

Advanced Macroeconometrics – Assignment 4

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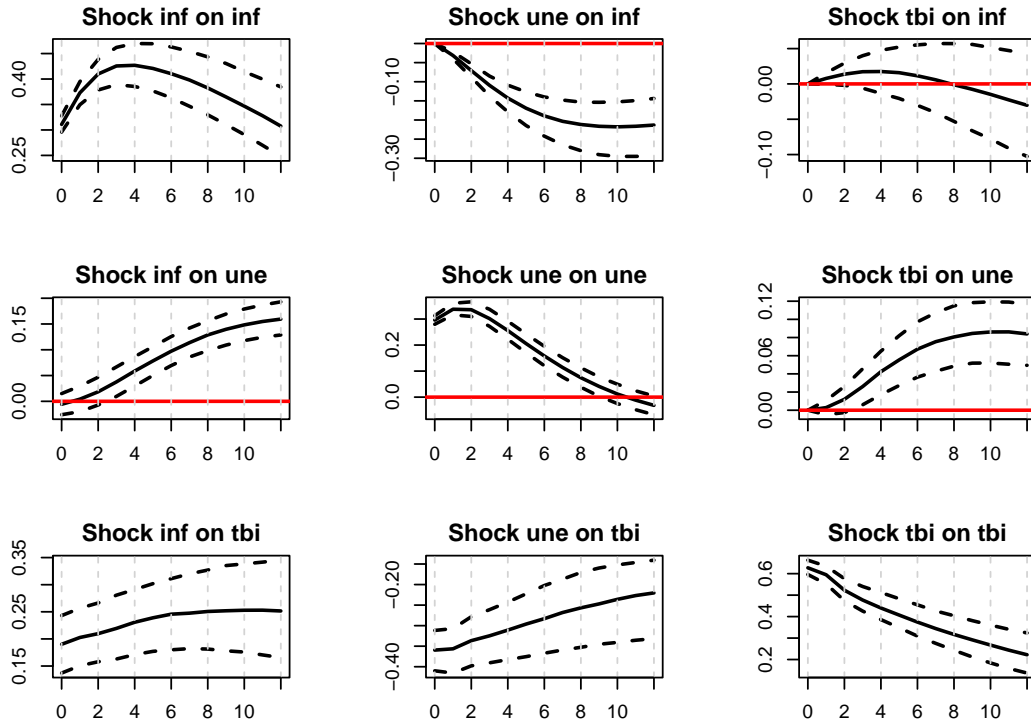
*The executable code that was used in compiling the assignment is available on GitHub at
<https://github.com/maxmheinze/macrometrics>.*

Exercise 1 – Different Prior Values for the Variance

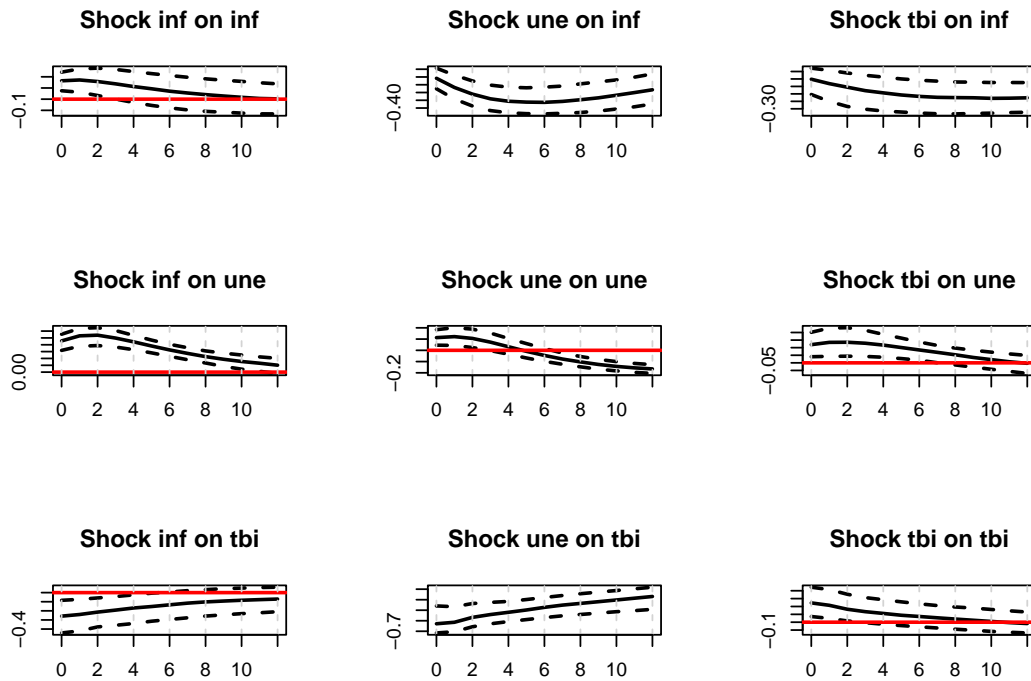
Using the sample code provided, we estimate the VAR using different λ_1 and λ_2 values for the Minnesota prior.

