

## **COSTS AND BENEFITS OF EURO MEMBERSHIP: A COUNTERFACTUAL ANALYSIS**

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### **NON-TECHNICAL SUMMARY**

From the very beginning of the nineties until today, the European Monetary Union (EMU) has been a debated idea. Many academics from different fields of international macroeconomics used to predict serious troubles for the central bank which would have to set a common monetary policy for « ill-matched » countries.

Now that monetary integration is effective, this article aims at providing a quantitative assessment of the adequacy (or the inadequacy) of the single monetary policy to each member country. Indeed, while economic analysis generally accepts that agents can know and analyze the potential outcomes of alternative scenarios, empirical works dealing with economic policy practice almost never use the so-called counterfactual approach. One main exception is the contribution of Pesaran *et al.* (2005) who use a global macroeconometric framework (Global Vectorial AutoRegressive, GVAR) to investigate the following question: What if the UK had joined the euro in 1999? The main characteristic of the GVAR framework is that all the considered variables are endogenous, allowing to study interdependencies between all countries.

Our contribution is twofold. First, to our knowledge, it has never been tried to gauge quantitatively the macroeconomic costs or gains of EMU membership. Second, by reversing the problematic of Pesaran *et al.* (2005), we modify the GVAR in order to test different scenarios related to the absence of the euro after January 1999. Echoing a short but intense debate which occurred in Italy in 2005, we also study the potential outcomes if Italy had not participated to EMU Stage 3 in 1999.

This paper sheds light on the following important questions: What if the euro had never been launched? How would have evolved national outputs and inflation rates? What would have been the consequences for Italy of not participating to Stage 3? Based on the comparisons between the « true » GVAR and various counterfactual GVARs, we show that we cannot draw any general conclusion for the three largest euro area members, namely Germany, France and Italy. Indeed, before 1999, France and Germany gain output under the single currency regime in two scenarios, while Italy gains in three scenarios. After 1999, all these countries gain in two scenarios and lose in two scenarios. It is interesting to note that these gains or losses do not

occur in the same scenarios for the three countries. It is however certain that these countries had, and probably still have, conflicting interests regarding the most suitable monetary policy for each of them. Conversely, small euro area members like Finland, the Netherlands and Spain, seem to have benefitted from the pre-euro convergence and from the single currency regime. Besides, the single currency regime probably did not have any significant impact on price developments. Finally, the non-participation of Italy to the single currency is quite neutral on the macroeconomic performances of the euro area.

*J.E.L. Classification:* C32 ; E17 ; F42

*Keywords :* Euro ; counterfactual analysis ; global VAR