ELSEVIER

Journal of Development Economics 75 (2004) 507–533

JOURNAL OF Development ECONOMICS

www.elsevier.com/locate/econbase

Nominal wage rigidities in Mexico: evidence from social security records☆

Sara G. Castellanos[a], Rodrigo García-Verdú[a], David S. Kaplan[b,*]

[a]Dirección General de Investigación Económica, Banco de México, Mexico
[b]Departamento de Economía and Centro de Investigación Económica, Instituto Tecnológico Autónomo de México (ITAM), Mexico

Abstract

This paper analyzes the existence and extent of downward nominal wage rigidities in the Mexican labor market using data from the administrative records of the Mexican Social Security Institute (IMSS). This establishment-level, panel dataset allows us to track workers employed with the same firm, observe their wage profiles and calculate the nominal-wage changes they experience over time. Based on the estimated density functions of nominal wage changes, we are able to calculate some standard tests of nominal wage rigidity that have been proposed in the literature. Furthermore, we extend these tests to take into account the presence of minimum wage laws that may affect the distribution of nominal wage changes. The densities and tests calculated using these data are similar to those obtained using administrative data from other countries, and constitute a significant improvement over the measures of nominal wage rigidities obtained from household survey data. We document the importance of minimum wages in the Mexican labor market, as evidenced by the large fraction of minimum wage earners and the indexation of wage changes to the minimum wage increases. We find considerably more nominal wage rigidity than previous estimates obtained for Mexico using data from the National Urban Employment Survey (ENEU) suggest, but lower than that reported for developed countries by other studies that use comparable data.

Keywords: Nominal wage rigidities; Mexico; Social security

☆ The views expressed herein are those of the authors and not necessarily those of Banco de México.

* Corresponding author.
E-mail addresses: sgcastel@banxico.org.mx (S.G. Castellanos), rgarciav@banxico.org.mx (R. García-Verdú), kaplan@itam.mx (D.S. Kaplan).

0304-3878/$ - see front matter © 2004 Elsevier B.V. All rights reserved.
doi:10.1016/j.jdeveco.2004.06.008

1. Introduction

There is a growing consensus about the importance of labor regulations and labor market policies in determining the productivity of labor itself as well as total factor productivity. While theory[1] and evidence[2] are increasingly pointing to the importance of a flexible labor market, the implementation of a labor reform to attain greater flexibility has been pending for the past two decades in Mexico and other Latin American countries. In fact, most of the labor regulations in this region date back to the first half of the 20th century and, while some countries have implemented partial reforms to increase the flexibility of their labor markets, these attempts have been halfhearted at best.[3]

The issue of labor market reform has become even more pressing in light of the increase in international competition from China and other South-East Asian countries, most of which have "at will" hiring and firing policies and thus very flexible labor markets. Furthermore, the United States and Canada—Mexico's main trading partners—, also have more flexible labor markets, with relatively few impediments to how labor is allocated within or between firms. This fact evidently places Mexico at a disadvantage relative to all these countries.

One reason why this fact could be ignored in the past is that real wages in Mexico displayed a remarkable degree of downward flexibility, which provided much of the correction needed to regain competitiveness. This adjustment typically came through unexpected increases in inflation, which induced sharp decreases in real wages. As the macroeconomic environment in the region has become more stable and inflation gradually converges to the levels of developed countries, this clearing mechanism is no longer available. Thus, flexibility in the labor market has become a much more important issue.

In this paper we focus on two particular types of labor regulation which may give rise to inefficiencies in the allocation of labor: downward nominal wage rigidity (DNWR) and minimum wages. Although these two topics have generally been treated separately in the literature, downward nominal wage rigidities cannot be analyzed independently of minimum wages in developing countries like Mexico, where the fraction of minimum wage earners is high relative to more developed economies and the practice of indexing wage changes to the minimum wage increases is pervasive.

The detection of nominal wage rigidities usually begins by estimating the probability density functions of wage changes over consecutive periods (typically a year) using panel data on individual workers or jobs. The existence of DNWR is then first established

[1] See Parente and Prescott (1994, 1999, 2000) and Prescott (1998) for a series of theoretical models and case studies that argue that regulations, including labor-market policies, can effectively block the adoption of more productive technologies and better organizational methods. See Lagos (2004) for a model in which the level of aggregate TFP is an explicit function of the economic environment in general and labor-market policies in particular.

[2] See Davis et al. (1996), Davis and Haltiwanger (1992, 1999), Haltiwanger (2000) and Foster et al. (2000, 2002) for empirical evidence on the importance of labor reallocation across firms, industries and sectors for productivity growth. Notice that this literature on job creation and job destruction uses the same type of establishment-level, panel data employed in this paper.

[3] See Edwards and Lustig (1997) and Heckman and Pagés (2004) for overviews of the impact of regulations on labor markets in Latin America.