Default Lambda Values

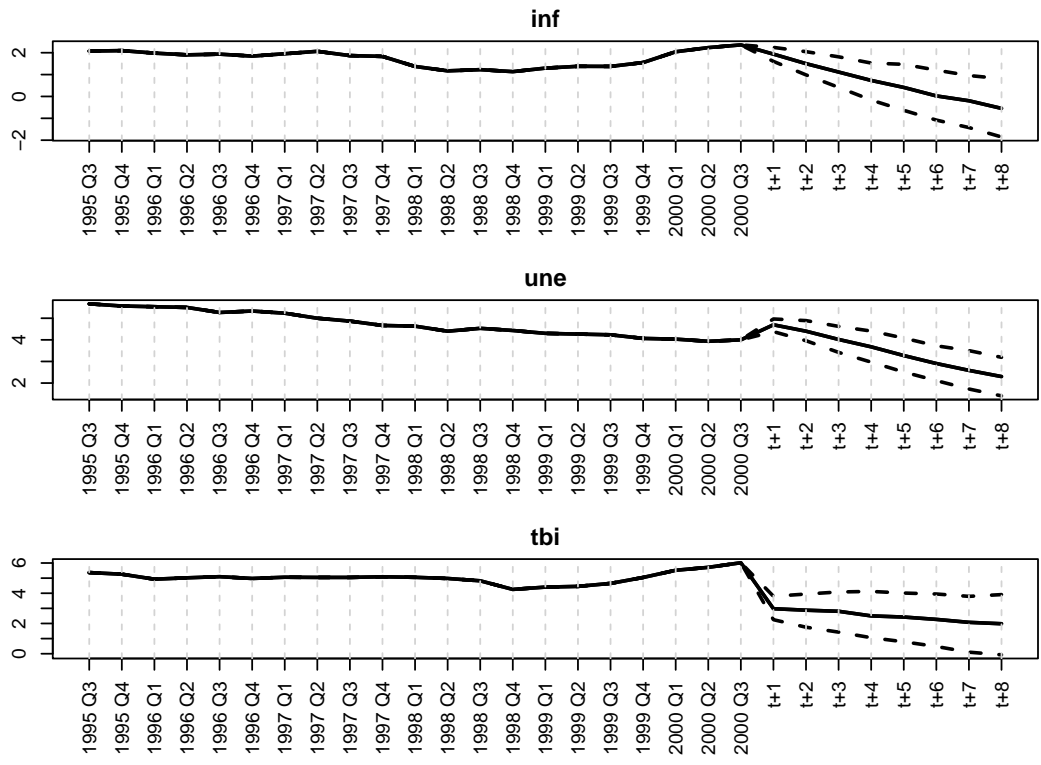
Sign IRFs



Cholesky IRFs

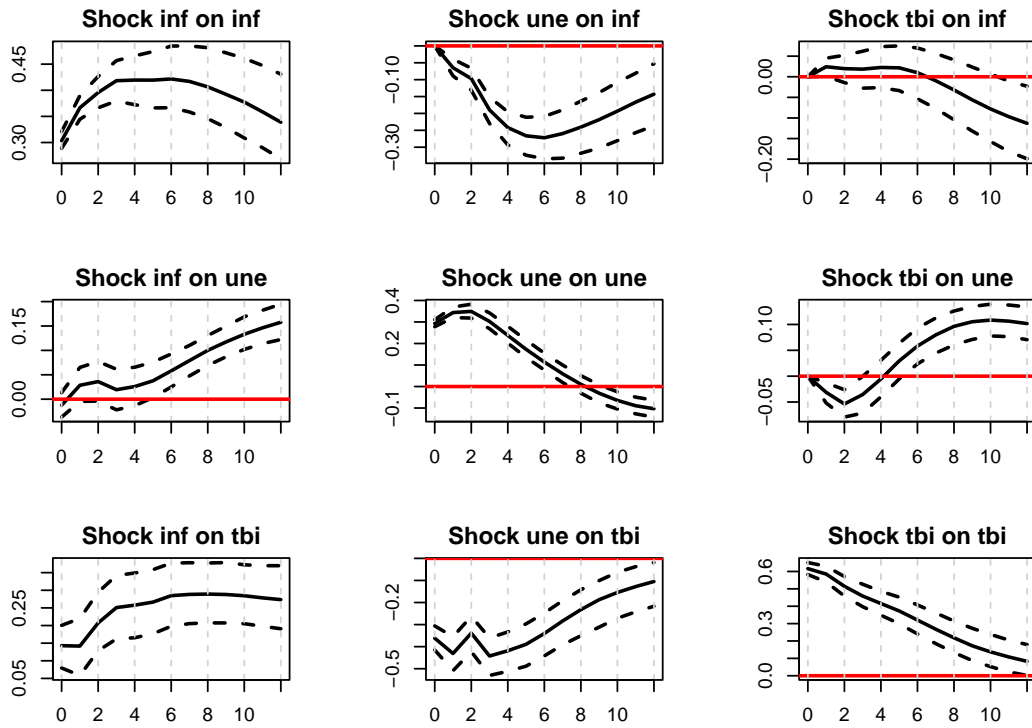


Predictions

