Frequency of Wage Changes for New Hires

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https://www.pascalmichaillat.org/t5.html

Annual wages : significant rigidities in existing jobs
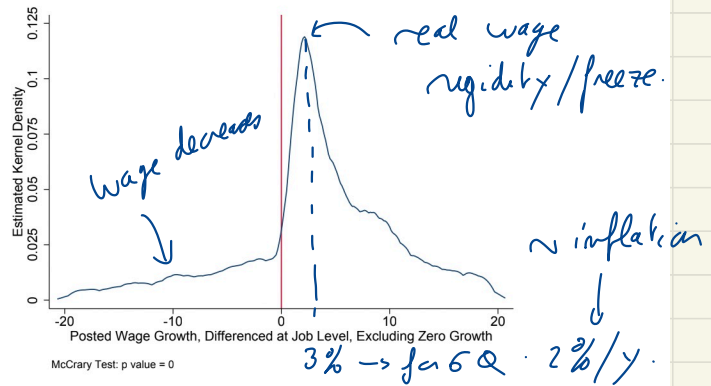- nominal wage freezes
- real wage freezes

Hazell & al (2022) : significant rigidities in posted wages

Table 3: Quarterly Probability of Nominal Posted Wage Change at the Job Level

1/ prob. change

per quark →

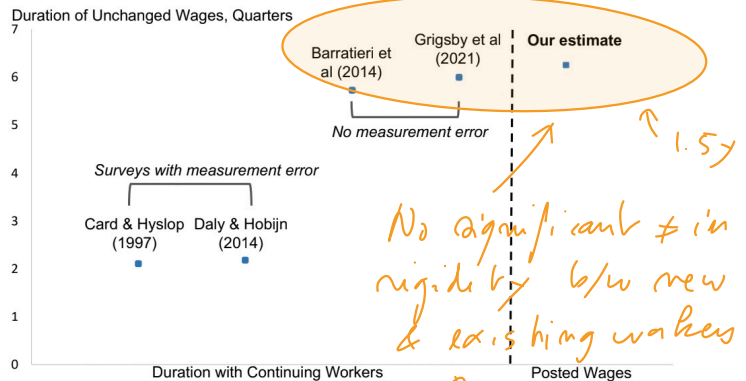|	Prob. Change	Duration of Unchanged Wages (quarters)	Prob. Decrease	Prob. Increase	Obs.
	(1)	(2)	(3)	(4)	(5)
Unweighted	0.14	6.44	0.03	0.11	1,663,578
Occupation weight	0.16	5.54	0.03	0.12	1,663,578
Region weight	0.14	6.23	0.03	0.10	1,663,578
No low wage jobs	0.15	6.00	0.03	0.11	1,206,508

(1.5) 0.03 20%   80%

Notes: we study the main sample of Burning Glass data. We estimate the probability of job-level wage change using a similar method to Nakamura and Steinsson (2008). We assume that the hazard rate of job change/increase/decrease is constant and identical for all jobs in the same 2 digit SOC code occupation. We then estimate the hazard rate of job change/increase/decrease by maximum likelihood. We then calculate the implied duration and probability of change/increase/decrease for each occupation, and then take the median across occupations, weighted by the number of vacancies. In Row (2), we reweight to target the distribution of jobs at the 6 digit SOC level from the 2014-2016 OES. In Row (3) we reweight to target the distribution of employment across states from the 2010 QCEW. In Row (4) we drop jobs in the bottom quartile of the wage distribution.

(handwritten annotations on graph)

real wage
rigidity / freeze.

wage decreases

~ inflation

3% → for 6Q · 2%/y.

McCrary Test: p value = 0

Posted Wage Growth, Differenced at Job Level, Excluding Zero Growth

Estimated Kernel Density

Notes: this graph is the distribution in the growth of nominal posted wages, excluding zeros, from Burning Glass. Wages are averaged by job and quarter. Wage growth is the growth in wages between two consecutive vacancies posted by the same job, measured in percentage points. The wage growth distribution is truncated at ±20%. Kernel density estimation uses an Epanechnikov kernel with a bandwidth of 0.65. The McCrary test tests the null hypothesis that the density function of wage changes is continuous at zero. The sample period is 2010Q1-2020Q2.

Figure 4: Duration of Unchanged Nominal Wage for Continuing Workers and Posted Wages

Duration of Unchanged Wages, Quarters

Barratieri et al (2014)

Grigsby et al (2021)

Our estimate

No measurement error

Surveys with measurement error

Card & Hyslop (1997)   Daly & Hobijn (2014)

Duration with Continuing Workers

Posted Wages

(handwritten annotations)

1.5y

No significant ≠ in
rigidity b/w new
& existing workers

Notes: this graph plots the implied duration for which wages are unchanged from four papers that study continuing wages using payroll and survey data, alongside our estimate for posted wages using Burning Glass data. The measure from Grigsby, Hurst, and Yildirmaz (2021) is for base wages and comes from Table 1 of the paper. The measure from Barattieri, Basu, and Gottschalk (2014) is adjusted for measurement error and comes from Table 6 of the paper.

Internal equity constraint   (Bewley)