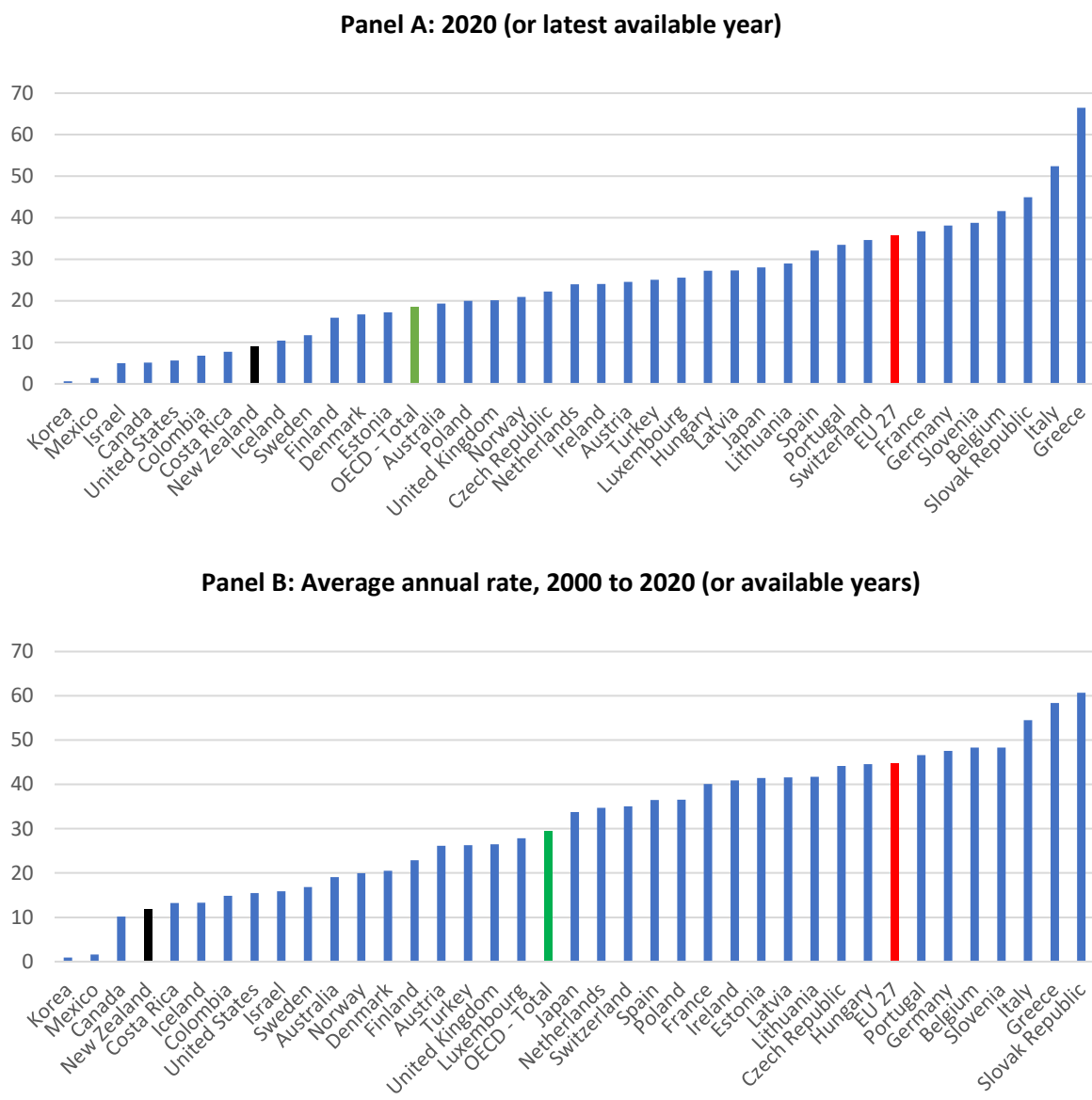


**Source:** OECD.stat.

Perhaps more importantly, long-term unemployment, that is, people who have been unemployed for 12 months or more, is also relatively low in New Zealand. Figure 2 shows the proportion of the long-term unemployed among all unemployed and is compared across countries.

In 2020, long-term unemployed was only 8.9% of total unemployed in New Zealand. This compares to 18.4% across the OECD and 35.6% for the European Union (EU), where unemployment insurance schemes are more prevalent (Figure 2, Panel A). From 2000 to 2020, New Zealand’s average annual share of long-term unemployment in total unemployment was 11.8%, compared to 29.4% for the OECD and 44.7 for the EU (Figure 2, Panel B).

Figure 2: Long-term unemployed, % of total unemployed

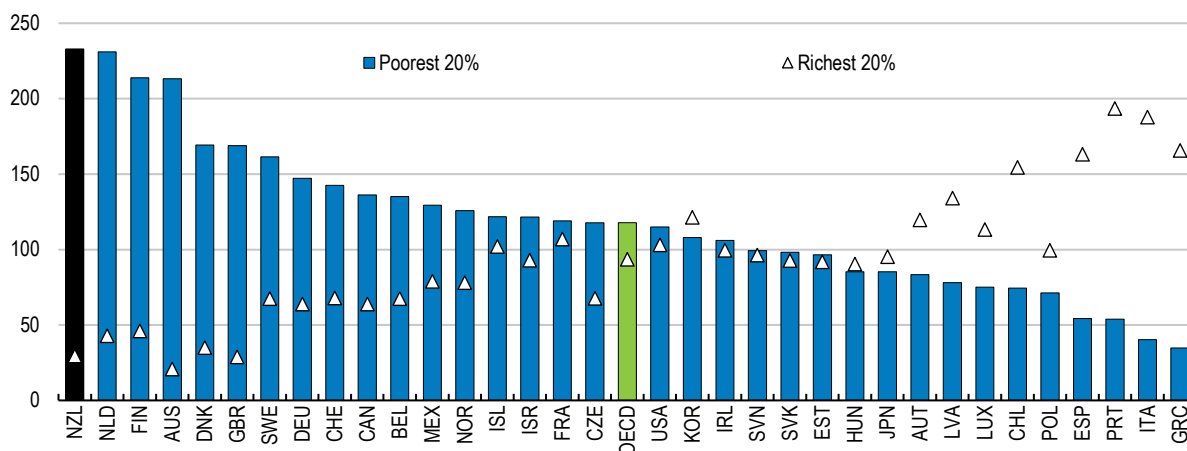


Source: OECD.stat.

One final point to consider is that New Zealand’s current welfare system does a good job of targeting assistance to those who need it most. Figure 3 shows how the transfer payments received by the poorest and richest households compare across OECD countries.

New Zealand stands out, with low-income households receiving significantly more transfers than high-income households. Households in the bottom 20% of the income distribution receive over 130% more than the average family compared to the top 20%, who receive only 29% of the average payment across all families. As will be discussed later, unemployment insurance is not designed as an instrument for income redistribution. If introduced, UI could significantly alter the situation in New Zealand.

**Figure 3: Transfers received by working-age individuals – Percentage of average cash transfer received by poorest and richest quintiles of household income distribution, 2013 or latest year available**



Source: OECD Economic Survey of Spain (2018).

## Unemployment insurance and what is proposed for New Zealand

As many New Zealanders may be unfamiliar with unemployment insurance programmes, and there are significant differences across countries, this section describes some of their key features. Next, unemployment insurance is compared across countries. Our current welfare system is then discussed, and the likely specific features of the proposed UI scheme for New Zealand are outlined.

