

# Exchange Rate Management and Crisis Susceptibility: A Reassessment

Atish R. Ghosh, Jonathan D. Ostry , Mahvash S. Qureshi

Discussant comments: Ila Patnaik

National Institute of Public Finance and Policy

## Summary of the paper

- There has been no serious move to the polar ends of fix and float.
- Intermediate regimes are the dominant currency regime for EMs.
- Hard pegs may be more vulnerable to growth crisis, though not to banking and currency crisis.
- Evidence for “managed floats” or intermediate regimes is mixed as there are difficulties in classifying these regimes. Less flexible regimes may be more vulnerable to crisis.

# Regime classification

# Classification of exchange rate regimes is problematic

- A few alternative databases have been released with measures of the de facto exchange rate regime.
- This field faces conceptual and practical problems.

# Problems of classification

- 1 All data-driven schemes reflect a combination of the regime and the shocks.
- 2 Ad-hoc methodology
- 3 Ad-hoc treatment of structural breaks
- 4 Limitations on fine structure
- 5 Not useful for analysing current events

## A data-based methodology of classifying ERR

- Zeileis, Shah, Patnaik (2010): a method for obtaining dates of structural change in the *de facto* exchange rate regime, and a measure of exchange rate flexibility: the  $R^2$  of the Frankel-Wei regression
- We define :
  - Fixed  $R^2 > 0.95$
  - Float  $R^2 < 0.66$
  - Intermediate  $R^2 > 0.66 \& R^2 < 0.95$
- Minimum period of the regime: 12 months.
- Work in progress: Matching this classification with R & R and IMF defacto classification.

# Bipolar hypothesis

## Distribution of exchange rate regimes by year

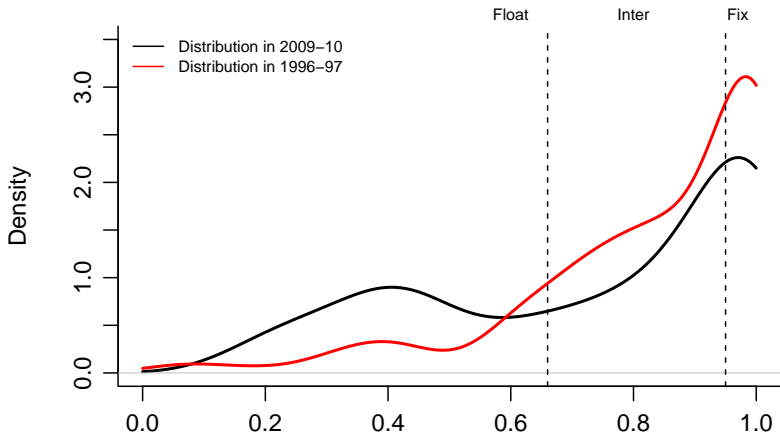
Year	Fixed ERR	Intermediate ERR	Floating ERR	Count
1995	37	35	14	86
1996	42	42	15	99
1997	45	44	18	107
1998	38	35	34	111
1999	35	35	41	118
2000	41	35	42	120
2001	47	34	39	122
2002	52	39	31	122
2003	56	29	37	124
2004	53	35	36	133
2005	55	44	34	134
2006	54	41	39	134
2007	59	35	40	136
2008	62	31	43	137
2009	46	38	53	137
2010	52	44	41	137
2011	58	39	40	137
2012	59	39	39	137



# Change in $R^2$ distribution across time

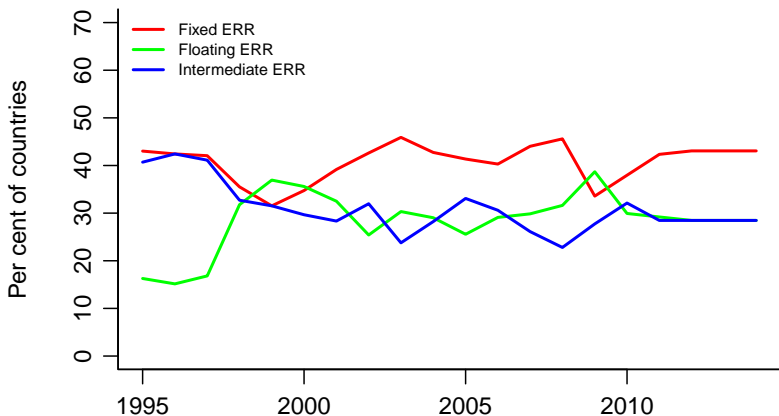
Distribution is more bi-modal in 2009-10 as compared to 1996-97

Paper finds that there has been no serious move to the polar ends of fix and float. **We find evidence of increasing bipolar regimes.**



## Exchange rate regimes according to ZSP (2010)

More flexible regimes after the Asian crisis on the one hand, and the Euro zone on the other, may have contributed to this trend.



