

Aiginger, K., Guger, A., "Stylized Facts on the Interaction between Income Distribution and the Great Recession" No. 2013-25, March 22, 2013

Reaction to comments and referee reports

Anonymous - Referee Report 1 (16. 5.2013 14:55)

Literature review, not only overview of channels, but test them. Cite more reverse causality literature.

The article is somewhat of a starter. While claims that income distribution is important are very broad and find a lot of intuitive support, empirical evidence is very, very scarce. We demonstrate that this is the case since theory is imprecise as to whether it is the level or the change which matters, whether it is functional or personal income contribution which matters, whether it is "broad" distribution as represented by the Gini, or polarization (top relative to low segments), or top incomes alone. Without knowing what matters, we cannot investigate channels by which "distribution" impacts. This will be the next question if we know which aspect of distribution matters. But we should clarify this reason in the text.

We are glad to cite more literature on the reverse influence (that of crisis on distribution).

Minor but important point about definitions, documentation of variables will be followed, many thanks.

...appreciate multiple indicators ...gain not clear...

Gain is given if the several aspects of one group of variables (e.g. distributional variables which grasp different aspects of distribution e.g. functional, personal, polarisation), explain a certain phenomenon which is also not easy to grasp by one indicator ("in crisis performance" which may be the loss of output in one, quarter or in two years etc). In our case it is absolutely crucial to define output performance by a composite indicator (taken from the one year performance Greece did not perform badly in 2009). For symmetry we tried whether on the side of the suspected determinant ("distribution") we could also build an overall indicator. This would have given us the chance to correct for many other structural variables without losing too many degrees of freedom. Unfortunately we could not build composite distribution indicators, and therefore tried the influence of single indicators, instead of rejecting to early the influence of distribution on in crisis performance.

Anonymous - Referee Report 2 (21.5.2013 13:15)

On theory and its operationalisation:

Main point:

The report states that "nice concise overview of the literature" however not leading to a precise formulation of a hypothesis.

This critique is correct. The reason is that the theories highlight very different aspects of distribution, which are assumed to work via diverse channel. Therefore we had the choice to stick to one theory, and try to derive a workable hypothesis. Even if this had been successful, there would have been the critique that we arbitrarily had chosen one theory, and rejected its implication. Given the thrust but also the impreciseness of the literature but also policy makers and media (but also Galbraith and his followers), that "distribution mattered for the crisis" and that distributional change are considered to be important if we want to increase the resilience of the economy, we choose to be open for different aspects of distribution to be important and on different channels.

Medium/minor points

China and India should not be included without discussing that the stage in development matters for performance.

We are happy to add a reference to this discussion. As far as the results are concerned we tested in the robustness section, whether leaving out china and India influenced the results.

Principle components a lot made off but not explained

Could be done better in more detail, but the components used are all enumerated, the method is explained and rather standard (and used in parallel article);

GDP corrected for population growth or not. It is not corrected, but the effect of correction, while it is important for long run growth is limited in a study focusing on the performance in a short period of time (as the crisis period 2007/2009), ranks are very similar for GDP and GDP per head (as for real data and PPP).

What long data means,

Extending the time in which change is considered – as pre crisis change; it is possible to look for 5 years preceding the crisis, or a longer period of upcoming changes, the first is better since data are better comparable, the second since problems sometime have to accumulate before they have an impact

Whether real interest rates were low too

it is true that in some countries nominal interest rates declined sharply, while real interest rates were still rather high; but some agents have money illusion, and nominal interest rates which were formerly two digit, are enticing if they are only 5% (and this happened in many countries)

What ranked data means

We use the term ranked data if we used cardinal data giving the highest positive value the rank one, the second highest rank 2 etc. , this is a primitive method to eliminate outsider, often used in prescreening,

References to the table in text missing

Will be made, we will cite the studies proposed on functional distribution.

Distribution indicators should be presented in the same detail as output indicators.

We will try, but space is limited.

Anonymous - Invited Reader Comment (15.5.2013)

Why not use top income data?

They are available only for half of the industrialized countries in our sample.

Critique of the econometric procedure: different policy reactions to the crisis are not controlled for

It is correct that in most equations we do not control for other structural variables (be its determinants of countries supposed to influence the depth of the crisis, or policy variables). However in the robustness section, we investigated whether adding those variables which were in the literature found to explain some differences in the in-crisis performance have been added (of course limited by the fact that literature is presenting diverse indicators here too).

Emphasis on principle component as method to improve informational content

There are always pro and cons, whether to use many indicators separately or to summarize them in an aggregate. The first method reduces the degree of freedom, which is very important in our case since we have a rather small sample of countries, the second disguises what piece of information decides about the overall indicator. We made the experience that the literature on in-crisis performance and its determinant, since it is impossible to define in-crisis performance by one indicator. Look at Germany which had a large GDP loss in 2009, but then had an admired recovery, or look at Greece, which GDP loss in 2009 was small, but GDP continued to decrease for four more years. We therefore chose the strategy first to look if composite indicators lead to good results. After they did *not* in this case (they did for explanations of output performance by other indicators like current accounts, pre-crisis growth etc.), we look whether this is due to the aggregation effect. Finding out that we have to differentiate between functional distribution and personal distribution, and that looking for long-run trends and focusing on the Gini, are interesting inputs for further investigations. If we had started with these sub indicators, we would have got the questions why we concentrated on this specific time period and this specific indicator.

We may de-emphasize the principle component approach a little bit, since the individual results seem to be more important for future research.

What definition of adjusted wage share was used, for some countries (Greece, Portugal, Spain and Turkey) trends for wage shares in AMECO differ from those in the paper.

Our wage share definition is the classical one: Compensation for employees in percent of national income. The adjusted wage share is defined as: wage share divided through employees/total employment. As an indicator of the functional distribution of income it is related to national income. In AMECO, wage share is defined as labour compensation divided by GDP and the adjusted wage share as compensation per employee divided through GDP at factor costs (production prices) per employed person. (Related to GDP the wage is a weaker indicator of distribution, it would be rather an indicator of unit labour costs when GDP is applied in real terms).

Thus, the difference in the wage share series comes down to the fact that we consider wage income in % of national income and AMECO in % of GDP at producer prices.

While in our definition, based on national income, depreciation is excluded in the denominator, in the AMECO definition net (factor) incomes from abroad are missing.

Since we use AMECO data in our estimates the difference in the development of the wage share between the AMECO data and ours for some countries can only be due to depreciation and net incomes from abroad.

In most countries the difference is just a level shift, since GDP is higher than national income. But, for a few countries which are mentioned in the comment, wage shares in % of national income developed adverse to wage shares in % of GDP for this period.

Looking closely at the data reveals that the difference is due to depreciation which increased relatively strong in this period in Spain, Portugal and Greece; but also the importance of net primary income from abroad increased significantly in the last decade for these countries.

Anonymous - Invited Reader Comment (8.5.2013)

Some results contradictory....milder recession in Gini had declined ...and wage share

This may not be contradictory but hinting at an interesting issue. Increasing wage share may signal loss of competitiveness, will declining GINI means higher consumption and less unemployment; for us an interesting new double hypothesis or a hint for non linearities, increase in wage share is first increasing resilience, but can be too much/too fast, input for further research