### Unemployment insurance

Programmes that offer some form of financial support for people who are unemployed while they search for a job are common worldwide. Indeed, all OECD countries have them in one form or another. Unemployment insurance is one way to support the unemployed.

However, unemployment insurance means different things to different people. For the purposes of this paper, unemployment insurance is defined as a compulsory, contributory government programme that provides benefits to individuals if certain conditions are met.<sup>5</sup>

Typical unemployment insurance programmes cover salaried workers in the formal economy. Coverage of public-sector employees and non-standard workers, such as the self-employed, varies across countries.

Two criteria usually determine an individual’s eligibility to receive unemployment insurance benefits. First, minimum requirements related to their work history must be met. For example, people may need to have worked for a certain period of time, say 12 months, or have made a minimum amount of contributions to the unemployment insurance system.

Second, the reason for being unemployed may be considered. While redundancy is normally regarded an acceptable cause for filing for unemployment benefits, voluntary resignation may not be.

In some cases, short stand-down periods are imposed before unemployment insurance benefits can be claimed. These act like an excess with other forms of insurance, meaning that individuals bear some of the costs of unemployment. It also has the effect of reducing the administrative burden from processing very short claims on unemployment.

Once individuals begin receiving benefits, they typically must be ready and available to work, and their job-search activities may be monitored. Sanctions, for example, in terms of reduced benefit levels, will often be imposed if these conditions are not met.

The unemployment insurance benefits people receive are individual specific. These benefits relate to past earnings. In particular, UI benefits are typically calculated as a percentage, known as the replacement rate, of an individual's earnings immediately before unemployment.

The UI benefit replacement rate is below 100% of past earnings and may either remain constant over time or gradually reduce the longer someone remains unemployed. In addition, the dollar amount an individual receives is usually capped. This means that individuals who had earnings below the cap when they were employed can receive significantly different benefit amounts if they become unemployed.

For example, assuming an initial replacement rate of 80% of gross income, an individual who had been earning \$60,000 per year would receive a monthly benefit of \$4,000 from unemployment insurance before tax. On the other hand, someone earning \$120,000 per year would receive a monthly benefit of \$8,000.

People can only receive UI benefits for a limited period of time. This is known as the potential benefit duration (PBD). The PBD can be the same for different people who meet unemployment insurance eligibility criteria. However, the PBD may also depend on the length of time one has contributed to the UI system or individual characteristics, such as the age of the unemployed person.

If a person is still unemployed once the PBD has been reached, they will usually be moved to a different benefit. This benefit would be less generous than unemployment insurance and come with more requirements. For example, means-testing based on household or individual income and assets would be likely, as would stricter requirements for job search, education and training.

Unemployment insurance is usually financed through specific employer contributions and payroll taxes, which are paid by workers. This burden is often split evenly between the two groups. In many cases, these contributions are supplemented with funds from general tax revenue. This may be regularly or might occur only during economic recessions.

The term insurance is somewhat misleading in the context of unemployment insurance or social insurance programmes more generally. It is used because such programmes deal with economic risks, in this particular case, the risk of job loss. However, unemployment insurance differs from private insurance in some important ways.

First, participation in unemployment insurance is usually mandatory for most people or it is at least strongly encouraged by substantial subsidies. Second, rarely does unemployment insurance have anything to do with providing actuarially fair insurance. Neither an individual's risk of unemployment nor an employer's risk of its employees becoming unemployed, is generally accounted for.

In rare cases, contributions may be 'experience rated'. In this case, employers have a specific unemployment insurance tax rate assigned to them based on their experience with unemployment insurance. The less unemployment that an employer's workers have experienced, the lower the unemployment insurance tax rate will be. However, this is not the norm.

One final point to consider is that unlike welfare programmes, unemployment insurance is not designed as an instrument for income redistribution. Indeed, most benefits typically accrue to higher income households. This is particularly the case once lifetime income is taken into consideration.

In addition, depending on how they are designed, the taxes that fund unemployment insurance may be regressive. For example, if the taxes imposed on employee earnings to fund UI are a constant share of income, say 2%, but total annual contributions are capped, at say \$1,000. In this case, the individual who earns \$50,000 per year spends 2% of his or her earnings on UI. However, if the same person earned \$100,000 per year, only 1% of their earnings would go to funding UI. What's more, the higher income individual would potentially be eligible for much higher UI benefits.

### **Box 1: Unemployment Insurance at a Glance**

The design of unemployment insurance programmes varies greatly across, and even within, countries. Nevertheless, typical UI systems have most of the following features:

- Benefits are individual specific. That is, some people receive more than others.
- Benefits are tied to past earnings. An individual receives a given share of what they earned when they were employed – the replacement rate.
- Support is time limited. There is a maximum duration for which UI benefits will be paid – the potential benefit duration.
- Conditions must be met to be eligible for unemployment insurance. Minimum previous work experience or contributions to the UI system are common. The reason for unemployment may also be pertinent.
- While receiving benefits, people must be ready and available to work. Monitoring of job search activities is also common.
- It is typically funded through taxes levied on both employers and employees.
- It has little to do with actuarially fair insurance.
- Unlike welfare programmes, unemployment insurance is not designed as an instrument for income redistribution.

### *UI programmes around the world*

The design of unemployment insurance schemes varies significantly across countries. To provide a basis for comparison with New Zealand's proposed UI scheme, this section briefly examines that variation across four important dimensions of UI drawing on a recent study from the International Labour Office (ILO). These dimensions are entitlement conditions, benefit replacement rates, maximum potential benefit duration, and cost.<sup>6</sup>

Entitlement conditions determine the coverage of UI schemes or the share of unemployed that participate. There are two important components of entitlement conditions.

The first are the conditions that determine the categories of workers legally covered and thus able to contribute to the UI scheme. For instance, in terms of legal coverage UI schemes often differ in how they treat public sector workers and the self-employed.

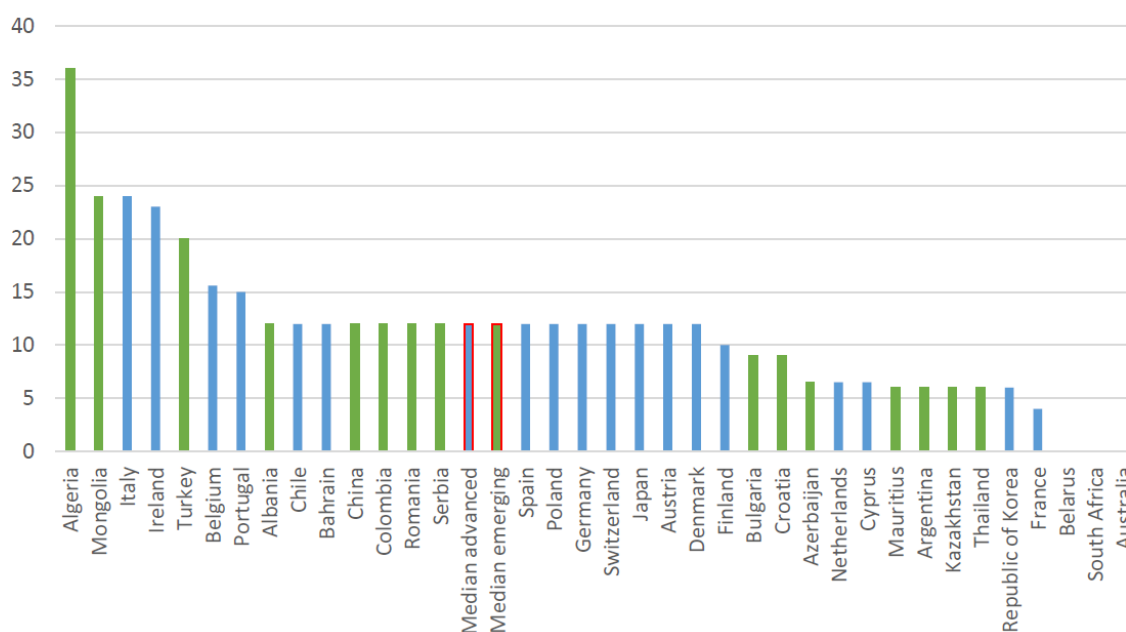
Of the 15 advanced countries the ILO considered with sufficient information, 10 extend coverage of UI benefits to public sector workers. On the other hand, only 40% of UI schemes in advanced countries cover the self-employed. Of the six countries that do, four do so on a voluntary basis while another provides coverage for only certain categories of the self-employed.

