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POLICY BRIEF

Effects of Unemployment Insurance Reforms in Brazil

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BRIEF HIGHLIGHTS

- *The Brazilian unemployment insurance (UI) program, established in 1990, is now the largest in Latin America.*
- *UI reforms in 2015 increased work experience eligibility requirements for first- and second-time UI applicants.*
- *Using program administrative data to count the number of prior UI spells, we estimate the reforms reduced layoffs, but by a smaller margin than found in earlier studies.*
- *We find reductions in layoffs are greater for workers with one prior UI spell than for first-time claimants.*
- *The reforms also reduced the likelihood separated workers were recalled to their prior employer, consistent with less employer-worker collusion to collect UI benefits.*

For additional details, see the working paper at https://research.upjohn.org/up_workingpapers/318/.

The Brazilian unemployment insurance (UI) program was established in response to a severe economic recession in the 1980s. It is now the largest UI program in the Latin America and Caribbean region, with more than 40 million beneficiaries between 2012 and 2016. Despite its size, the program operates in a labor market where more than one-third of all employees work in informal jobs not covered by UI. Because these latter workers receive no benefits when they are separated from their jobs, formal sector employment is desirable, and previous research has found significant flows of workers between the formal and informal sectors and back again, which UI receipt may facilitate. In particular, some employers may use UI to subsidize wages of workers they lay off and then recall after UI benefits end. Some laid-off employees even continue to work informally in their prior jobs while receiving UI benefits (Van Doornik, Schoenherr, and Skrastins 2017). Moreover, the UI program has historically been generous in terms of minimal eligibility requirements within the formal sector, which could further incentivize such back-and-forth flows.

These features have made Brazil's UI program relatively expensive, and when a recession in 2014 further increased costs, the Brazilian government instituted reforms in the eligibility rules to contain future costs. We investigate the effects of two such changes in UI eligibility rules in 2015 that increased the work experience requirements for first- and second-time UI applicants. While previous research estimated that these reforms significantly reduced layoffs (Carvalho, Corbi, and Narita 2018), our analysis, which relies on more complete administrative records, finds smaller overall reductions in layoffs, with somewhat larger decreases for workers with a single prior UI benefit spell.

A Natural Experiment

The recession that began in early 2014, coupled with the institutional features of Brazil's UI program described above, led to calls for reforming the system. Facing general budget difficulties and anticipating a significant rise in unemployment, Brazilian President Dilma Rousseff issued Provisional Measure 665 in late December of 2014, raising UI eligibility requirements for first- and second time-UI claimants, effective March 1, 2015. Soon thereafter, the legislature passed a new law codifying eligibility rules nearly as strict as the provisional measure, and this law took effect on June 17, 2015. Brazil thus experienced two sudden changes in UI eligibility rules in 2015, although these changes applied only for workers on their first or second UI application; rules for the third and subsequent applications were unchanged. Consequently, the reforms were targeted toward recent labor market entrants.

Specifically, the reforms increased the minimum number of months of employment workers needed before they would qualify for the shortest benefit duration on their first or second UI application. Prior to the first reform, any UI applicant who had worked 6 months in the prior three years could qualify for three months of benefits (first row of

Program costs rose sharply with the recession starting in 2014 as more unemployed workers with sufficient experience drew UI benefits.

Table 1 Months of Employment Required for UI Benefits, 1990–2017

Number of UI claim	Potential benefit duration	Law 7.998 (1990 to Feb. 27, 2015)	PM 665 (Feb. 28, 2015 to June 16, 2015)	Law 13.134 (from June 17, 2015)
First	Three	6		
	Four	12	18	12
	Five	24	24	24
Second	Three	6		9
	Four	12	12	12
	Five	24	24	24
Third or more	Three	6	6	6
	Four	12	12	12
	Five	24	24	24

NOTE: The table shows the number of months of formal employment required in the 36 months before UI application to be eligible for benefits, by number of UI claims and regime.
SOURCE: Authors' calculations from provisions in Law 7.998, PM 665, and Law 13.134.

Table 1). Under both reforms, first- and second-time UI applicants now needed longer recent work experience to qualify for the shortest potential benefit duration. For first-time claimants, for example, the new minimum potential benefit shifted from 3 to 4 months, but the required work period increased from 12 to 18 months under the first reform, before returning to 12 months under the second reform, a mere 4 months later. A summary of the work requirements for UI benefit eligibility under each set of eligibility rules is listed in Table 1.

Our evaluation focuses on short-tenure workers who were most affected by the changes in UI eligibility rules. Using data that contains tenure at the daily level, we contrast job layoff rates for a treatment group of workers with at least 6 and less than 7 months of job tenure against a control group of workers with at least 5 and less than 6 months of job tenure. Under the initial regime, the treatment group with 6 months of job tenure was eligible for 3 months of UI benefits but first- and second-time applicants became ineligible for any benefits under both reforms. We estimate how differences in layoff risk between the treatment and control groups vary across the different regimes, an approach called difference-in-differences. To isolate the impact of the reforms, we further adjust for differences across individuals in their geographic location, calendar month in the data, and demographic characteristics.

