Macroeconomic Risk and Idiosyncratic Risk-Taking

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Discussion AFA 2018

Loualiche – Minnesota

Research question

- Great paper: burgeoning field at the intersection of corporate finance and asset pricing
- Ambitious: authors are trying to answer a novel and hard question
- Polished ... almost too polished (the paper has been published since it was submitted)

Research question

Aggregate Risk and Corporate Decision

- Broad question: how do agency conflicts respond to changes in aggregate market conditions.
- Narrow question: how does risk-shifting respond to changes in aggregate market conditions.

Why this is important

- Broad new agenda in corporate finance if we acknowledge *time varying discount rates*
  - we need to revisit corporate theories usually based on static valuations
  - e.g. how do agency conflicts generally move with discount rates, does it matter at all?
- Implications for corporate finance and the macroeconomy
  - some classic trade-offs are not always operative
  - dampening or amplification of aggregate shocks through corporate financial decisions

This paper

This Paper:

- How does risk shifting varies with macro shocks
- Does it amplify risk in times of high risk premia?

Capturing the trade-off costs of risk-shifting

- Dynamic structural estimation of firm financing
- Estimate four "deep" risk shifting parameters
  - Cost of risk regime shift: η, ξ^+, ξ^-
  - Increase in idiosyncratic risk ϵ