Coverage of the self-employed in UI schemes is particularly contentious due to the nature of their employment relationships and the question of how best to finance their participation. It could be

argued that the self-employed are more like employers than employees and, therefore, in less need of unemployment protection if activities cease.

However, many self-employed are reliant on only one or a few employers for most of their income. The exclusion of self-employed from UI can therefore exacerbate the incentives of employers to rely on bogus self-employment where a dependant employment relationship should instead exist.

**Figure 4: Length of minimum job tenure to join UI schemes, in months**



**Source:** Antonia Asenjo and Clemente Pignatti, “Unemployment Insurance Schemes Around the World: Evidence and Policy Options,” Working Paper 49 (International Labour Organization, 2019).

**Note:** Blue columns refer to advanced economies and green columns refer to emerging economies.

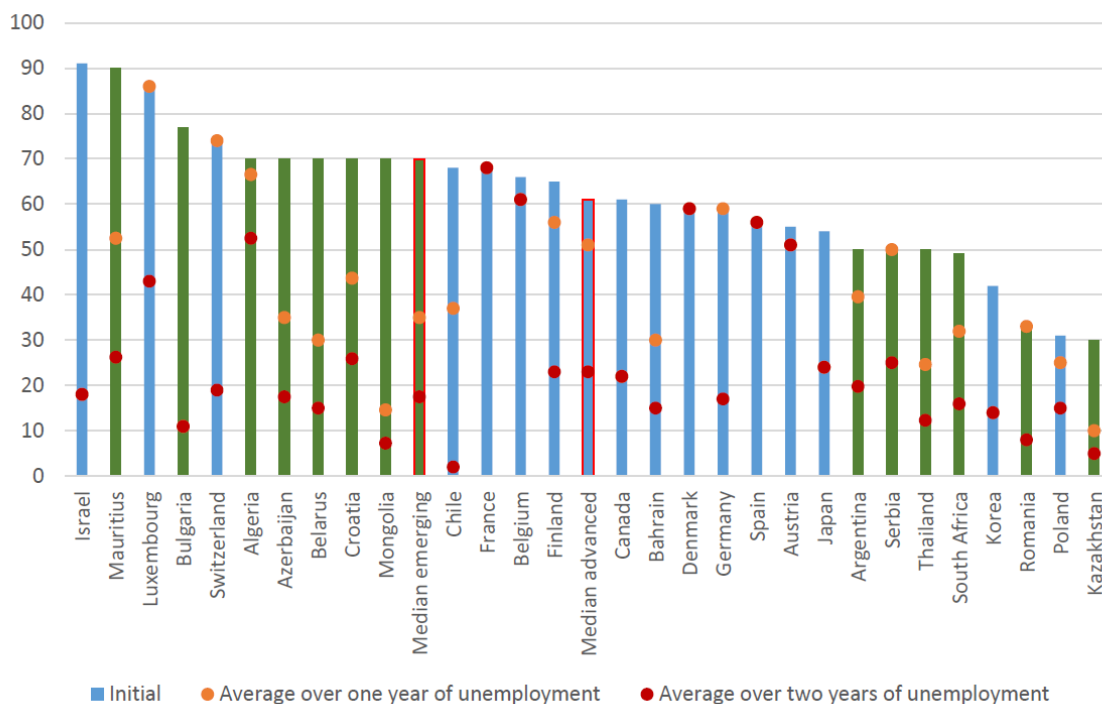
Among those who are legally covered, a second set of conditions determine entitlement to benefits once unemployed. The first of these relate to the length of previous employment (or social security) spell (Figure 4). For advanced economies that have such a condition, the minimum job tenure required to qualify for UI ranges from two years in Italy to four months in France. The most common requirement is 12 months of employment.

The reason for unemployment is also pertinent. In particular, allowing those who voluntarily resign from their jobs to be included in UI schemes could create perverse incentives. Together with short job tenure requirements, particularly if benefit levels are high, people may leave their jobs simply to take advantage of the UI benefit. For this reason, only one-third of advanced economies considered by the ILO allow those who resign voluntarily to claim UI benefits.



Figure 5 compares average benefit replacement rates across countries, that is, benefits measured as a share of previous income. For advanced economies, initial income replacement rates in unemployment range from over 90% in Israel to approximately 30% in Poland. Only two advanced economies have initial replacement rates above 80% and the median is 61%. As it is common that UI benefits decline over time, average income replacement rates over one and two years of unemployment are lower than initial replacement rates for most countries.