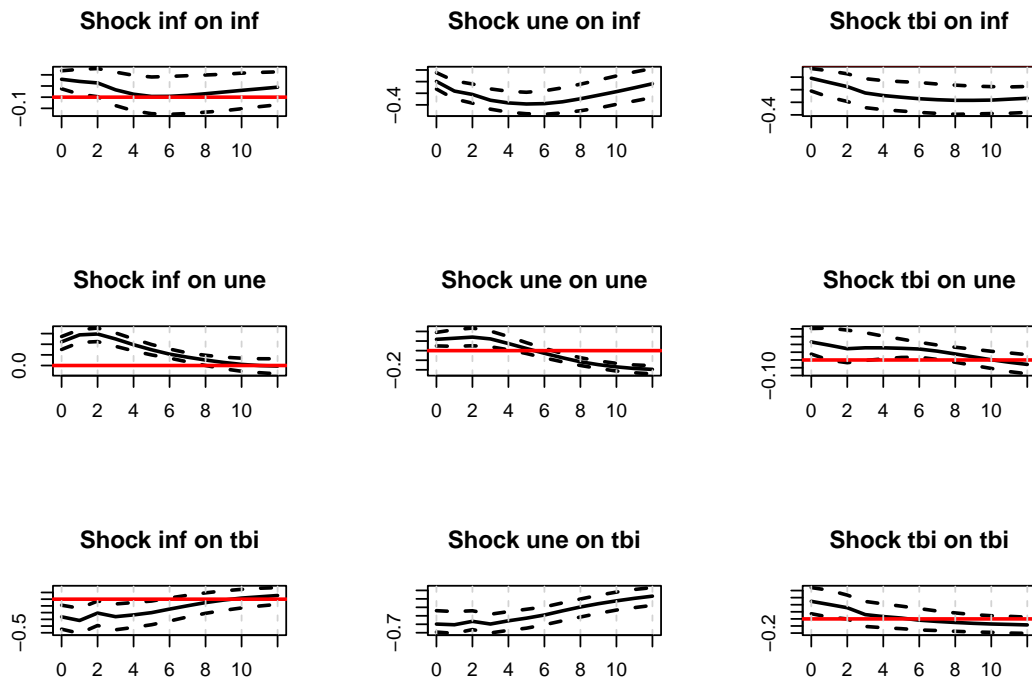


Variant 1: $\lambda_1 = 0.1$, $\lambda_2 = 100$

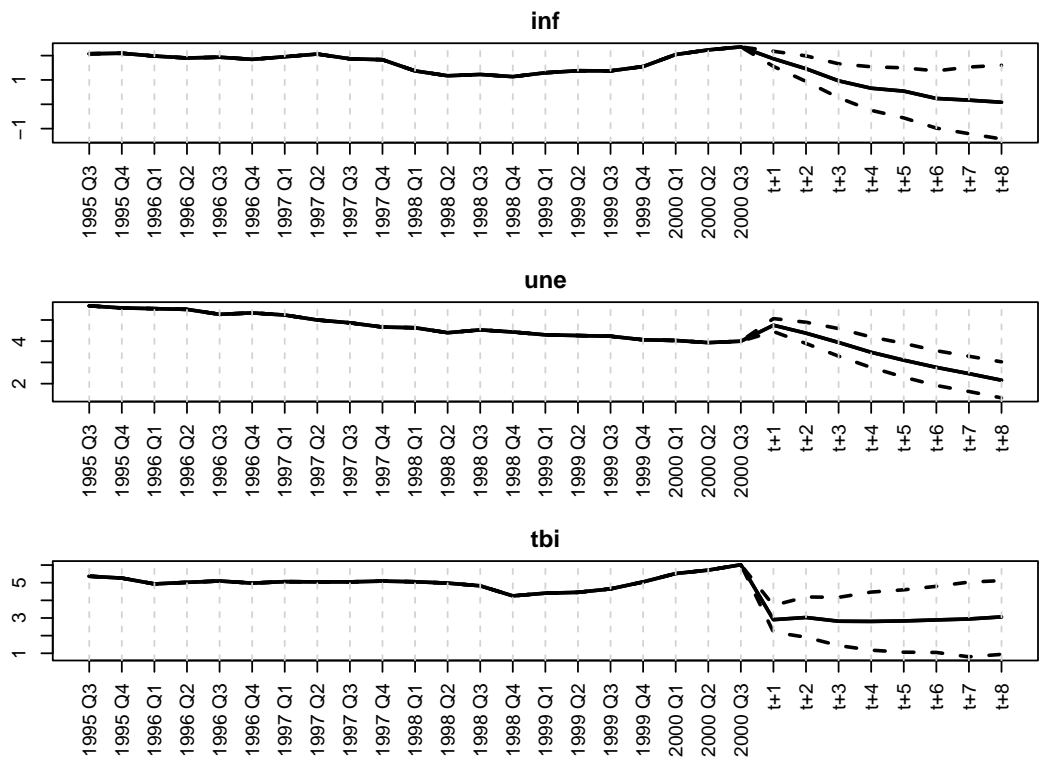
Sign IRFs



