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Effects of employment protection on worker and job flows: Evidence from the 1990 Italian reform ☆

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Abstract

This paper uses the Italian Social Security employer-employee panel to study the effects of the Italian reform of 1990 on worker and job flows. We exploit the fact that this reform increased unjust dismissal costs for businesses below 15 employees, while leaving dismissal costs unchanged for bigger businesses, to set up a natural experiment research design. We find that the increase in dismissal costs decreased accessions and separations for workers in small relative to large firms, especially in sectors with higher employment volatility, with a negligible impact on net employment. We also find some evidence suggesting that the reform reduced firms' entry rates and employment adjustments, but had no effect on exit rates.

JEL classification: E24; J63; J65
Keywords: Unjust Dismissal Costs; European Unemployment; Firms' Entry and Exit; Employment Volatility

1. Introduction

Theory makes clear-cut predictions on the effects of employment protection on labor reallocation in the medium– and long-run (see, e.g., Bertola, 1990; Hopenhayn and Rogerson, 1993). While a number of cross-country studies examine the impact of dismissal costs on aggregate and sectoral employment adjustments, few empirical studies use individual and firm

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level data to examine the impact of dismissal costs on worker and job flows. Moreover, the few studies which rely on microdata focus on the intensive margin of adjustment, and often ignore adjustments on the extensive margins through entry and exit.

In this paper, we use an Italian employer–employee panel to examine the effects of dismissal costs on worker and job flows. Italy is an interesting country to study these effects because it is one of the strictest countries in terms of employment protection legislation. More importantly, in 1990 Italy introduced a labour market reform which increased employment protection for workers employed under permanent contracts in businesses with fewer than 15 employees relative to those in businesses with more than 15 employees. We exploit the differential increase in the costs of unfair dismissals in small relative to large businesses after 1990 to study the impact of dismissal costs on labour flows. We use a differences–in–differences approach by comparing worker and job flows in small and large firms before and after the reform.

Our empirical analysis uses administrative data from the Italian Social Security Institute (INPS). Our data set is an employer–employee panel which includes information on: dates of hiring and separation of the worker; dates of incorporation and termination of the firm, and the annual average number of employees. We use these data to examine worker flows (i.e., accessions and separations), and job flows on the intensive (i.e., employment changes) and extensive (i.e., entry and exit) margins. We find that accessions and separations decreased by about 13% and 15% in small relative to large firms after the reform. The results are robust to the inclusion of time, sector and region effects, sector– and region-specific time effects, and size-specific cyclical effects. Moreover, we find evidence of a bigger effect of the reform in sectors where the variance of employment growth was larger prior to the reform, and thus where the increase in dismissal costs was likely to be binding. On the other hand, a simulation exercise based on a steady-state condition shows that the reform hardly affected net employment.

We then examine the impact on job flows and find evidence suggesting that the reform had some effect on the intensive and extensive margins of adjustment. In particular, we find some evidence that the reform decreased employment adjustments in small relative to large firms. We also find that small firms were less likely to enter the market compared to large firms after the reform. This is consistent with a rise of dismissal costs lowering the present value of the future stream of profits and leading to less entry. On the other hand, we find no differential effects on exit rates of small relative to large firms after the reform.

A number of studies have exploited the variation in employment protection legislation across firms of different sizes within Italy, but ours is the first study to fully exploit both the temporal and cross sectional variation in employment protection legislation with regards to the 15 employee threshold. Boeri and Jimeno (2005) assess the effect of employment protection on lay-off probabilities by comparing small and large firms. Borgarello, Garibaldi and Pacelli (2004), and Schivardi and Torrini (2004) evaluate the effects of employment protection on the size distribution of Italian firms, by looking at the probability of firm size adjustments around the 15 employee threshold.[1] These papers identify the effect of employment protection by exploiting the fact that Italian establishments with fewer than 15 employees are subject to lower dismissal costs than firms with more than 15 employees. This identification strategy assumes that small and large establishments are the same along any dimensions not observed by the econometrician (like, for example, different costs of capital due to the differential impact of borrowing constraints on firms of different sizes). By contrast, our differences–in–differences approach exploits the variation in

[1] Borgarello, Garibaldi and Pacelli (2004) also present some results exploiting the 1990 temporal variation in employment protection, but their sole focus is on the effect of employment protection on firm size.