

# DISCUSSION OF “THE DYNAMICS OF FIRM-LEVEL PAY: THEORY AND EVIDENCE FROM PORTUGAL”

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- Empirical evidence from Portuguese matched employer–employee data
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  - 2 AKM decomposition: compression in firm pay variance is the main driver
  - 3 Weaker pass-through from productivity to wages over time, particularly at the top
    - “Hockey-stick” relationship: flat at low-prod; increase at high-prod ranges
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- A theory of firm dynamics + monopsonistic labor markets
  - 1 Identify two key forces: minimum wage and labor market power
  - 2 Minimum wage itself explains ~ 50% of decline but impacts binding firms mostly
  - 3 Decline in labor market power (↓ variance of amenities) is a main driver of flatter wage profile

# COMMENTS

- Super interesting & a well-written paper. I learned a lot!
- Some comments:
  - 1 Big picture
  - 2 Validation of modeling assumptions and predictions
  - 3 Tighten the link between data and model through the key mechanisms
    - Decline in amenity dispersion and labor market power
    - Minimum wage effects

- How should we interpret firm pay compression?
  - 1 Minimum wage policy
    - Positive selection toward more productive firms
    - May reallocate workers toward firms with higher markdowns
    - Lower firm mass may increase overall markdowns for unconstrained firms
  - 2 Monopsony power ↓: lower markdowns, efficiency improving

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  - ② Monopsony power ↓: lower markdowns, efficiency improving
- Is the observed compression welfare enhancing or distortionary?
- The model can be pushed further to evaluate the minimum wage policy (within vs. cross firm)  
& to evaluate the contributions of minimum wage vs. labor market power changes to total welfare

# DECLINING AMENITY DISPERSION AND LABOR MARKET POWER

- Key: amenity variance  $\downarrow \Rightarrow \uparrow$  labor supply elasticity  $\Rightarrow \downarrow$  markdowns  $\Rightarrow$  flatter wage profile
- The relationship b/w amenity variance ( $\sigma$ ) and wage profile is model dependent

$$\varepsilon_j \sim \text{Gumbel}(0, \sigma), \quad P(i) \equiv \Pr(w_i + \varepsilon_i > w_j + \varepsilon_j) = \frac{1}{1 + e^{\frac{w_j - w_i}{\sigma}}} \Rightarrow \frac{\partial P(i)}{\partial w_j} = \frac{P(i)(1 - P(i))}{\sigma}$$

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- Alternatively, compensating differential models can create reverse direction
  - Greater amenity dispersion can even reduce wage gaps if high-paying firms also offer better amenities (Lamadon et al., 2022; Sockin, 2022)

# DECLINING AMENITY DISPERSION AND LABOR MARKET POWER (CONT'D)

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## In theory:

- Can “quantify” the role of  $\sigma$  (and labor market power) in accounting for firm pay compression
  - Current calibration targets late-period firm pay variance, so changes in  $\sigma$  mechanically absorb residuals not explained by minimum wage
- ⇒ Suggestion: discipline  $\sigma$  using independent moments (e.g., labor supply elasticities) and evaluate whether changes in  $\sigma$  quantitatively match firm pay compression, and its role relative to  $\underline{w}$

# DECLINING AMENITY DISPERSION AND LABOR MARKET POWER (CONT'D)

## In data:

- Is there direct evidence of declining amenity dispersion?
  - Amenities are highly dispersed across firms (Caldwell et al., 2025) and more dispersed than wage (Taber and Vejlin, 2020; Ouimet and Tate, 2023)
  - Any time trend evidence? (amenities may have become more differentiated, e.g., remote work, flexibility)
- Has labor market power actually declined in Portugal?
- Can you tie this to the observed patterns of declining firm pay variance and pass-through?
  - Reduced form evidence of the relationship b/w earnings variance, pass-through, and the degree of labor market power across labor markets (worker type, regions, sectors, etc)?

# THE EFFECT OF MINIMUM WAGE POLICY

- Minimum wage reduces wage dispersion, but mainly affects firms near the binding threshold
  - Top firms are largely insulated through local labor market competition
- Clarify how the results depend on underlying modeling assumptions
  - Gumbel/logistic structure governs local competition and spillovers; no on-the-job search
- Tighten link to empirical patterns and test the model predictions
  - Does MW mainly affect flattened regions but not upward-sloping regions in Figures 5–6?
  - Difference-in-differences around MW changes or heterogeneous exposure (sectors, regions, firms)

# MISC. COMMENTS

- Any possible alternative sources behind the decline in  $\gamma$ ?
  - The role of non-wage compensation? Total compensation gaps could still rise (Sockin (2022))
  - Measurement errors in productivity? Reverse causality?
  - Exogenous mobility assumption in AKM estimation (Card et al. (2013))
  - Industry effects? (Dunne et al., 2004; Haltiwanger and Spletzer, 2020; Haltiwanger et al., 2024)
  - Bootstrapping standard errors for the pass-through regressions (4), (5)
- Clarify the definition of  $\zeta_p$  in regression (5)
- Can we test the U-shaped relationship b/w productivity and markdown?
- How do firm dynamics respond to MW policy changes?
- Transition paths along the changes in MW?

# CONCLUSION

- Promising and exciting paper!
- It may be worthwhile to further:
  - Sharpen the big picture and aggregate implications
  - Discuss and validate the underlying assumptions and predictions
  - Tighten the connection between data and model through the key mechanisms
- Looking forward to future iterations & follow-up work!

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