IMF Working Paper

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WP/96/106

INTERNATIONAL MONETARY FUND

Research Department

A Robust and Efficient Method for Solving Nonlinear Rational Expectations Models

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September 1996

Abstract

The development and use of forward-looking macro models in policymaking institutions has proceeded at a pace much slower than predicted in the early 1980s. An important reason is that researchers have not had access to robust and efficient solution techniques for solving nonlinear forward-looking models. This paper discusses the properties of a new algorithm that is used for solving MULTIMOD, the IMF's multicountry model of the world economy. This algorithm is considerably faster and much less prone to simulation failures than to traditional algorithms and can also be used to solve individual country models of the same size.

JEL Classification Numbers:

C63, C88, D84, E17

¹This paper was presented at the Second International Conference on Computing and Economics and Finance, Geneva Switzerland, 26-28 June 1996. We thank Raouf Boucekkine, Jean-Pierre Laffargue, Pierre Malgrange, and Steve Symansky for encouraging us to do work in this area and Peter Hollinger for incorporating the solution algorithm into portable TROLL. We also thank Helen Hwang and Susanna Mursula for their excellent technical assistance. Juillard is assistant professor at the University Paris 8, and a researcher at CEPREMAP, Paris. Laxton is an economist in the Economic Modeling and External Adjustment Division of the Research Department. The views expressed in this paper are those of the authors and do not necessarily reflect those of the International Monetary Fund.