Cholesky IRFs

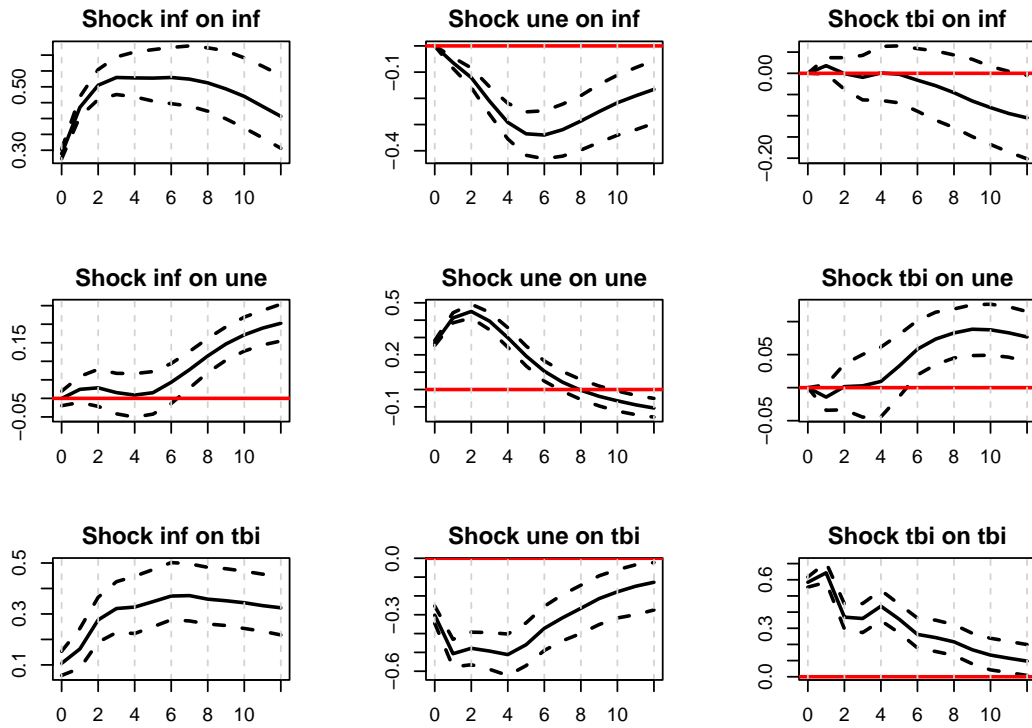


Predictions

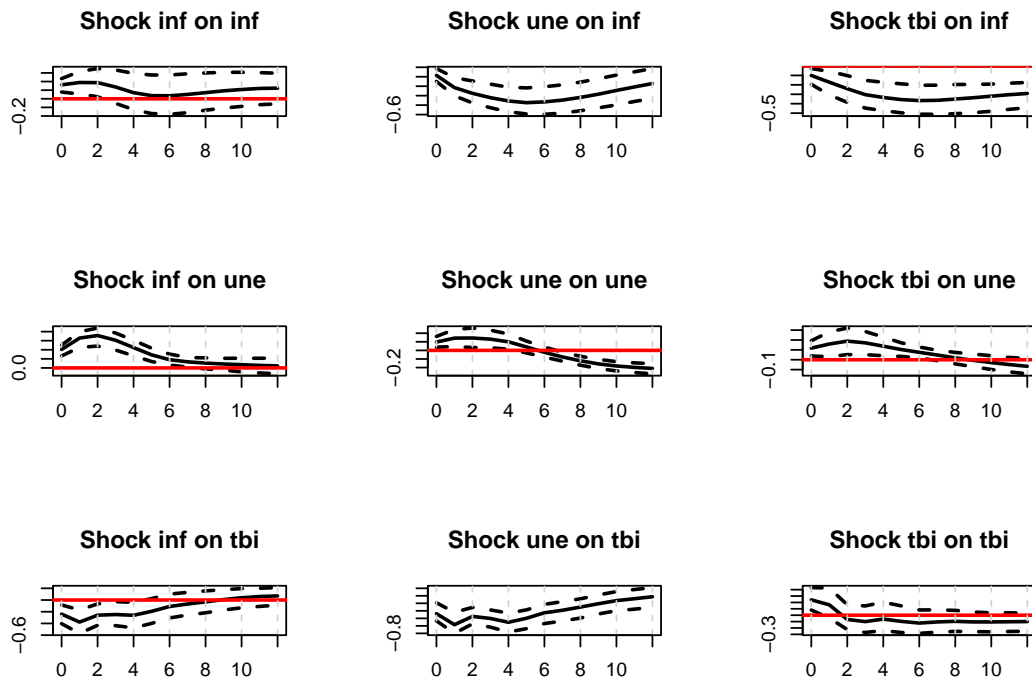


Variant 2: $\lambda_1 = 100$, $\lambda_2 = 0.1$