# Regime persistence

## Regime switches from 1995 to 2012

Year	Inter to Float	Inter to Fix	Float to Inter	Float to Fix	Fix to Float	Fix to Inter	No change	Count
1995	2	0	4	1	0	1	52	60
1996	1	7	3	2	3	4	66	86
1997	4	5	4	1	2	3	80	99
1998	10	4	1	2	9	4	77	107
1999	7	1	4	2	5	2	86	107
2000	4	5	3	4	2	4	89	111
2001	3	6	6	2	2	2	97	118
2002	2	7	7	6	3	5	90	120
2003	8	8	1	3	2	5	95	122
2004	4	3	5	2	2	7	99	122
2005	1	4	8	0	2	4	105	124
2006	5	8	3	0	2	7	108	133
2007	6	8	4	1	0	4	111	134
2008	7	5	2	4	2	5	109	134
2009	5	2	2	0	6	12	109	136
2010	1	9	11	3	1	5	107	137
2011	2	7	2	1	0	2	123	137
2012	0	2	0	1	0	2	132	137
<b>Total</b>	<b>72</b>	<b>91</b>	<b>70</b>	<b>35</b>	<b>43</b>	<b>78</b>	-	-

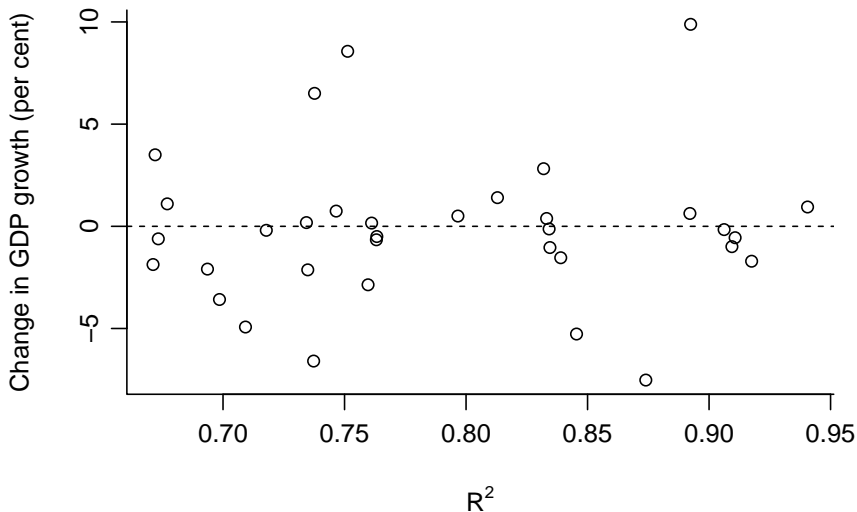
## Which regimes are most persistent?

- Paper finds that intermediate exchange rate regimes are most persistent.
- There are 832 intermediate regime periods in our dataset with 163 transitions to other regimes from this state
- We find that intermediate exchange rate regimes are least persistent.

# Vulnerability to crisis

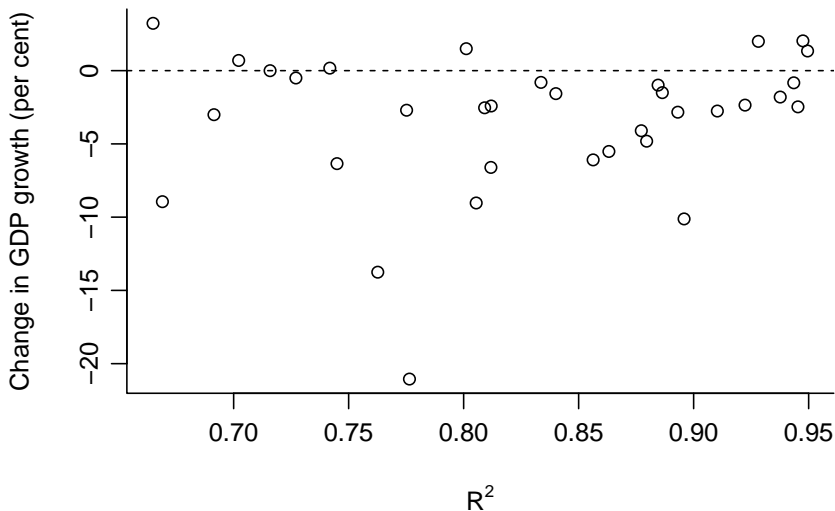
# Which intermediate regimes are more crisis prone?

Scatter plot for 1998, Evidence after AFC



# Which intermediate regimes are more crisis prone?

Scatter plot for 2009, Evidence after GFC





# Conclusion

## Our evidence

- Paper finds that there has been no serious move to the polar ends of fix and float. **We find evidence of increasing bipolar regimes.**
- Intermediate regimes are the dominant currency regime for EMs. **We find evidence of fewer intermediate regimes.**
- Hard pegs may be more vulnerable to growth crisis, though not to banking and currency crisis. **We find no evidence supporting this.**

## Concluding remarks

- The paper asks a very important and relevant question.
- But different exchange rate regime classifications may give different answers.
- The study of intermediate regimes could be made richer by adding other aspects of the regime to it. Among intermediate regimes
  - Are inflation targeters less crisis prone and/or persistent?
  - Does the extent of trade openness change the vulnerability of a country?
  - Are countries with more capital controls more or less crisis prone?
  - Does the development of financial markets play a role in determining how crisis prone an intermediate regime is?
- Over all a very nice paper!

Thank You