**Figure 5: Average replacement rates (as a share of previous income)**

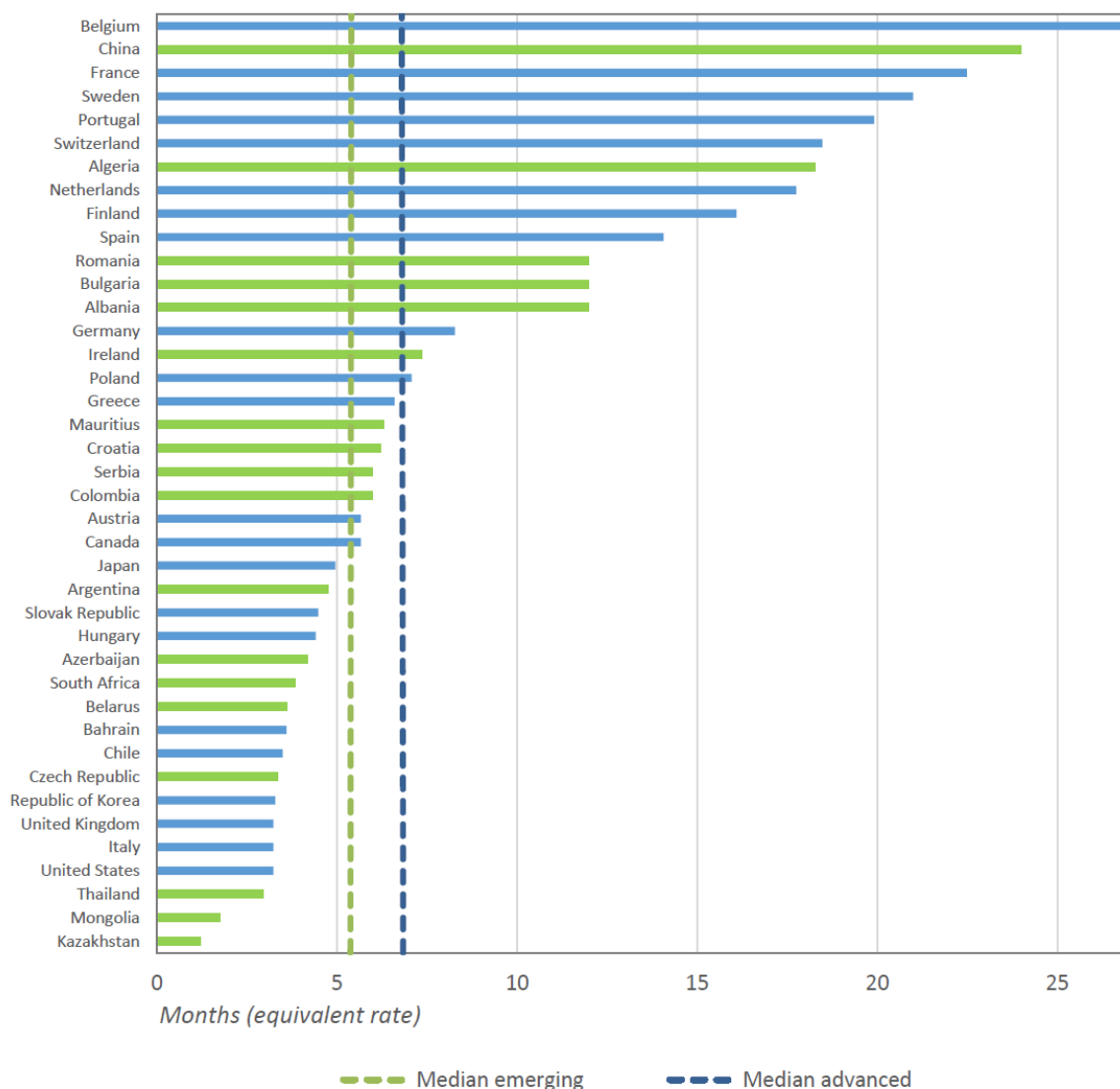


**Source:** Antonia Asenjo and Clemente Pignatti, “Unemployment Insurance Schemes Around the World: Evidence and Policy Options,” Working Paper 49 (International Labour Organization, 2019).

**Note:** Blue columns refer to advanced economies and green columns refer to emerging economies.

The maximum duration of unemployment benefits across countries is shown in Figure 6. Once again, there is significant variation across countries. In Belgium, for instance, the maximum benefit duration is essentially indefinite, while in Korea, the United Kingdom, Italy, and the United States, it is much lower, at around three months. The median for advanced countries considered by the ILO is 6.8 months.

**Figure 6: Maximum duration of unemployment benefits at an equivalent rate**

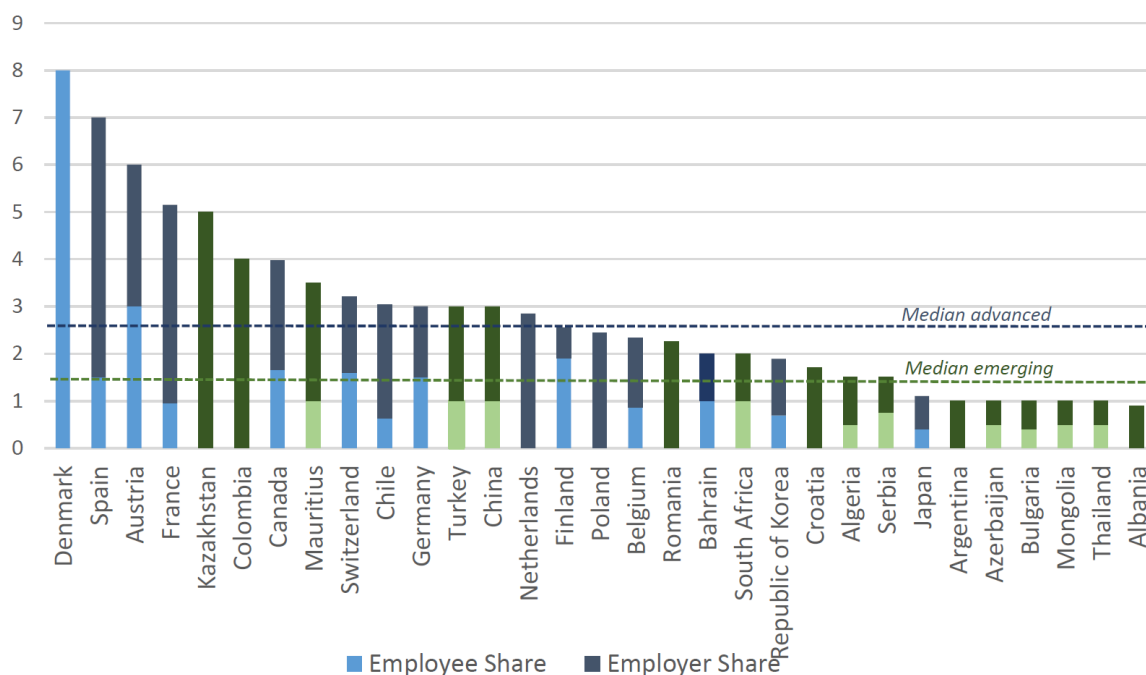


**Source:** Antonia Asenjo and Clemente Pignatti, “Unemployment Insurance Schemes Around the World: Evidence and Policy Options,” Working Paper 49 (International Labour Organization, 2019).

**Note:** The maximum duration of the unemployment benefits at an equivalent rate is shown. The indicator equals the number of months for which the benefit is received, compared to the initial wage rate. Blue columns refer to advanced economies and green columns refer to emerging economies.

Finally, Figure 7 provides a sense of how much UI schemes cost in practice. Funding is often shared so both workers’ and employers’ contributions as a proportion of monthly payroll are shown. For advanced economies, the total of worker and employer contributions ranges from as much as 8% of payroll in Denmark to around 1% in Japan. The average for advanced economies is 2.6%.

**Figure 7: Worker and employer contributions to UI schemes, as a share of monthly payroll**



**Source:** Antonia Asenjo and Clemente Pignatti, “Unemployment Insurance Schemes Around the World: Evidence and Policy Options,” Working Paper 49 (International Labour Organization, 2019).

**Note:** Blue columns refer to advanced economies and green columns refer to emerging economies.

### *The scheme expected for New Zealand*

In addition to the various support measures currently provided by the social welfare system in New Zealand, an unemployment insurance system is being proposed. Before detailing what that proposal is expected to look like, it is worth briefly recapping what is currently available for those not working or working less than they would like.

Jobseeker Support is potentially available for people who are unable to work due to an illness or disability, and those who can work but are unemployed. The level of benefits depends on household characteristics. For example, a single person with no children can receive up to \$314.73 gross a week, while a sole parent would receive \$470.22. A couple with no children receives up to \$506.84 gross per week. With children, the couple would receive \$537.76.

However, other income, or having a partner with income above a modest threshold, results in a reduced Jobseeker Support benefit or being ineligible altogether. Additionally, to qualify, people must be available for and seeking full-time employment or working part-time but wanting to work more.

There are a number of other benefits that can supplement income from Jobseeker Support. The most important of these are Working for Families and the Accommodation Supplement. Working for Families is an in-work tax credit, which again is reduced based on household income and the number of children. The Accommodation Supplement helps people on low incomes with the costs of housing. It can be as much as \$305 per week for a couple with children but is means tested against cash assets.

For those unable to work due to injury, compensation from the Accident Compensation Corporation (ACC) is available. This is different from Jobseeker Support in that it pays 80% of previous earnings up to a maximum annual income of approximately \$131,000. It also differs in that the level of this benefit is not affected by other sources of income the beneficiary may have or their partner's earnings.

The UI scheme proposed for New Zealand will likely have some similarities with ACC. It is expected that it will also replace 80% of previous earnings up to the same maximum of \$131,000. Based on the previous section, this is generous when compared internationally.