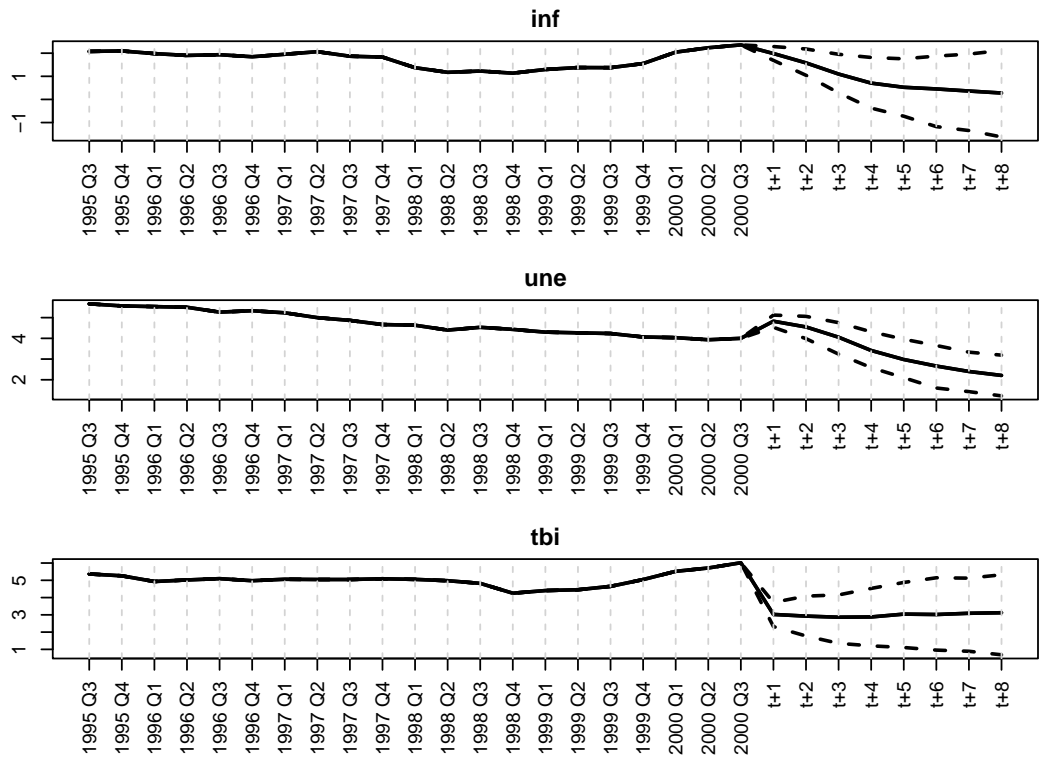
Sign IRFs



Cholesky IRFs

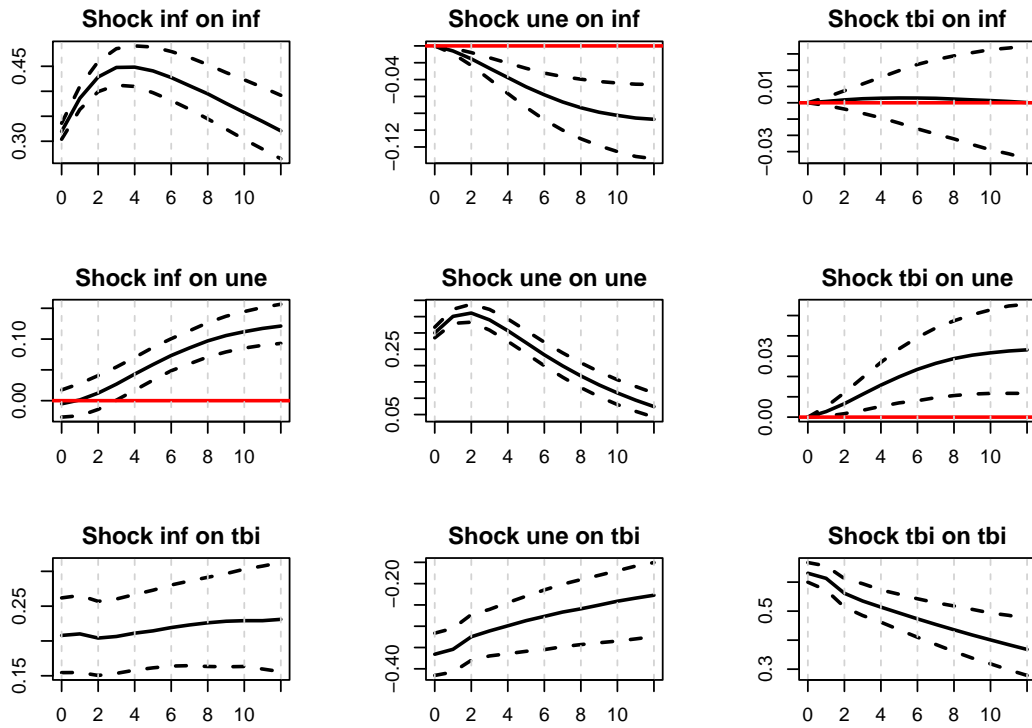


Predictions

