The Impact of Brexit on UK Firms

Bloom, Bunn, Chen, Mizen, Smietanka & Thwaites

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PLAN FOR THIS DISCUSSION

- General perspective on economic impact of Brexit vote
  - Draw on some insights from my own research
- Use this as point of departure for my comments on the paper
  1. Effect of the exchange rate depreciation
  2. Capital vs. labor
  3. Brexit preparation and productivity

HOW DO ECONOMISTS THINK ABOUT BREXIT?

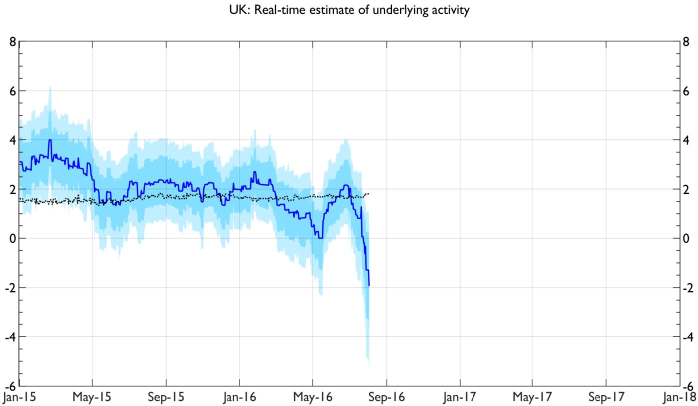
- Useful to broadly separate by frequency:
  - Short-run adjustments to Brexit news/uncertainty
  - Long-run effects, new 'steady state'

WHAT HAVE WE LEARNED?

- Plenty of work on long-run consequences:
  - Typically static trade models with steady-state comparisons
  - It remains to be seen how long-run consequences play out
- In my view, initially rather poor track record in assessing short-run effects
  - Subsequent efforts to investigate short-run adjustments in more detail has given us a much better understanding
- I see the paper as a strong contribution to a better understanding of the economic adjustment to the referendum

THE SHORT RUN

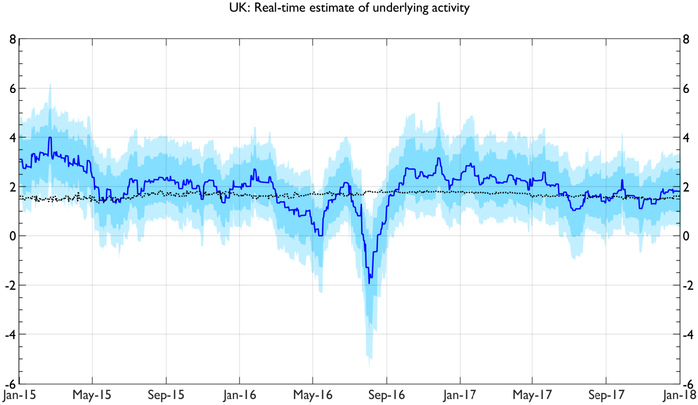
REAL-TIME ESTIMATE OF UK ACTIVITY AS OF AUGUST 2016



- Using nowcasting methodology of Antolin-Diaz, Drechsel, and Petrella (2017)

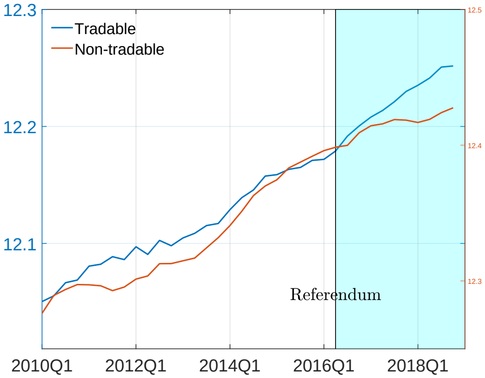
THE SHORT RUN

REAL-TIME ESTIMATE OF UK ACTIVITY THROUGH TO JAN 2018



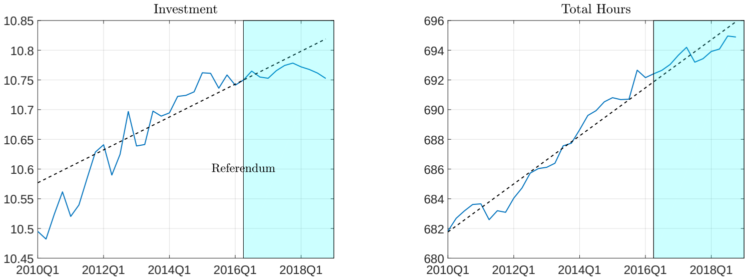
- Strong labor market data led nowcasts to bounce back

SO WHAT HAPPENED? (1/2)



- "Sweet spot" in tradable sector, following a sharp sterling depreciation
- See detailed discussion in Broadbent, Di Pace, Drechsel, Harrison, and Tenreyro (2019)

SO WHAT HAPPENED? (2/2)



- Flattening investment, but robust labor market
- See detailed discussion in Broadbent, Di Pace, Drechsel, Harrison, and Tenreyro (2019)

UNDERSTANDING THE ADJUSTMENTS

- In Broadbent et al. (2019), we show that the macroeconomic adjustments can be interpreted through the lens of a simple two-sector small open economy model
  - News about a future slowdown in productivity growth in the tradable sector
- This paper: provides extremely valuable microeconomic evidence of the adjustment to Brexit news/uncertainty!
  - The current results in the paper are highly insightful
- Overall theme of my comments: can the data be used to inform us more directly about the adjustment mechanism?