The proposed unemployment insurance benefits will be time limited, as they are in almost all other countries, with the potential benefit duration expected to be six months. This is approximately the median potential benefit duration internationally.

To be entitled to receive unemployment insurance benefits, people will likely need to have previously worked for a minimum of 12 months, which again is common internationally. Those who become unemployed due to illness will also be eligible; however, it is unlikely the self-employed will be covered.

It is expected that the UI system will be funded initially by both an employer and an employee levy of equal size. Regular contributions to the UI system from general taxation are unlikely, although the government will likely act as lender of last resort. For a relatively generous unemployment insurance scheme such as this, particularly with respect to the high benefit replacement rate of 80%, the levies required will be non-trivial.

With no plans to significantly alter or abolish New Zealand's current welfare system, the result of introducing unemployment insurance would be a two-tier unemployment benefit system. This is the norm internationally where unemployment insurance exists.

The proposed UI benefits will be relatively generous, but only some unemployed would qualify at any given time. In particular, only those who meet past employment conditions and whose time on this benefit has not yet run out. The second tier, that is, our current welfare system, would be less generous, but in some respects, come with stricter eligibility requirements than what the UI scheme is likely to.

## Labour supply effects of unemployment insurance

This section begins by outlining some of the ways in which unemployment insurance can affect labour supply. Surveys of empirical evidence are discussed, as are some specific examples of studies which find negative consequences of unemployment insurance on employment, unemployment duration, and reemployment wages.

### *Theory*

Unemployment insurance can affect labour supply in several important ways, some of which have been studied more than others. Alan Krueger and Bruce Meyer discuss five of these dimensions:<sup>7</sup>

1. By altering the actions that both workers and firms may, or may not, take to avoid job loss, UI can increase the probability of unemployment;
2. The characteristics of UI programmes can make it more or less likely that eligible workers make a claim once unemployed;
3. Once a claim against UI has been made, the receipt of UI benefits can extend the length of time recipients are out of work;
4. The availability of UI benefits can change the value of work for prospective employees; and
5. UI benefits can affect the labour supply responses of others from the same households as unemployed workers and participation in part-time work.

Elaborating on each, unemployment insurance can influence the incidence of unemployment for many reasons. For example, UI can reduce the incentives of people in employment to search for other jobs, even if they are at a greater risk of losing their job. It can also lead to reduced effort in their current job. Both behaviours can increase the likelihood that an individual may become unemployed.

On the firm side, particularly when demand for a company's goods or services are variable, the presence of unemployment insurance may make firms more willing to make workers redundant than otherwise would be the case. It could also make people more willing to work for firms prone to redundancies, as the expected returns from doing so may be higher than in the absence of UI. Unemployment insurance that is not fully experience rated, that is, where premiums are adjusted for risk relative to comparable firms, would accentuate these effects.

Conditional on becoming unemployed, the generosity of UI benefits can affect the likelihood that a claim on benefit entitlements is made. As the generosity of benefits rises, it is more likely that the stigma and transaction costs of applying for UI will be outweighed by the benefits and a claim will result. It is also more likely that a person would remain out of work for long enough to meet the eligibility requirement of any stand-down period for receiving UI benefits. This is important because once a claim is made, individuals will be exposed to the negative incentives of the UI scheme. For example, leading to reduced search intensity for re-employment and longer unemployment spells, as discussed further below.

A variety of economic models incorporating unemployment insurance predict that both the level and maximum duration of UI benefits can affect the duration of unemployment spells. More generous benefits on either dimension result in unemployed workers who receive UI benefits taking longer to find a new job.

One such model is that of Dale Mortensen (1977),<sup>8</sup> belonging to a class of models known as search models. In this model, workers face a distribution of wage offers and choose their level of job search intensity and a reservation wage. They then receive job offers at a constant rate that depends on their search intensity; that is, more search effort results in a greater rate of job offers. If they receive an offer that exceeds their reservation wage, it is accepted.

Unemployment insurance is included in the model with two important features that are common elements of such schemes worldwide. UI benefits are paid for a limited time only and not everyone is eligible, for example, those who voluntarily resign from their jobs or new entrants to the labour market.

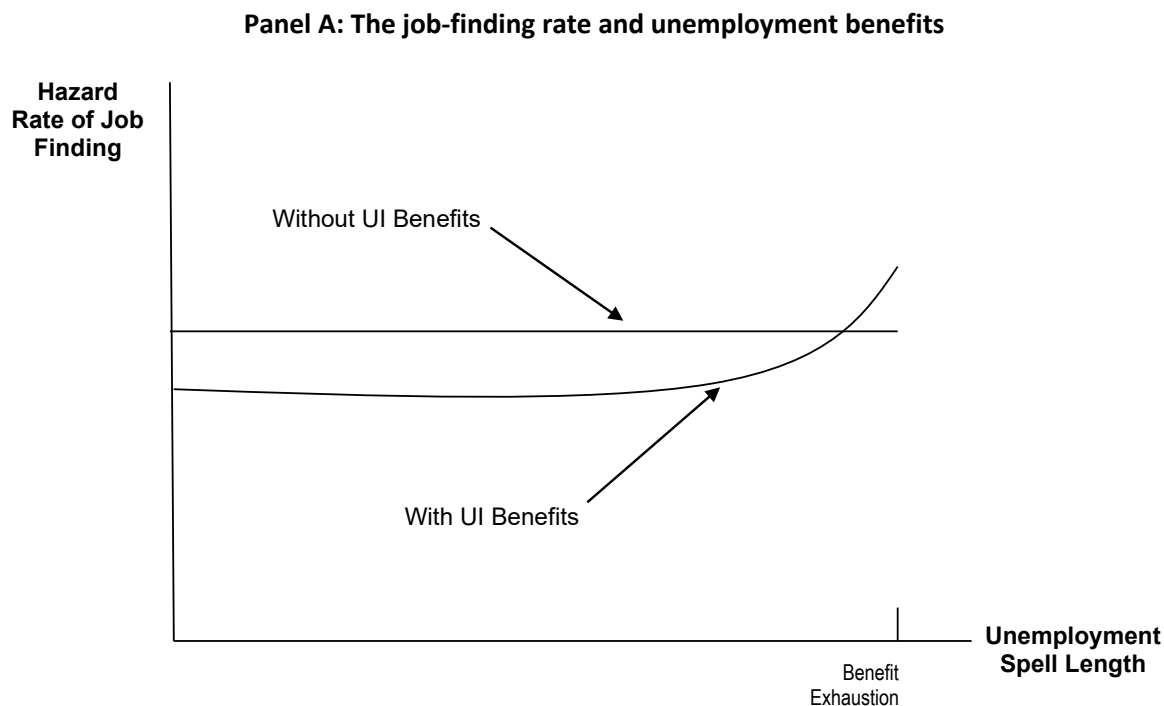
The effect of UI in the model is to raise the value of being unemployed, which leads to a higher reservation wage and reduced effort expended on searching for jobs. This means the exit rate from unemployment is typically lower than without UI, and unemployment spells last longer.

There is an additional effect that raises the exit rate from unemployment for those close to the point at which UI benefits are exhausted or who do not currently qualify. The prospect of receiving benefits in the future after gaining further entitlement for UI benefits through future employment makes work more attractive for these people and increases the intensity with which they search for jobs.