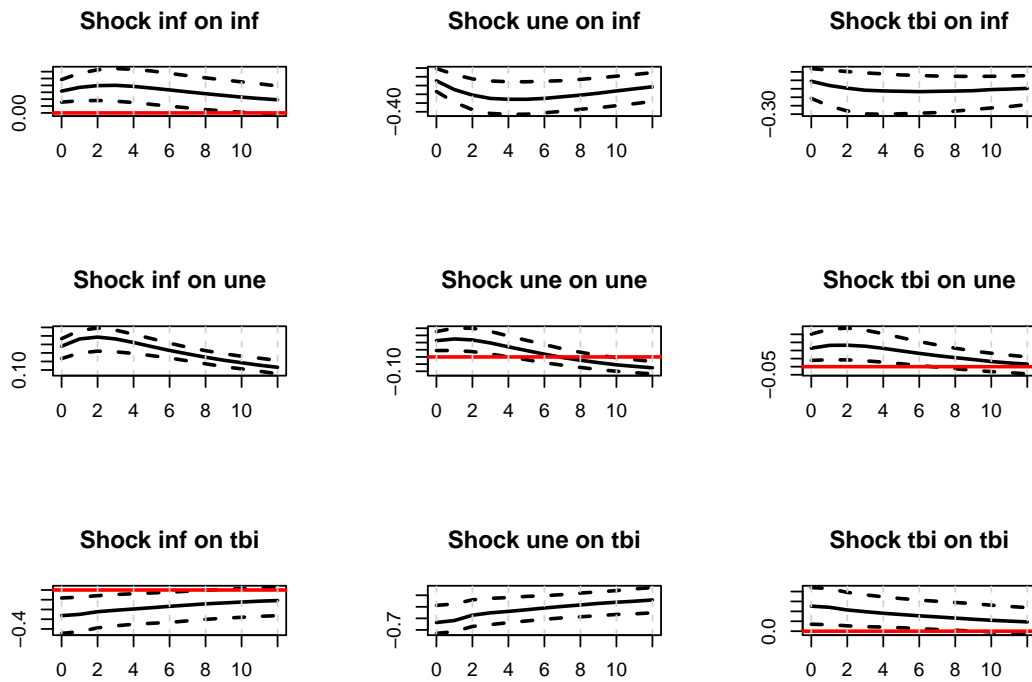


Variant 3: $\lambda_1 = 0.1$, $\lambda_2 = 0.1$

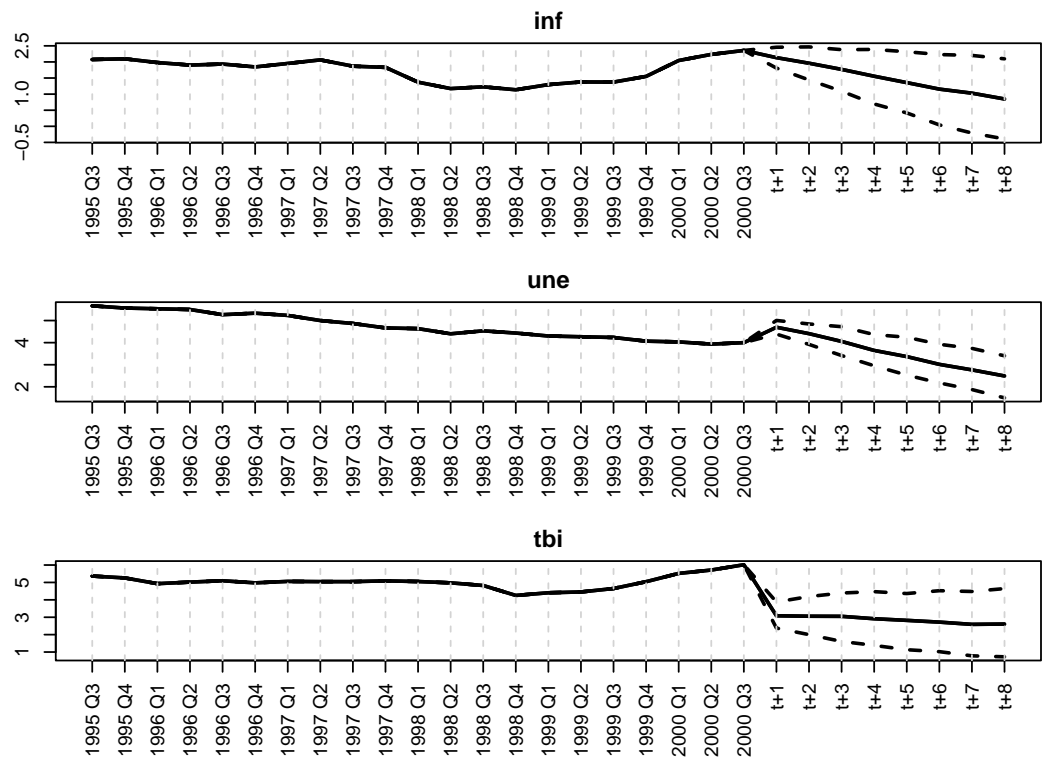
Sign IRFs



Cholesky IRFs

