Macroeconomics in Crisis since the Crisis?

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This talk is an attempt at a summary of my forthcoming 36-page paper “Erfolge und Probleme der modernen (Mainstream-)Makroökonomik” in the List Forum (hopefully in 2019).
This is modern macroeconomics:

- Endogenous growth theory with detailed modelling of R&D investment and empirical research on patent micro data.
- Computer-linguistic approaches with text corpora from the internet and economic policy institutions such as the Fed.
- Survey methods to figure out expectations, uncertainties, reasons and time use of economic agents.
- Clever new identification methods with panel and time series data to test basic ingredients of larger models.
- Simple two-period, two-agent models to highlight a theoretical mechanism.
- Estimation and simulation of DSGE models (including those with heterogeneous agents) to quantitatively model the business cycle and stabilization policies.
- New fields like family and environmental macroeconomics, etc.
Thematic and Methodological Diversity

And so much more.

I can’t even pretend to give justice to this diversity.

So I won’t.

I will also not talk about:

- Anything long-run.
- International macro and trade.
- Macroeconomics in policy-advising and policy-making institutions.
- The teaching of macroeconomics.

All interesting and important topics in their own right.
**Outline**

- Very briefly: DSGE not as a model class but as a model philosophy.
- New data, new empirics, new modelling, new shocks, and new topics.
- Serious critiques of modern macro, beyond the “I don’t like DSGE-rational agents-representative agents-markets-mathematics” bullshit.

Yet, I can only fail in this task, given its vastness.
Dynamic …

“Dynamic” is about the future and expectations about this future (with Heidegger: it’s about Sorge as a fundamental feature of existence).

Without a dynamic element you cannot do macroeconomics, which is not physics, where particles have no expectations about the future. Therefore: no feedback loop through the future to the present.

Beware: just because there are differential equations in a model does not mean it is dynamic in this sense (Econophysics and Complex Systems guys will try to convince you of the contrary).
"Stochastic" means that the future is uncertain and this matters.
General Equilibrium . . .

“General equilibrium” means systemic interdependence, not: perfect competition. It means that markets spillover to each other, resources cannot appear out of nor vanish into thin air.

In addition:

- Micro foundations: the principal unity of macro- and microeconomics and the rich treasure of microeconomic data that we need to distinguish between macro models empirically.
- Modularity: DSGE models are incredibly modular and versatile where researchers can easily bring new elements into play in a very transparent way.
There will never be a static deterministic partial non-equilibrium macro!
DSGE as a concrete model

That some of you don’t like the Smets-Wouters (2007, AER) model with:

- representative perfectly rational agents
- complete financial markets
- no housing or banking sector
- no strategic interaction
- no political economy
- very reduced-form frictions
- etc.

Whatever - I have my reservations, too. Doesn’t mean it is not useful for some stuff.
Macroeconomics - Crisis?

New data, new empirics, new modelling, new shocks, and new topics

“New” data

- Panel Study of Income Dynamics (PSID)
- National Longitudinal Survey of Youth (NLSY)
- Survey of Income and Program Participation (SIPP)
- Current Population Survey (CPS)
- Consumer Expenditure Survey (CEX)
- Survey of Consumer Finances (SCF)
- German Socio-Economic Panel (GSOEP)
- Einkommens- und Verbrauchsstichprobe (EVS)
- Eurosystem Household Finance and Consumption Survey
- Panel on Household Finances (PHF)
- Michigan Survey of Consumers
- Survey of Consumer Expectations
- ifo business and investment sentiment surveys
- American time use surveys
- Annual Survey of Manufacturers (ASM)
- Business Employment Dynamics (BDM)
- Job Openings and Labor Turnover Survey (JOLTS)
- Kauffman Firm Survey of new firms
- CPI and PPI micro data
- USTAN, Kombifid and Afid firm data in Germany
- Text corpora like online news, federal open market committee transcripts, social media
- All manner of administrative data
“New” data - what have we learned?