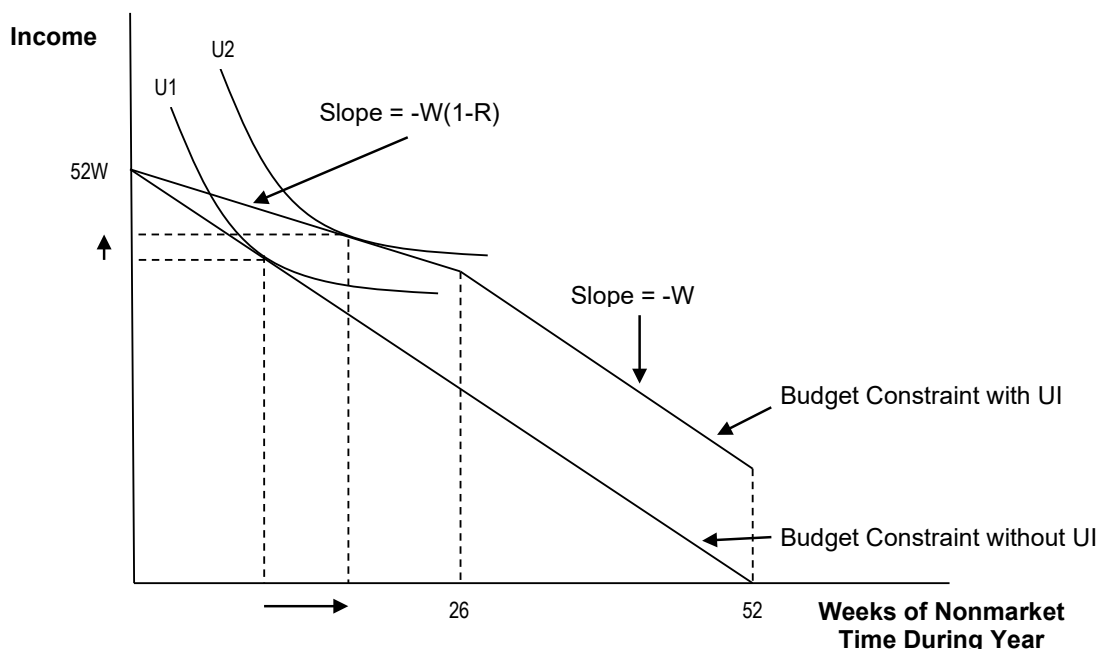
The pattern of the hazard rate for exiting unemployment and finding a job for the case with and without UI benefits is illustrated in Figure 1 Panel A, up until UI benefits are exhausted. While the probability of exit from unemployment remains constant over time in the case without unemployment insurance, in the case with UI the likelihood of finding a job is lower when there is a lot of time before benefits are exhausted but higher around the time of exhaustion. The more generous the UI scheme,

either in terms of level or maximum benefit duration, the more pronounced these effects are expected to be.

**Figure 8: Labour supply effects of unemployment insurance**



**Panel B: How unemployment insurance alters the budget constraint**



**Source:** Adapted from Alan B. Krueger and Bruce D. Meyer, "Labor Supply Effects of Social Insurance," in Alan J. Auerbach and Martin Feldstein (ed.), *Handbook of Public Economics* (Elsevier, 2002), edition 1, volume 4, chapter 33, 2327–2392.

A standard labour supply model can also be used to explore the effects of unemployment insurance on the duration of unemployment. An example is provided by Robert Moffitt and Walter Nicholson. They assumed that employment with a constant weekly wage can be found at any time and that

people value, or derive utility from, both income and leisure.<sup>9</sup> For a given level of income, unemployment increases an individual's utility because it allows opportunities for leisure. In this kind of model, people maximise their utility by choosing income and weeks of unemployment subject to a budget constraint.

Figure 1 Panel B illustrates the choices that an individual makes both with and without unemployment insurance. In the absence of UI, individuals face a budget constraint with a slope equal to  $-W$ . For every week they spend unemployed, they must give up one week's wages ( $W$ ). If they spend the entire year in employment, their income would be 52 multiplied by the weekly wage rate. If, on the other hand, they spend the entire year in unemployment their income would be zero.

Unemployment insurance pushes out the individual's budget constraint. In this example, UI benefits are paid for a maximum of 26 weeks, and they replace wages at the rate of  $R$ , which lies between 0 and 1. For periods of unemployment up to 26 weeks, the slope of the new budget constraint is  $-W(1-R)$ . For every week the individual now spends out of work, below the maximum benefit duration of 26 weeks, they no longer lose a full week of wages but rather a smaller amount. For example, if the replacement rate were equal to 50%, a week of unemployment would mean only 50% of that week's wages would be lost. Beyond 26 weeks, however, the slope of the budget constraint is  $-W$  as before.

With UI, individuals can reach a higher level of utility than they could before, represented by a shift from  $U_1$  to  $U_2$ .<sup>10</sup> This is achieved by increasing both income and the time spent in unemployment.

The generosity of UI schemes affects an individual's budget constraint in two different ways. It becomes flatter as the level or replacement rate of UI benefits increases. In addition, as the maximum duration of benefits increases, the budget constraint extends outward. Both effects make unemployment more attractive and make it more likely that an individual will choose to be unemployed for longer than otherwise – a very similar result to the search model of unemployment discussed above.

Finally, UI may also reduce work by other members of the household and limit part-time work. For example, one of the responses to unemployment in the absence of UI may be an increase in hours worked by the partner of an unemployed worker. However, this labour supply response of partners is likely to be "crowded out" at least in part by unemployment benefits that reduce the loss in family income when one household member is unemployed.

Part-time work can also be affected. In particular, when allowable earnings before an individual's benefits are reduced are low, or if those seeking part-time work are ineligible for UI benefits, there may be a decrease in part-time work.

### *Empirical evidence*

Recall that two of the key theoretical predictions about unemployment insurance are that it can increase the incidence of unemployment and lengthen the duration of unemployment spells. Before discussing the empirical evidence on the labour supply effects of UI, the performance of New Zealand's labour markets relative to selected European economies where UI programmes are prevalent, are examined.

Figure 2 shows both the unemployment rate (Panel A) and the share of unemployment that is long-term (Panel B) for New Zealand, Denmark, Germany, France, Belgium and the European Union, where UI is more prevalent, over the past two decades. Long-term employment refers to those individuals who have been unemployed for 12 months or longer.

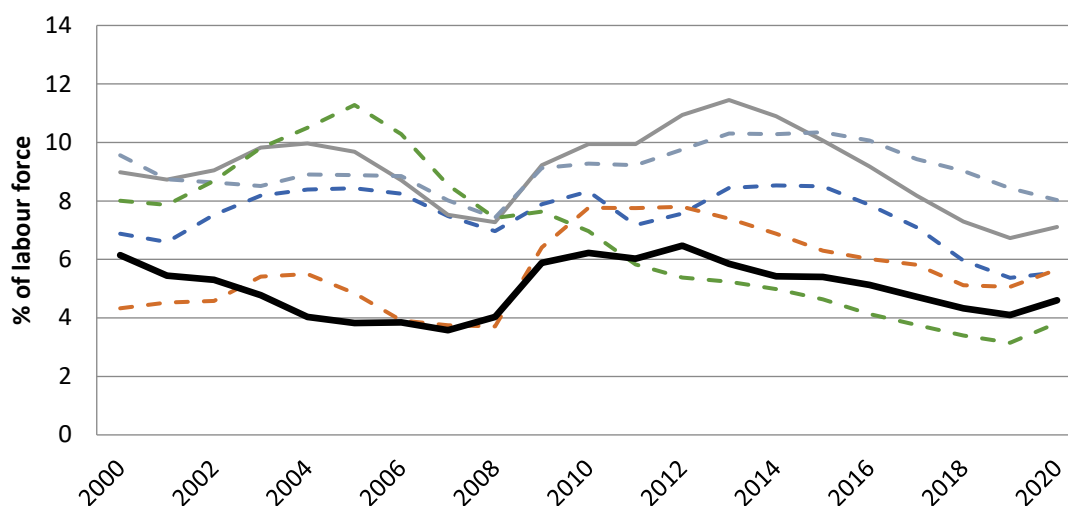
Relative to these comparator countries, New Zealand's unemployment rate was low from 2000 to 2020, ranging between 4% and 6%. Over the same period, the average unemployment rate for the European Union ranged from approximately 7% to 11%. In the past decade, only Germany's unemployment rate has been below that of New Zealand's, and only marginally so. The only other country to outperform New Zealand in terms of the annual unemployment rate was Denmark, for a few years in the early 2000s.