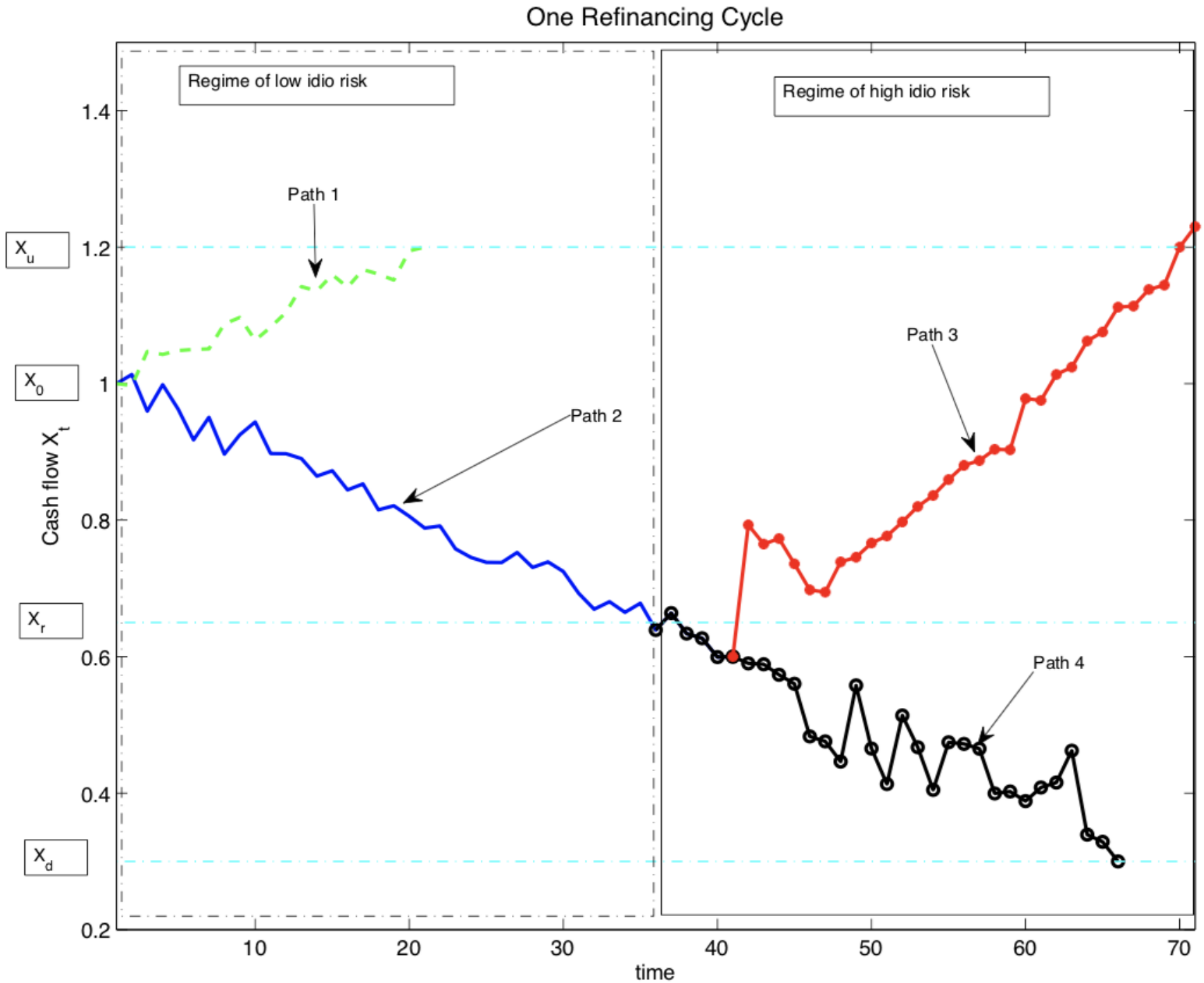
Implications

- Impact of idiosyncratic risk across firms: aggregate idiosyncratic risk high in bad times
- Link between idiosyncratic risk and expected returns

Roadmap

- Dynamics of risk shifting
- Estimation
- General view on aggregate market conditions and corporate finance decisions
- General equilibrium?

Refinancing Cycle



Estimation

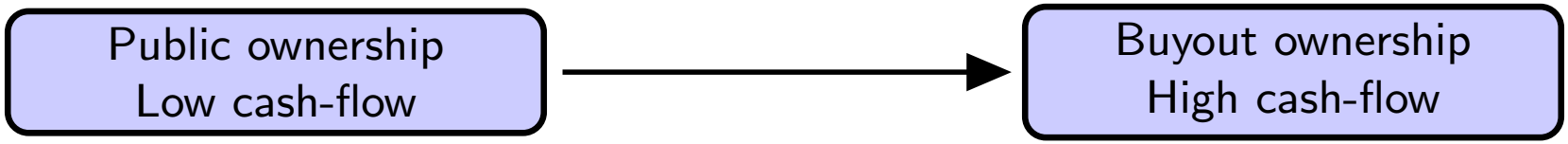
Reduced form model of risk shifting

- Three Main parameters: cost of risk-shifting η, ξ^+ and ξ^-
  - η value destroyed through risk-shifting
  - ξ^+, ξ^-: upfront costs of changing regime
  - ϵ idiosyncratic volatility increment