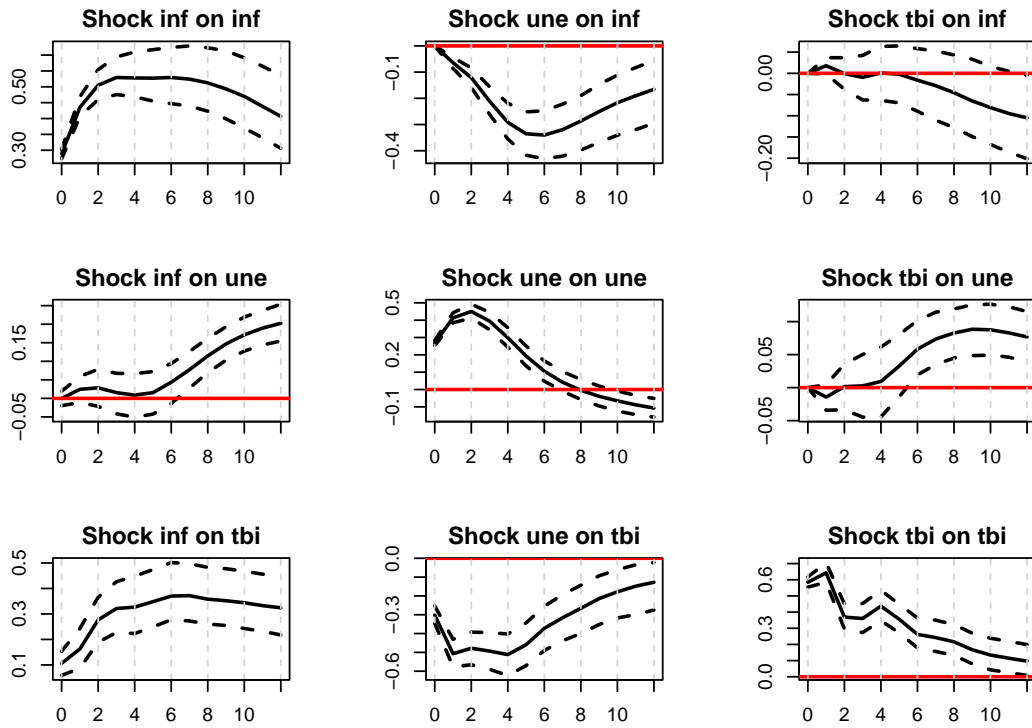


Predictions

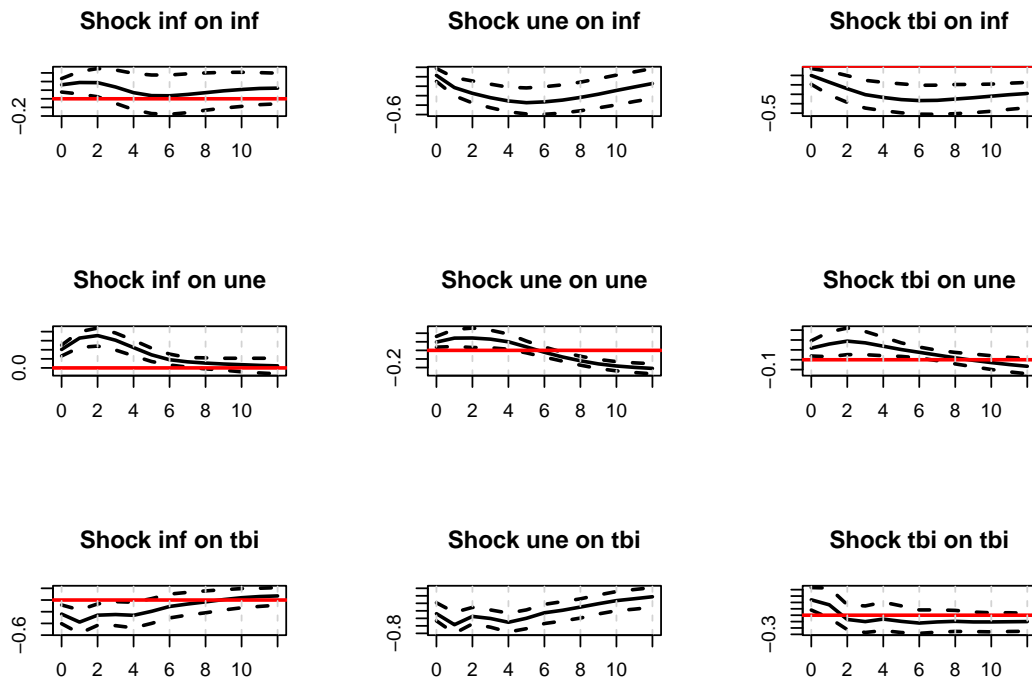


Variant 4: $\lambda_1 = 100$, $\lambda_2 = 100$

