

## **A case against revolutionizing economics: the replaceability problem**

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*Abstract.* What to say in response to a campaign for economics based on more realistic assumptions? The usual defence of assumptions that appear unrealistic, given a certain common way of thinking about people, is what does it matter as long as there is predictive accuracy? I outline a different defence: that rarer results are obtained by departing from realistic assumptions.

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*Walking in a straight line*

*Thinking: how to rhyme this line?*

An understandable source of frustration about economics is that, given one's experience of life, people just do not seem like the individuals in economic models. The most famous assumptions are individuals who are mistake-free calculators and whose calculations are based on perfect knowledge. These represent people in a way that is profoundly unlike our experience of them. The intense campaigns we observed against the discipline of economics and its undergraduate curriculum, in the last decade, was much influenced by this frustration. The usual defence – what does it matter if the assumptions are unrealistic if the models predict? (see Friedman cited in Smith 2016) – was disarmed by drawing attention to the famous failure to

predict the 2008 global financial crisis. But I think there is another defence of the assumptions, which I wish to present here.

For grasping this defence, it is a good idea to turn to research in psychology, specifically Simon Baron-Cohen's popular book *The Essential Difference: Men, Women, and the Extreme Male Brain*. Put simply, it says that most males have a certain kind of brain, but some females have a brain of this kind – they thereby have the psychological characteristics associated with that brain kind – and conversely most females have a certain kind of brain, but some males have a brain of that kind. In short, some males have female brains and some females have male brains. (But actually the statistics are rather complicated, and there is a third kind of brain posited.) Imagine this research somehow disappears – don't worry too much about the details of how – but the vast research machine of universities and beyond still exists. What I wonder is whether research very much like this would just appear again. Who has not had the perception that so-and-so is a male with a feminine soul, or so-and-so is female with a masculine soul? People are interested in such matters and in a liberal society, suitably qualified researchers can pursue their interests within limits. Soon enough research into such perceptions leads to a similar book – that would be nothing unsurprising, even if the theory is false under close inspection!

There can be such a thing as working with assumptions which feel realistic to a lot of people and mainly producing research that would be produced anyway. What is the consequence of that? Imagine a large university relies on this research. Meanwhile, it is surrounded by small institutions which strike it as foolish, but each of these fools has some success from bizarre assumptions. Furthermore, the success obtained by each is a rare and valuable success. Each has a model that predicts something. The university is like a great Caesar, a colossus surrounded by

dangerous one-legged figures. “How are they even managing to do that?” “Well, they have their rare success from their strange model.” “What are the details?” “We don’t know!”

If I were an undergraduate, having soon left school, I might well think much as the campaigners do: these assumptions are just too unrealistic. But I fear a situation like this as the consequence of a successful campaign. Others, near and far, find some way of doing something with seemingly unrealistic assumptions and it is worth a lot of common results.

## **Appendix**

“What is the difference between the defence you have introduced and the older defence of what does it matter if the assumptions are unrealistic but the models predict?” Well, there are at least two differences. One is that the older defence seems to suppose, or hope, that many economic models with strange assumptions are successful in terms of prediction, rather than such successful models being rare. And there is no comparison with a realistic but replaceable alternative.

## **References**

Baron-Cohen, S. 2003. *The essential difference: men, women and the extreme male brain*. London: Allen Lane.

Smith, N. 2016. The pool player analogy is silly. *Noahpinion* June 14th 2016. Available at:

<http://noahpinionblog.blogspot.com/2016/06/the-pool-player-analogy-is-silly.html>