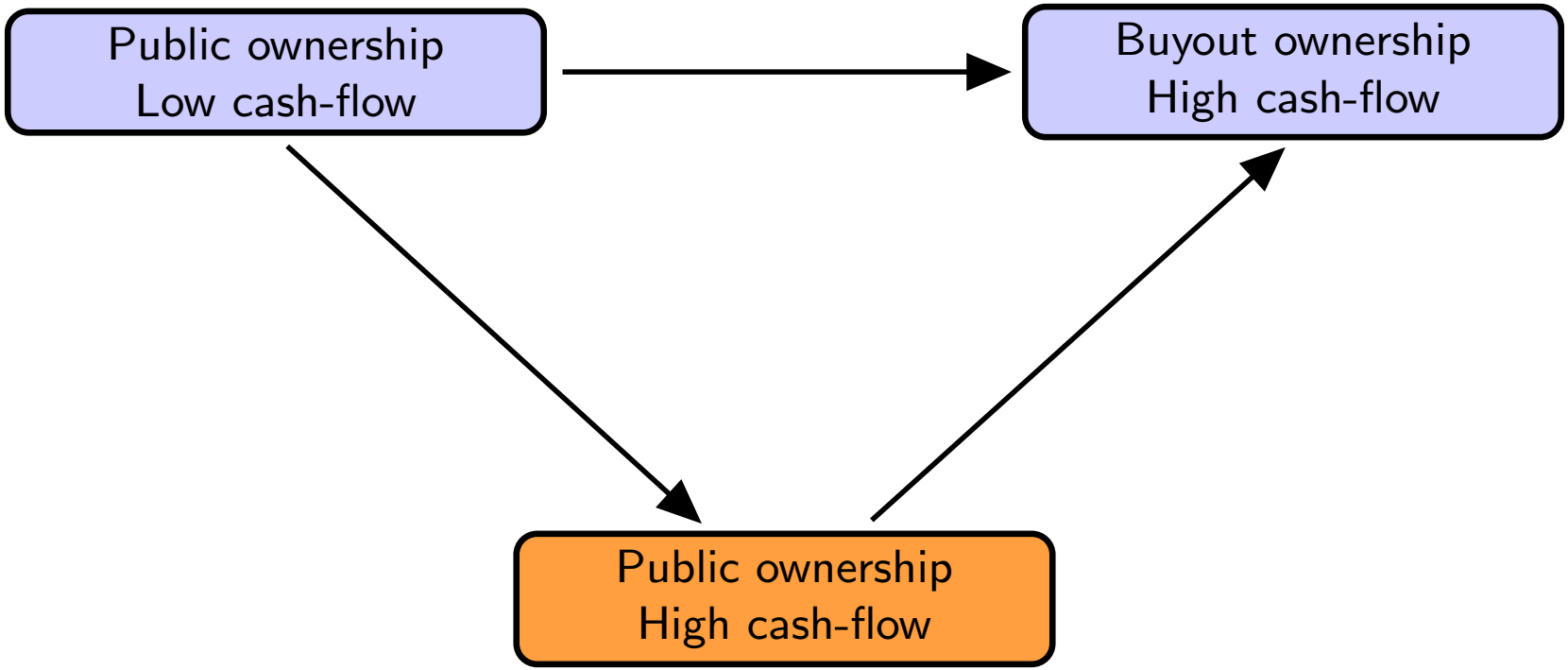
Moments matching

- Matched moments:
  - cash-flow volatility process and interaction of two processes
  - leverage process
  - elasticity of cash-flow volatility to financial leverage
- cross-sectional dispersion in cash-flow volatility: risk shifting level
- first order auto-correlation: risk-shift on/off
- cash-volatility elasticity to financial leverage: risk-shift cost parameter