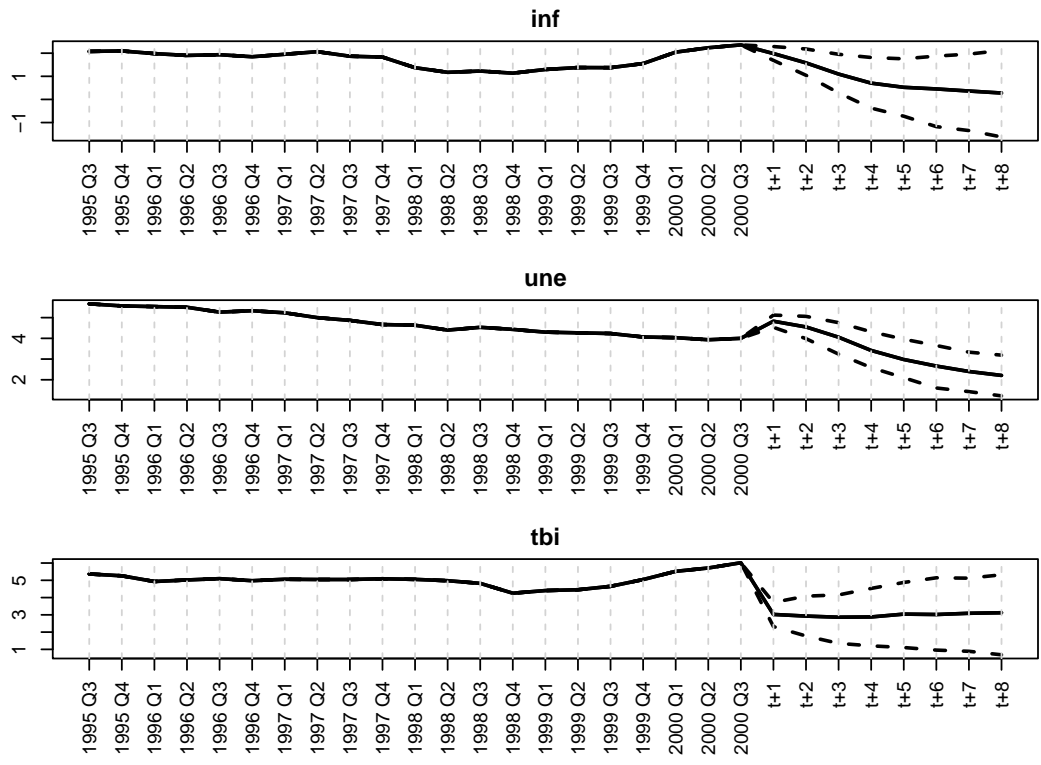
Sign IRFs



Cholesky IRFs



Predictions



Discussion

Text

Exercise 2 – Replicating Kilian (2009)