Discussion of "Language Frictions in Consumer Credit" & "Price Discrimination and Mortgage Choice"

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The views expressed do not necessarily represent those of the Federal Reserve

Homeownership rates are much lower for LEP households

FIGURE 14



Homeownership Rates among Households Who Do Not Speak English at Home

Source: 2017–21 American Community Survey. Note: EP = English proficient; LEP = limited English proficient.

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Do language barriers reduce access to credit?

- If so, translating documents (application form, disclosures, etc.) to other languages *might* help
 - Loan officers may be important (e.g. Frame, Huang, Mayer, and Sunderam 2022)
- Natural experiment: What happens after FHFA Language Access Plan is implemented in 2018?
 - More mortgage applications from LEP populations?
 - Better mortgage terms for LEP borrowers?

Impressive empirical work!

- Uses many datasets
 - NSMO, ACS, HMDA, GSE,...
- ML techniques to identify LEP applicants
- Natural experiment is compelling
- Looks at a large set of outcomes

NSMO results: Large effects on LEP interest rates

Table 6. Effe	ect on Inter	rest Rate a
Sample	All	Purchase
	(1)	(2)
		Pai
LEP \times Hispanic \times Post	-0.149^{**} (0.074)	-0.165^{*} (0.096)
		D 14

NSMO results: Large effects on LEP interest rates

Table 6. Effect on Interest Rate a		Table 4. LEP State	us, Interest	Rate, and	
Sample	All	Purchase		(1)	(2)
	(1)	(2)			Panel A.
		Pai	LEP	0.032***	0.029**
LEP \times Hispanic \times Post		-0.165*		(0.010)	(0.010)
	(0.074)	(0.096)		D	D D O

• Implausibly large? Effect is about 5x larger than the average rate difference for LEP borrowers

HMDA⁺ results

Table 11. Effect on Interest Rate, Discou					
Sample	Purchase	First borre			
	(1)	(
LEP \times Hispanic \times Post	-0.035***	-0.05			
	(0.009)	(0.0			
Implied lower bound	-0.049	-0.			
Observations	3,877,813	1,680			
	E .				

- Plausibility: What is the pretreatment LEP rate gap?
- Assessing the magnitude:
 - How much would it cost someone to buy down their rate 5 basis points?
 - ➤ About 0.2 0.25 "discount points"
 - ≻ or, \$400-\$500

Effects on homeownership?

Dependent variable	# Applications $(10K)$	Share of incomplete app.	Denial rate	# Originations (10K)		
	(1)	(2)	(3)	(4)		
	Panel A. Conventional purchase loans					
LEP share \times Post	0.121**	-0.062***	-0.155***	0.089**		
	(0.060)	(0.022)	(0.041)	(0.044)		
Observations	$25,\!225$	25,225	25,225	25,225		

Table 8. Effect on Mortgage Credit Access

- Are LEP families more likely to become homeowners?
 - Could test directly using ACS data

Two other comments/suggestions

- Measuring points in HMDA
 - Be sure to account for "lender credits"
 - Look at "net origination fees" instead of discount points:
 Net origination fees = origination charges lender credits
- Measuring LEP in NSMO
 - Speaking English at home (X82) appears uncorrelated with your LEP measure (based on X14)
 - Suggests yours is a noisy measure of LEP status?
 - ➢ Results robust to using X82? If not, why not?

Do mortgage borrowers in the UK choose the lowest cost mortgage?

- Fascinating data
- Clever empirical work
- Great to see studies of major markets outside U.S.

UK mortgage market differs sharply from U.S.

- No 30-year fixed rate mortgage
- Most people get a "hybrid adjustable rate"
 - Fixed for 2, 3, or 5 years, then floating
 - Large penalties for pre-paying within the fixed-rate window
- Several consumer protections not present in the U.S.
 - Banks must offer same menu to all borrowers
 - Fiduciary standards for loan brokers

Borrowers face many options

Table 1: Example of products on offer								
	Initial rate (%) Fee (£) Reset rate (%) Max LTV (%) Max loan (£000)							
Bank A	3.39	999	3.94	90	400			
Bank A	3.59	1,499	3.94	90	400			
Bank A	3.64	999	3.94	90	400			
Bank A	4.15	0	3.94	90	400			
Bank A	4.15	599	3.94	90	400			
Bank A	4.19	599	3.94	90	400			
Bank A	4.19	399	3.94	90	400			

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Bank A	4.19	599	3.94	90	400	
Bank A	4.19	399	3.94	90	400	
Bank B	3.29	0	3.99	90	500	
Bank B	4.99	999	3.99	90	750	
Bank B	4.99	1,264	3.99	90	750	
Bank B	3.94	1,260	3.99	90	1,000	
Bank B	3.99	1,260	3.99	90	1,000	
Bank B	4.54	265	3.99	90	1,000	
Bank B	4.59	0	3.99	90	1,000	

Do mortgage borrowers in the UK choose the lowest cost mortgage?

• Which metric should we focus on?



- "Strongly dominated" choices are prevalent
 - This metric seems compelling: clear-cut, costly mistake

Rich get richer

	Strongly dominated choice				
	Within	Within	Across	Across	
	(5)	(6)	(7)	(8)	
Young	0.022***	0.010***	0.043***	0.015^{***}	
	(0.001)	(0.001)	(0.001)	(0.001)	
Old	-0.022^{***}	-0.006^{***}	-0.075^{***}	-0.036^{***}	
	(0.001)	(0.001)	(0.001)	(0.001)	
First-time buyer	0.010***	-0.002^{***}	-0.003***	-0.030***	
	(0.001)	(0.001)	(0.001)	(0.001)	
Poor	0.007***	0.008***	0.034***	0.010***	
	(0.001)	(0.001)	(0.001)	(0.001)	
Rich	-0.010^{***}	-0.010***	-0.043^{***}	-0.029^{***}	
	(0.001)	(0.001)	(0.001)	(0.001)	
Bad tail					
Strongly dominated tail		0.382***		0.870***	
		(0.001)		(0.002)	