Corporate Transaction Decomposition



Corporate Transaction Decomposition



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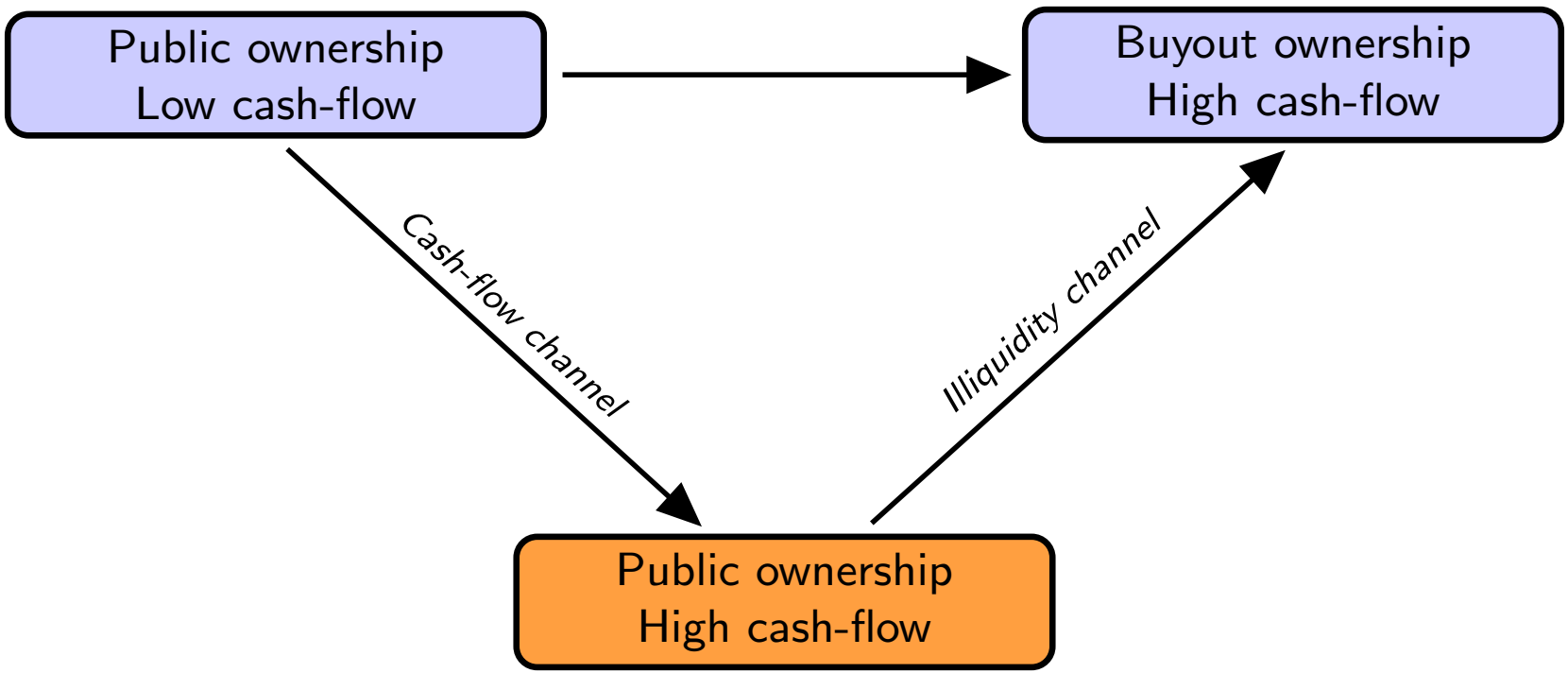

