



Commodity Price Shocks and Inflation within An Optimal Monetary Policy Framework: The case of Colombia

Working Paper No. 858 Keep in mind

The series Working Papers on Economics is published by the Office for Economic Studies at the *Banco de la República* (Central Bank of *Colombia*). It contributes to the dissemination and promotion of the work by researchers from the institution. This series is indexed at Research Papers in Economics (RePEc).

On multiple occasions, these works have been the result of collaborative work with individuals from other national or international institutions. The works published are provisional, and their authors are fully responsible for the opinions expressed in them, as well as for possible mistakes. The opinions expressed herein are those of the authors and do not necessarily reflect the views of Banco de la República or its Board of Directors.

AUTHOR OR EDITOR Luis Eduardo Arango Ximena Chavarro Eliana González AUTHORS AND/OR EDITORS González-Molano, Eliana Rocío

A small open macroeconomic model, in which an optimal interest rate rule emerges to drive the inflation behavior, is used to model inflation within an inflation targeting framework. This set up is used to estimate the relationship between commodity prices shocks and the inflation process in a country that both export and import commodities. We found evidence of a positive, yet small, impact from food international price shocks to inflation. However, these effects are no longer observable once the sample is split in the periods before and after the boom. The lack of effect from oil and energy price shocks we obtain supports the recent findings in the literature of a substantial decrease in the pass-through from oil prices to headline inflation. Thus, our interpretation is that monetary authority has faced rightly the shocks to commodity prices. Inflation expectations are the main determinant of inflation during the inflation targeting regime. Commodity prices movements are to a great extent included in the information set to form expectations.

The opinions expressed here correspond to the authors and neither necessarily represents the Banco de la República nor its board of directors. We thank the participants of the seminars at Banco de la República, Acciones y Valores, Universidad de Antioquia, and XIX Meeting of the Central Bank Researchers Network of the Americas at CEMLA for their helpful comments and suggestions on a previous version of the paper.