COMMENT 1: EXCHANGE RATE DEPRECIATION

- GBP fell by 20% vis-a-vis the USD in the six months following the referendum
  - As argued above, macro data indicates that this helped with a soft landing of UK activity in the short run
- I would be keen to know whether we can understand the degree to which the depreciation has alleviated the negative impact of Brexit uncertainty
  - Could be additional subsection + set of results in the paper

COMMENT 1: EXCHANGE RATE DEPRECIATION

- Authors generally use interaction of firm-level uncertainty with post-referendum year dummies (as well as time fixed effects), so any exchange rate variation is fully absorbed
- Could add the following triple interaction:

$$U_i \times Post_t \times s_i$$

  where s_i is firm i's share of exports going to non-EU
- Idea is that Brexit uncertainty depreciates GBP against non-EU currencies more than against EU currencies (EUR)

COMMENT 1: EXCHANGE RATE DEPRECIATION

- I am not 100% sure whether s_i can be constructed from survey + FAME (also: it would not allow using the EU-sales share as an IV, but could use alternative instruments)
- If feasible, it is an intriguing interaction to include:
  - On LHS: investment, employment, TFP, etc.
  - Expect negative sign on the triple interaction
  - Would allow you to quantify the degree to which tradable "sweet spot" has muted the negative effects of uncertainty
  - Could compute counterfactual: how much larger would the effects be in the absence of the sterling depreciation?

COMMENT 2: CAPITAL VS. LABOR

- Paper finds that Brexit uncertainty generates meaningful decline in investment but essentially no effect on employment
- At the same time, '*share of EU migrants in workforce*' strongly associated with firm-level Brexit uncertainty in the first place
- Highly intriguing finding!
    - Also consistent with macro patters I showed above
- Currently almost no discussion of this in the paper
    - Can this result be opened up further?

COMMENT 2: CAPITAL VS. LABOR

- First of all, some small concerns:

Table 3: Impact of the Brexit process on investment and employment

Dependent variable:	Investment growth			Employment growth		
All equations estimated 2011-2018	(1)	(2)	(3)	(4)	(5)	(6)
	OLS	OLS	IV	OLS	OLS	IV
Brexit exposure*all years post referendum	-2.749***		-6.245**	-0.230		-0.856
	(0.896)		(2.937)	(0.207)		(0.678)
Brexit exposure*2016 dummy		-2.993**			-0.166	
		(1.356)			(0.292)	
Brexit exposure*2017 dummy		-2.081*			-0.296	
		(1.194)			(0.267)	
Brexit exposure*2018 dummy		-3.215**			-0.226	
		(1.272)			(0.244)	
Time fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Firm fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Observations	21,537	21,537	21,537	35,499	35,499	35,499

- Looks like for investment lots of observations drop out
- My suspicion: as investment is lumpy and you compute growth rates, a lot of firms with zero initial investment that drop out
- It would be good to ensure we are looking at the same firms
- Even for the same firms, should also bear in mind that you are comparing growth rates of a flow vs. a stock variable

COMMENT 2: CAPITAL VS. LABOR

- Absent issues above, can you investigate further what drives investment and employment adjustments to Brexit vote?
  - Must be affected by input substitutability, irreversibility, ...
- Specifically, I would love to see regressions *without* firm-fixed effects, which would reveal the variation in the cross section
- When removing the fixed effects, you could again add triple interactions with relevant characteristics:
  - Size, capital intensity, industry dummies for industries with high/low substitutability, ...

COMMENT 3: BREXIT PREP

- In principle, Brexit preparation could be pure resource cost, but also benefit other firms that sell 'preparation services'
- The latter interpretation could even imply that Brexit preparation leads to a booming economy
- The paper's results point to the former interpretation:
  - Firms (CFOs) spend significant work hours on preparing
  - Preparation is associated with lower firm-level TFP

COMMENT 3: BREXIT PREP

- Again, it should be possible to dig deeper:
  - Very speculative thought: is the Brexit preparation associated with the absence of the employment reduction?
  - Could interact U_i with CFO hours spent on preparation, in a regression with employment on LHS, without firm fixed effects
- In terms of framing, the paper could stress explicitly that the survey evidence contradicts a more benign view of preparation in the short run
  - See for example paper by Alessandria and Mix (2019)

BOTTOM LINE

- Very insightful paper: allows us to understand in detail how firms respond to Brexit uncertainty
- The suggestions above could help to further tease out the precise adjustment mechanisms that underlie UK macroeconomic dynamics since the June 2016 referendum

A QUOTE TO TAKE TO LUNCH

"In economics, things take longer to happen than you think they will, and then they happen faster than you thought they could."

Rudi Dornbusch

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