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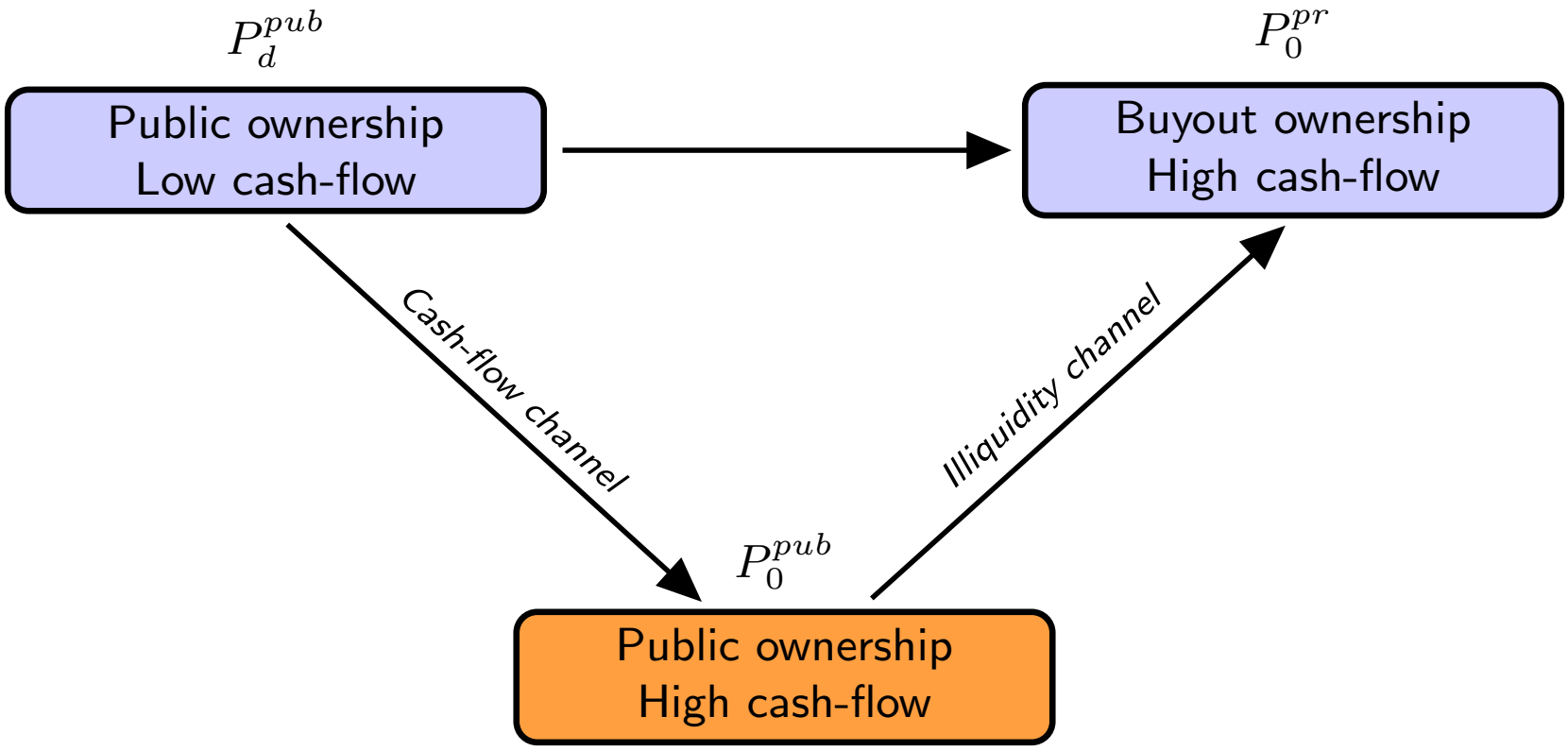

Corporate Finance Decisions and Aggregate Market Conditions

Haddad, Loualiche, & Plosser, JF 2017

Panel A: Volume								
	M&A					LBO / M&A		IPO
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
$\hat{rp}_{OLS}$	-0.054***	-0.052***	-0.054***	-0.054***	-0.052***	-0.032**	-0.054***	0.0087
	(0.0062)	(0.0065)	(0.0061)	(0.0078)	(0.0071)	(0.015)	(0.018)	(0.026)
EBITDA Spread		0.058*			0.033		0.14**	
		(0.033)			(0.038)		(0.070)	
HY Spread		0.027*			0.0040		0.15**	
		(0.015)			(0.025)		(0.061)	
GZ Spread		0.00024			-0.015		0.13	
		(0.047)			(0.040)		(0.082)	
GDP Growth			-0.55		-0.82		13.9***	
			(2.44)		(2.75)		(3.96)	
CE Fund Discount				0.015*	0.014		0.010	
				(0.0083)	(0.0100)		(0.020)	
Sentiment				0.059	0.064		-0.12	
				(0.081)	(0.073)		(0.097)	
Observations	123	123	123	120	120	116	113	164
R^2	0.456	0.488	0.457	0.475	0.491	0.079	0.242	0.007

General Equilibrium

Going further

- Clustering of risk shifting, amplification of risk into cash flows
- Implications for SDF, link to factor structure in idiosyncratic volatility
  - Alternative to some of the stories to rationalize *Herskovic, Kelly, Lustig, & Van Nieuwerburgh*
- Revisiting the cost of agency: private cost and social cost might different due to aggregation

Agency Conflicts

- Aggregate market conditions act as catalyzer of importance of agency conflicts.
- Synchronize firm actions, lead to amplification (or dampening) of PE costs
- Reevaluate the cost of agency conflicts accounting for aggregate effects

Conclusion