# Discussion of Morlacco's Market Power in Input Markets: Theory and Evidence from French Manufacturing

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## Main questions and contributions

- Do importers have market power in their foreign purchases?
  - Develops theory on mark-ups and buyer power
  - Estimates output elasticities of foreign and domestic inputs
  - Calculates implied "buyer power" of French importers
- What are the welfare implications of this buyer power?
  - Adapts Hsieh and Klenow (2009) to include buyer power
  - Finds lower gains from trade due to new distortions

## 2 key assumptions in the paper

- Domestic input market is perfectly competitive so feasible to:
  - Estimate the firm's output market mark-up as

$$\mu_{it} = \frac{\theta_{it}^m}{\alpha_{it}^m}$$

Infer input market power in country x by comparing domestic versus foreign output elasticities to their shares

$$\psi_{\mathit{it}}^{\mathit{X}} = \frac{\theta_{\mathit{it}}^{\mathit{X}}}{\theta_{\mathit{it}}^{\mathit{m}}} \cdot \frac{\alpha_{\mathit{it}}^{\mathit{m}}}{\alpha_{\mathit{it}}^{\mathit{X}}}$$

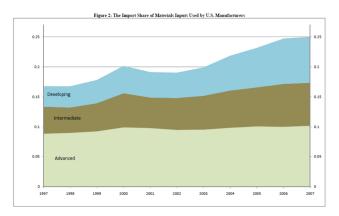
- 4 Holds firms' extensive margin sourcing decision fixed
  - No fixed costs of sourcing

## Comment 1: Why do firms import?

- To lower their marginal costs
   Amiti and Konings (2007); Gopinath and Neiman (2014); Halpern,
   Koren, and Szeidl (2015); Blaum, Lelarge, and Peters (2018); etc.
- To access higher quality inputs
   Verhoogen (2008); Eslava, Fielier, and Xu (2018)
- To access new inputs Goldberg, Khandelwal, Pavcnik, and Topalova (2010)
- In this paper...by assumption
  - Focuses only on firms that import from 3+ countries and export
  - Some substitutability between domestic and foreign inputs

# If firms import to lower MCs $\rightarrow$ lower foreign shares

 Houseman et al. (2010) show US productivity measures are biased up due to offshoring



Source: Houseman, Kurz, Lengermann, and Mandel (2010)

 If low MC countries have higher fixed costs, implies higher pricing power for larger, more productive firms

## Comment 2: Domestic shares decrease in firm size

 French importers' domestic input expenditure shares seem to be flat/decreasing in firm size

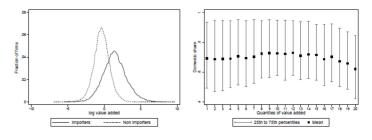


Figure 2. Domestic Shares and Firm Size

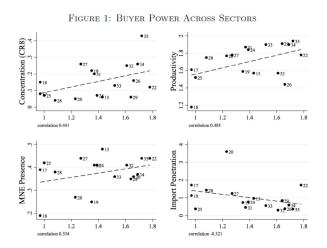
Source: Blaum, Lelarge, and Peters (2018)

• How do firm shares differ conditional on sourcing strategies?

# Comment 3: What is the source of market power?

- Firms have market power only in foreign markets
- My prior: Big firms have more market power in domestic markets
  - Exporters are big and sell to many domestic and foreign customers
  - ▶ Domestic suppliers are smaller on average, with fewer customers
- Bernard, Moxnes, and Ultveit-Moe (2018) find that:
  - The top 10% of Norwegian exporters to an OECD country account for 90% of exports to that country
  - Over 90% of export value is by exporters with multiple foreign customers in a country
  - Within a market, exporters that sell more have more customers
  - Median exports by customer not increasing in no. of customers
- Kikkawa, Magerman, and Dhyne (2019) find that suppliers' mark-ups are increasing in their average customer-specific shares
- Source crucial for understanding sources of misallocation

### Some intuition on the source



• What does the model predict for output mark-ups?

# Comment 4: Reduced-form evidence on buyer power?

- Exploit differences in market power across foreign sources?
  - Use Comtrade data to assess French market share
  - Calculate average unit values by import country
  - Are unit values negatively correlated with shares?
- Exploit differences in market power across HS products?
  - More buyer power in industries w/out persistent relationships?

Table 4: Stay Shares, Selected HS2 Industries

Panel A: Stay Shares (Weighted)

	Panel A: Stay Snares (Weighted)	
HS2	Description	Stay Share
52	Cotton	0.05
54	Man-Made Filaments (Textile)	0.08
51	Wool/Animal Hair/Yarn/Fabric	0.09
22	Beverages, Spirits and Vinegar	0.85
40	Rubber and Articles Thereof	0.87
86	${\it Railway\ Locomotives/Rolling-Stock/Fixtures\ etc.}$	0.99

Source: Monarch (2018)

- Does buyer power affect relationship type (as in Heise et al. 2017)?
- Use RF evidence to identify comparison group operating under PC

# Measuring misallocation: What is productivity?

- Revenue productivity (TFPR) is really profitability
  - Industry-level output price deflators
  - Industry-level input price deflators
- Physical productivity (TFPQ) closer to production efficiency
  - Usually just have output unit values
  - Still cannot observe quality
- Sometimes the distinction is irrelevant
  - TFPR and TFPQ are correlated in the data
  - Foster, Haltiwanger, Syverson (2008) show young firms have high TFPQ but low TFPR
  - Pierce (2011) finds firms that win anti-dumping cases see TFPR ↑, but TFPQ ↓
- Here, clever use of trade data to "correct" for firm-specific prices

## Comment 5: Internal consistency across sections

- Adapts Hsieh and Klenow (2009) to include buyer power
  - ▶ TFPR should be equalized across firms
  - High TFPR firms should be bigger
- Uses first section estimates to quantify costs of misallocation
- But Haltiwanger, Kulick, and Syverson (2018) show that HK 2009
  - Only works under CES
  - Only works under constant returns to scale
- TFPR will differ in a world with fixed costs
  - Dispersion no longer equates misallocation
  - Seems important for modeling import behavior

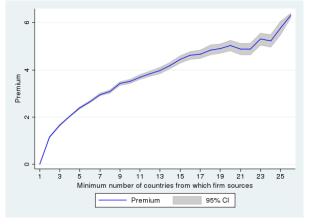
#### Is there reduced-form evidence of mechanism?

- Model predicts firms too small when sourcing with buyer power
  - Firms substitute foreign inputs with domestic inputs
  - Generally, substitute towards no buyer power inputs
- Use panel data on extensive margin importing changes
  - Shocks to industries or countries that change firm sourcing
  - Expect a scale effect
  - Is the scale effect mitigated when firm has market power?
- Differential response of size versus productivity?
  - Model predicts TFPR increases relatively more than size
  - Evidence of this?
  - Super cool to show TFPR vs. TFPQ responses!

More thoughts for the author...

#### Comment X: Selection

All the estimates are based on firms that import from 3+ countries
 Sales premia and minimum number of source countries



### Comment X: Use of $\theta$

- I agree  $\theta$  is a great letter!
- Section 2:  $\theta_{it} \equiv \frac{\partial X_{it} V_{it}}{\partial V_{it} Q_{it}}$
- Section 3:  $\theta_{it}^{j}$  are firm-time fixed effects
- Section 4:  $Q = \prod_{s=1}^{S} Q_s^{\theta_s}$

#### Comment X: Fred's last name

Warzynski not Warzynsky (Table 5 notes)