1023-37-1871 James Michael Haley* (lally110@adelphia.net), 259 Maple Avenue, Pittsburgh, PA 15218. How the Fed Chaotically Distorts the Relationship Between Risk and Return.

The current interest rate target of the U.S. Federal Reserve System is based on a Taylor-like rule that raises (lowers) rates, when inflation and output increases (decreases). But often these changes in interest rates over-react, which causes chaos in the stock market that disrupts the economy. The negative consequences of this nonlinear feedback can be seen in 2000. Then the Federal Reserve raised the federal funds rate, which controls short-term interest rates, to 6.5% that burst the biggest stock market bubble in American history, contributing to recession in 2001. In fact monetary policy often chaotically shifts the expected positive linear relationship between individual stock returns and risk measured by beta. But there is a better way to effectively guide the economy's search for "rationality" by pegging the expected short-term, nominal interest rate to equal its real expectation. Consequently, convergence to a rational expectations equilibrium speeds up in a complex learning economy. (Received September 27, 2006)