EVALUATING THE INFLATION TARGETING REGIME OF SOUTH AFRICA

by

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Abstract

The South African Reserve Bank (SARB) moved to an official inflation targeting regime in the February of 2000, with the sole aim of maintaining the CPIX inflation between a target-band of three to six percent.

Against this backdrop, this thesis, over seven independent chapters with a common theme, evaluates the inflation targeting regime in terms of welfare cost estimates and mean and volatility of inflation in the post-targeting period.

Chapters 2 and 3 use the partial equilibrium money demand approach based on cointegration and long-horizon estimation techniques, to derive the welfare cost estimates. Given the sensitivity of the results to the estimation techniques, chapter 4 carries out a robustness check for the two estimation methods based on data aggregation. The chapter 4 finds the long-horizon method to be more robust, and shows that the welfare cost estimate lies between 0.15 percent to 0.41 percent of GDP across the width of the target band.

Realizing that partial equilibrium approaches are merely one-dimensional, in the sense that it fails to account for the fact that inflation, operating in conjunction with the tax system, has further distortionary effects, we re-evaluate the welfare costs in chapter 5 using a more general micro-level approach. The welfare cost estimates are found to increase by nearly one and half times when compared to the partial equilibrium approaches. This estimate increases by more than twice, when we adopt a dynamic general equilibrium endogenous growth model to calculate the welfare cost of inflation in chapter 6. In chapters 7 and 8 we carry out counterfactual experiments based on a model of dynamic time inconsistency and cosine-squared cepstrum. Specifically, we ask the question: If the mean and volatility of inflation would have been higher
or lower had the SARB continued to pursue its pre-targeting monetary policy approach. We find the evidence that the mean and volatility in the post-targeting era is higher than it would have been had the SARB continued to stick to its pre-targeting monetary policy framework.

Based on our results, we conclude that there can be large gains by considering a narrower (and possibly lower) target band.
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