The picture is even clearer with respect to long-term unemployment. As a share of total unemployment, long-term unemployment in New Zealand was below that of all comparator countries for the entire period. The range for New Zealand was from approximately 9% to 20%. On the other hand, the average for the European Union ranged from approximately 34% to 50%.

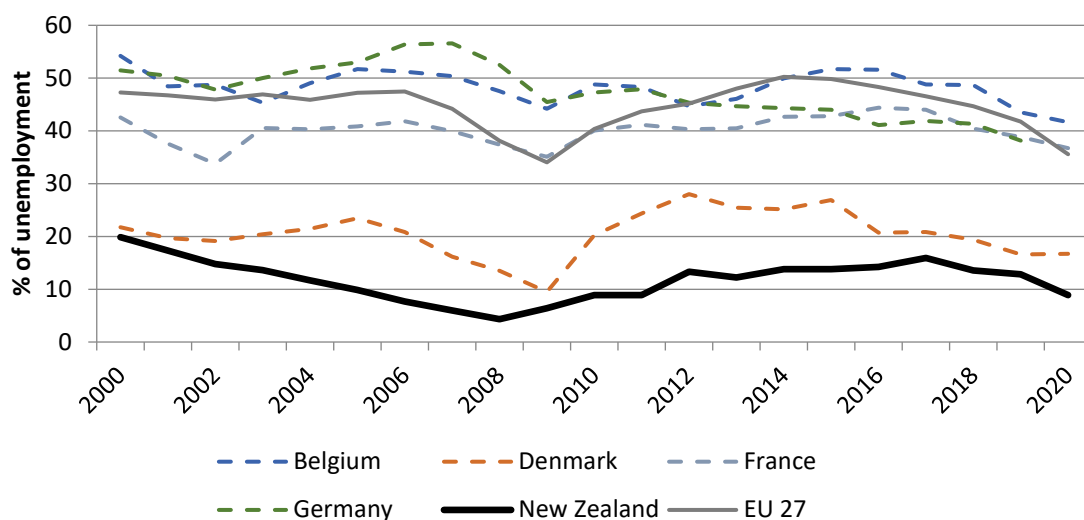
Based on this simple analysis, it seems as though the theory on unemployment insurance has significant predictive power. Of course, many far more rigorous empirical studies of the effects of UI on labour supply have been undertaken.

**Figure 9: New Zealand's labour markets perform well**

**Panel A: Unemployment rate, New Zealand versus selected countries, 2000 to 2020**



**Panel B: Long-term unemployment, New Zealand versus selected countries, 2000 to 2020**



Source: OECD.stat.



As well as reviewing the economic theory around unemployment insurance, Krueger and Meyer also summarised the empirical evidence available at the time. They concluded that the evidence does indeed show that unemployment insurance leads to longer unemployment spells. In particular, most estimates suggested that the elasticity of lost work or unemployment duration with respect to UI is around 1. That means an increase in either the level of UI benefits or the maximum duration of benefits of 10% leads, on average, to an increase in lost work of 10%.

Johannes F. Schmieder and Till von Wachter surveyed the more recent empirical evidence that came about with renewed interest in UI following the global financial crisis.<sup>11</sup> The most relevant findings are in two groups. First are those relating to studies on how maximum benefit duration affects labour supply and, second, those relating to UI benefit levels. This more contemporary survey draws conclusions broadly consistent with the earlier one from Krueger and Meyer.

With respect to the first group, most studies exploit changes in maximum potential benefit durations (PBD) and apply either difference-in-difference or regression discontinuity techniques to estimate the extent to which time out of work is affected. For European studies, the median elasticity of lost work with respect to changes in maximum PBD was 0.40, and ranged from 0.1 to 1. Estimates yielded from US studies were slightly lower.

For example, Thomas Le Barbanchon studied the impact of a large increase in PBD from 7 to 15 months in France using a regression discontinuity design.<sup>12</sup> The author found large positive effects on unemployment and non-employment duration. In particular, when jobseekers were entitled to 15 months of benefits instead of 7 months, because they crossed an 8-month past-employment entitlement threshold, their job finding rate slowed. This resulted in an increase of 2.5 months in registered unemployment duration and of 1.5 months in non-employment duration. Interestingly, this study also found very limited average effects of these generous unemployment benefits on eventual job match quality.

Another example is provided by David Card and Phillip Levine.<sup>13</sup> They examined the effects of a politically motivated programme that extended benefits by 13 weeks for a period of 6 months in the United States. State-level data and individual administrative records from before, during and after the introduction of the programme were used. While the fraction of claimants who exhausted their regular benefits was found to increase by only 1–3 percentage points, had the programme run long enough so that claimants were affected from the first day of their unemployment spell, the magnitude of the effect would have been 7 percentage points. Further, the average recipient would have collected benefits for an additional week.

Overall, the results of these newer studies found slightly smaller effects of maximum PBD on unemployment duration than the earlier survey by Krueger and Meyer (2002). However, as many were undertaken during the GFC, it raises the question of whether there is a cyclical component of labour supply responses to UI benefits.

The second group of empirical studies reviewed by Schmieder and von Wachter examined how unemployment duration is affected by UI benefit levels. For US studies, variation across states and over the business cycle is typically exploited (see, for example, Kory Kroft and Matthew Notowidigdo<sup>14</sup>).

Some of the most recent studies use kinks in benefit schedules to provide experimental estimates of the UI benefit effect (see, for example, David Card, et al.<sup>15</sup>). In total, 13 studies providing 18 elasticity estimates across 5 countries are covered. These vary from 0.1 to 2, but the median elasticity of lost work with respect to changes in benefit levels is 0.53.

It is interesting that the estimated elasticity of lost work with respect to UI benefit levels seems higher than those with respect to maximum PBD. A potential explanation is that responses to benefit level changes are more evenly distributed throughout the unemployment spell, whereas changes in PBD are subject to discounting and disproportionately affect those exhausting benefits.

Overall, however, it appears that in the case of unemployment insurance and labour supply, theory and a long-standing body of empirical research are in agreement. The existence of unemployment insurance increases the length of unemployment spells.

## Conclusion

It will be interesting to see the details of the government's proposed unemployment insurance scheme when they are finally released. Nevertheless, features of other UI schemes around the world do provide some indication of what to expect.

Regardless of the details, the conclusion is clear. Introducing unemployment insurance in New Zealand would be a mistake.

The reasons are simple. Well-functioning labour markets mean that any potential benefits from UI would be limited at best. New Zealand has relatively low unemployment and, in general, those who become unemployed do not stay so for long.

Furthermore, international evidence suggests that unemployment insurance creates perverse labour market incentives. These lead to higher levels of unemployment and for those who lose their jobs, more time spent in unemployment.

The fiscal costs of UI schemes are also substantial. Across advanced economies, the total of worker and employer contributions average 2.6% of payroll but can be as much as 8%.