Effects on Layoffs

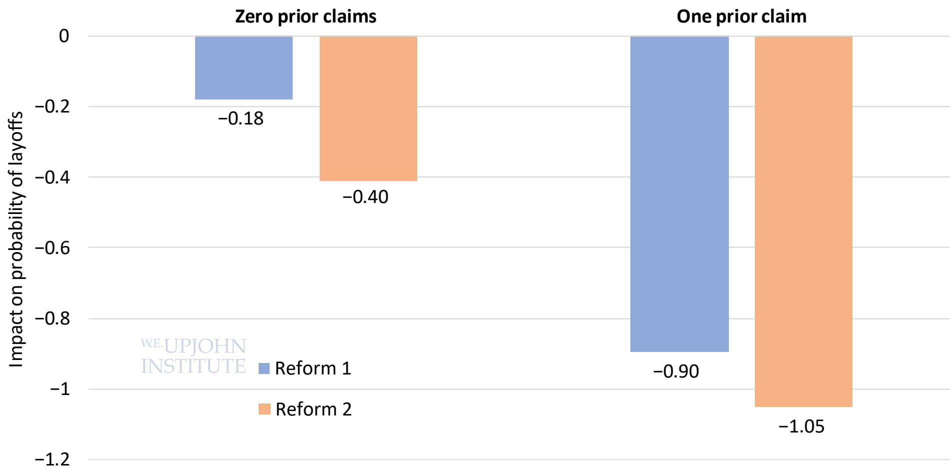
We find that the increase in work months needed for UI eligibility reduced employer layoffs. For short-tenure workers with no prior UI applications, the first reform reduced layoff risk by 0.18 percentage points (from a base layoff rate of 3.4 percent). The impact of the second reform was larger, cutting layoff risk by 0.41 percentage points relative to the period before either reform.

Among workers who had one prior UI application, the reforms had even stronger impacts, with the first reform reducing layoff risk by 0.9 percentage points (from a base layoff rate of 4.0 percent), and the second reform by 1.05 percentage points.

While sizable, these effects are smaller than those implied by earlier studies that did not have as detailed data on the number of prior UI applications. When we approximate the methodology of previous studies by not accounting for the number of prior UI spells, we estimate a layoff reduction from the first reform of 0.35 percentage points, much smaller than earlier estimates of 0.53 percentage points (Van Doornik et al. 2018) to 0.69 percentage points (Carvalho, Corbi, and Narita 2018).

Under both reforms, first- and second-time UI applicants now needed longer recent work experience to qualify for the shortest potential benefit duration.

Figure 1 Both Eligibility Reforms Reduced the Risk of Layoffs



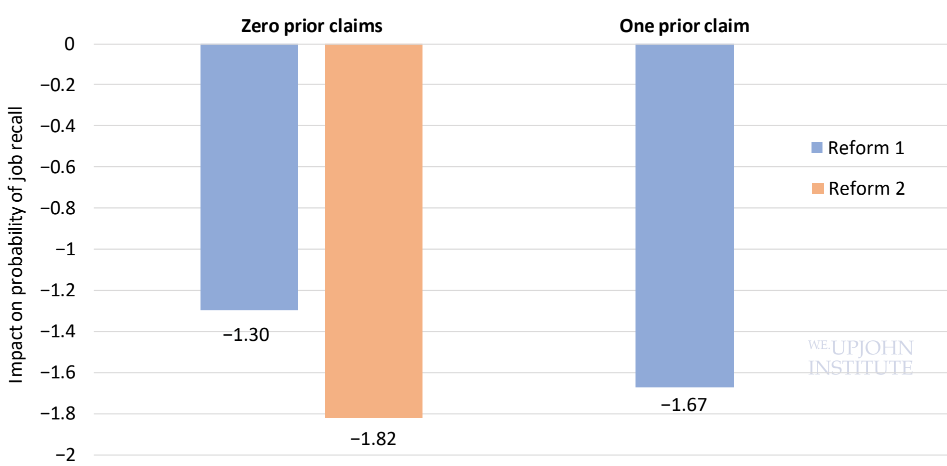
SOURCE: Authors' calculations.

Reduction in Collusion

In the United States, UI benefits are financed by experience-rated employer taxes that rise with total benefits paid to an employer's former workers. Perhaps unsurprisingly, layoffs are lower in states where UI taxes rise more quickly with experience-rating (Card and Levine 1994). In contrast, Brazilian UI benefits are financed from general revenues, and neither employers nor workers pay specific taxes to finance the program. Consistent with this lack of implicit penalty for heavily using the system, Brazilian UI benefits appear to subsidize the flow between low-wage, short-term jobs and informal sector jobs, in some cases back and forth with the same employer (Doornik, Schoenherr, and Skrastins 2017).

We find the eligibility reforms affected this behavior, too. For short-tenure workers with no prior UI claims, the probability of being rehired by the same employer within 4 to 10 months of layoff fell by 1.3 percentage points after the first reform and 1.8 percentage points after the second reform. For short-tenure workers with one prior UI

Figure 2 Both Eligibility Reforms Also Reduced Job Recall to the Same Employer



SOURCE: Authors' calculations.

Brazilian UI benefits appear to subsidize the flow between low-wage, short-term jobs and informal sector jobs, in some cases back and forth with the same employer.

claim, the first reform reduced recall to the same employer by 1.7 percentage points, an amount similar to workers with no prior UI claims. However, the second reform did not appear to affect recalls for these workers.

Conclusion

We confirm results of previous research that Brazil's 2015 increases in UI eligibility requirements reduced layoffs. However, our results indicate that previous studies overestimated these reductions, likely because they were unable to precisely measure individuals' prior UI requests, a key parameter undergirding the changes in requirements. When we account for prior UI requests, we find that changes in UI eligibility rules reduced the chance of layoff the most for workers with exactly one prior UI benefit receipt spell. Our results provide some evidence that restrictions on UI eligibility reduced collusion between workers and employers using UI benefits to subsidize wages.

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