- The nature of income, wealth, consumption and leisure inequality. Inequality as a multi-dimensional phenomenon.
- Social mobility studies.
- The overall, life cycle and cyclical nature of earnings risk.
- The role of firms in inequality.
- The job and worker flows in the labor market, including job ladders.
- The lumpiness of investment and resulting nonlinearities.
- Price setting behavior of firms and its relation to their financial situation.
- Inflation expectations and their role for expenditure decisions; also their long-run origins.
- Business expectation formation and business uncertainty.
New Empirics

- Search for natural experiments like the reunification
- Microeconometrics
  - Relationship between local house prices and demand
  - Relationship between local credit supply and economic activity
  - Regional fiscal multipliers
- Time series econometrics
  - Narrative approaches to shock identification
  - Sign and high-frequency restrictions to shock identification
  - State-dependence of stabilization policies
- Business cycle accounting: what are the relevant wedges for aggregate fluctuations?
New Modelling

- Models with incomplete financial markets, including aggregate shocks, the role of job search and job ladders: to model income risk and inequality.

- Models of frictional labor markets, lumpy investment and price setting (including incorporation of oligopolistic structures) away from the Calvo fairy.

- Models of imperfect information: sticky and noisy information acquisition, which can now be tested with survey expectation data.

- Financial frictions models: nature of borrowing constraints and lending constraints; role of collateral for macroeconomic fluctuations.
New Modelling

Standard critique: you guys model only one deviation from the standard model / one friction at a time.

Not true!

- Combination of incomplete markets, market segmentation and nominal frictions: HANK model - recovers many Old Keynesian insights (quantities matter, perhaps more than relative prices) but fully microfounded.

- Combination of nominal frictions and job ladder models that suggest that rather than using the unemployment rate, one should use job-to-job transitions as an indicator of slack (or lack thereof).
New Shocks

- Aggregate demand shocks, now microfounded:
  - Incomplete information can lead to coordination failures and demand-driven fluctuations.
  - Search and shopping behavior can lead to what looks like TFP fluctuations but are really changes in aggregate demand as well as multiple equilibria and self-fulfilling prophecies.
  - Precautionary saving in unemployment traps can lead to persistently depressed aggregate demand recessions.

- News shocks (intrinsic boom-bust cycles)
- Uncertainty shocks (real options, precautionary saving and financial effects)
- Financial shocks
New Topics

- Family macroeconomics: the role of families as both shock source and shock absorber.
- Environmental macroeconomics.
- The macroeconomics of time use: what do people actually do in their “leisure” time?
But Where is....

- strategic interaction;
- network interaction;
- radical uncertainty;
- economic and political power;
- connection between short-run and long-run?

I readily admit that modern macro is underdeveloped in these areas.
First Attempts Are Being Made:

- network models
- models without the law of large numbers holding and large agents mattering (granular models)
- replacement of monopolistic with oligopolistic competition in DSGE models
- business cycle models with Knightian Uncertainty
- etc.
More Fundamentally...

How much DSGE?

I disagree with those that say that DSGE – even understood as a modelling philosophy – is the only game in town.

I am with Blanchard (2018) that many more approaches are useful: fundamental models, DSGE models, policy models like multi-equation econometric models, toy models, forecasting models, partial equilibrium models, etc.

I am also open to agent-based models, even though I think they have yet to prove their usefulness.
Even More Fundamentally...

I think there is a legitimate question whether the shock-propagation paradigm in business cycle macro should be the only game in town. Is there something to be learned from multiple equilibrium and even endogenous-cycle approaches?

I am open to learning what can be learned from complex systems theory.

But I am not open to bringing in French Critical Theory into macroeconomics.
Finally...

Modern macro is sociologically not diverse enough: certainly as far as gender is concerned, but also with respect to ethnic and racial backgrounds. Too many old white men . . .

In *this* particular sense, macro is also almost surely not intellectually diverse enough.
I hope to have convinced you that there is absolutely no evidence of modern macro being a monolithic and even degenerate scientific paradigm.

Whoever claims this, willfully disregards the evidence and has a very different agenda than scientific progress.
The State of Macro

Two quotes:

2. Reis (2018): “On top of this, asking an active researcher in macroeconomics to consider what is wrong with macroeconomics today is sure to produce a biased answer. The answer is simple: **everything is wrong with macroeconomics.** Every hour of my workday is spent identifying where our knowledge falls short and how can I improve it.”
An Invitation...

... to the young researchers in the room, interested in macro: come join this exciting endeavor that is modern macroeconomics.

Don’t do armchair philosophizing about how to do macro.

Your are too young for that.