Although little is known with certainty about the government's envisaged UI scheme, early indications are that it would replace 80% of lost wages upon unemployment, similar to ACC. This is very high by international standards. A proposal for a relatively generous UI scheme coupled with low estimated costs should be treated with a high degree of scepticism.

If UI is adopted, it may only be the beginning of the story. Once the scheme is implemented, it would be very difficult to unwind. Over time, there may be pressure to increase its benefits, relax eligibility conditions and widen coverage. Further, social insurance often expands to encompass areas such as health care and old age pensions, requiring even more social security contributions.

## Endnotes

- <sup>1</sup> See Katy Spencer, “Unemployment Insurance: What Can It Offer NZ?” (Wellington: New Zealand Productivity Commission, 2019); Productivity Commission, “Technological Change and the Future of Work” (Wellington: New Zealand Government, 2020); and Ministry of Business Innovation and Employment (MBIE), “Enhancing Support for Displaced Workers over the Medium Term: Work Stream Update for the Tripartite Forum” (Wellington: New Zealand Government, 2020).
- <sup>2</sup> David Law, “Short-time Work to Maintain Employment” (Wellington: The New Zealand Initiative, 2020).
- <sup>3</sup> See, for example, Johannes F. Schmieder and Till von Wachter, “The Effects of Unemployment Insurance Benefits: New Evidence and Interpretation,” *Annual Review of Economics* 8 (2016), 547–581.
- <sup>4</sup> Raj Chetty and Amy Finkelstein (2013) explore these issues and the evidence on them in detail. Raj Chetty and Amy N. Finkelstein, “Social Insurance: Connecting Theory to Data,” Chapter 3 in *Handbook of Public Economics* 5 (2013), 111–193.
- <sup>5</sup> See, for example, Martin Feldstein “Rethinking Social Insurance,” *The American Economic Review* 95:1 (2005), 1–24; Johannes F. Schmieder and Till von Wachter, “The Effects of Unemployment Insurance Benefits, op. cit.; and John Carter, Michel Bédard and Céline Peyron Bista, “Comparative Review of Unemployment and Employment Insurance Experiences in Asia and Worldwide (International Labour Organization, 2013).
- <sup>6</sup> A more detailed analysis is provided by Antonia Asenjo and Clemente Pignatti, “Unemployment Insurance Schemes Around the World: Evidence and Policy Options,” Working Paper 49 (International Labour Organization, 2019).
- <sup>7</sup> Alan B. Krueger and Bruce D. Meyer, “Labor Supply Effects of Social Insurance,” in Alan J. Auerbach and Martin Feldstein (ed.), *Handbook of Public Economics* (Elsevier, 2002), edition 1, volume 4, chapter 33, 2327–2392.
- <sup>8</sup> Dale T. Mortensen, “Unemployment Insurance and Job Search Decisions,” *Industrial and Labor Relations Review* 30:4 (1977), 505–517.
- <sup>9</sup> Robert Moffitt and Walter Nicholson, “The Effect of Unemployment Insurance on Unemployment: The Case of Federal Supplemental Benefits,” *The Review of Economics and Statistics* 64:1 (1982), 1–11.
- <sup>10</sup> U1 and U2 are what are known as utility or indifference curves. Each curve plots all the combinations of income and weeks of non-market time during the year that provide the same level of utility or happiness to an individual. An individual’s objective is to maximise their utility subject to a budget constraint, which occurs at the point at which the highest possible utility curve intersects a given budget constraint.
- <sup>11</sup> Johannes F. Schmieder and Till von Wachter, “The Effects of Unemployment Insurance Benefits,” op. cit.
- <sup>12</sup> Thomas Le Barbanchon, “The Effect of the Potential Duration of Unemployment Benefits on Unemployment Exits to Work and Match Quality in France,” *Labour Economics* 42 (2016), 16–29.
- <sup>13</sup> David Card and Phillip B. Levine, “Extended Benefits and the Duration of UI Spells: Evidence from the New Jersey Extended Benefit Program,” *Journal Public Economics* 78:1–2 (2000), 107–138
- <sup>14</sup> Kory Kroft and Matthew Notowidigdo, “Should Unemployment Insurance Vary with the Unemployment Rate? Theory and Evidence,” *The Review of Economic Studies* 83:3 (2016), 1092–1124.
- <sup>15</sup> David Card, Andrew Johnston, Pauline Leung, Alexandre Mas and Zhuan Pei, “The Effect of Unemployment Benefits on the Duration of Unemployment Insurance Receipt: New Evidence from a Regression Kink Design in Missouri, 2003–2013,” *American Economic Review* 105:5 (2015), 126–130.

## Bibliography

- Asenjo, Antonia and Clemente Pignatti. "Unemployment Insurance Schemes Around the World: Evidence and Policy Options," Working Paper 49 (International Labour Organization, 2019).
- Card, David and Phillip B. Levine. "Extended Benefits and the Duration of UI Spells: Evidence from the New Jersey Extended Benefit Program," *Journal Public Economics* 78:1–2 (2000), 107–138
- Card, David, Andrew Johnston, Pauline Leung, Alexandre Mas and Zhuan Pei. "The Effect of Unemployment Benefits on the Duration of Unemployment Insurance Receipt: New Evidence from a Regression Kink Design in Missouri, 2003–2013," *American Economic Review* 105:5 (2015), 126–130.
- Carter, John, Michel Bédard and Céline Peyron Bista. "Comparative Review of Unemployment and Employment Insurance Experiences in Asia and Worldwide" (International Labour Organization, 2013).
- Chetty, Raj and Amy N. Finkelstein. "Social Insurance: Connecting Theory to Data," Chapter 3 in *Handbook of Public Economics* 5 (2013), 111–193.
- Feldstein, Martin. "Rethinking Social Insurance," *The American Economic Review* 95:1 (2005), 1–24.
- Kroft, Kory and Matthew Notowidigdo. "Should Unemployment Insurance Vary with the Unemployment Rate? Theory and Evidence," *The Review of Economic Studies* 83:3 (2016), 1092–1124.
- Krueger, Alan B. and Bruce D. Meyer. "Labor Supply Effects of Social Insurance," in Alan J. Auerbach and Martin Feldstein (ed.), *Handbook of Public Economics* (Elsevier, 2002), edition 1, volume 4, chapter 33, 2327–2392.
- Law, David. "Short-time Work to Maintain Employment" (Wellington: The New Zealand Initiative, 2020).
- Le Barbanchon, Thomas. "The Effect of the Potential Duration of Unemployment Benefits on Unemployment Exits to Work and Match Quality in France," *Labour Economics* 42 (2016), 16–29.
- Ministry of Business Innovation and Employment (MBIE). "Enhancing Support for Displaced Workers over the Medium Term: Work Stream Update for the Tripartite Forum" (Wellington: New Zealand Government, 2020).
- Moffitt, Robert and Walter Nicholson. "The Effect of Unemployment Insurance on Unemployment: The Case of Federal Supplemental Benefits," *The Review of Economics and Statistics* 64:1 (1982), 1–11.
- Mortensen, Dale T. "Unemployment Insurance and Job Search Decisions," *Industrial and Labor Relations Review* 30:4 (1977), 505–517.
- OECD Economic Survey of Spain (2018).
- OECD.stat.
- Productivity Commission. "Technological Change and the Future of Work" (Wellington: New Zealand Government, 2020).
- Schmieder, Johannes F. and Till von Wachter. "The Effects of Unemployment Insurance Benefits: New Evidence and Interpretation," *Annual Review of Economics* 8 (2016), 547–581.
- Spencer, Katy. "Unemployment Insurance: What Can It Offer NZ?" (Wellington: New Zealand Productivity Commission, 2019).

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