A parsimonious model of the S&P500

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Abstract

In this paper, I describe a parsimonious model of the S&P500.
The paper ends with "The End"

Introduction

In a previous paper, I have described the Ghosh factor of an independent variable X vis-à-vis the dependent variable y.

In a previous paper, I've defined a parsimonious model and then described a parsimonious model of Government debt-to-GDP and GDP growth rate.

In another previous paper, I've described a parsimonious model of Marx's influence on Russian nominal GDP in the 1800s.

In this paper, I describe a parsimonious model of the S&P500.

A parsimonious model of the S&P500

A parsimonious model of the S&P500 with the specification

$$y = \alpha_0 t + \alpha_1 X_1 + \alpha_2 G_{X_1} + \alpha_3 X_1(-1) + \epsilon$$

where
y is the S&P500 index closing price on the 1st of the month
t is the number of months since June 2014
X_1 is the monthly return on the S&P500 index
G_{X_1} is the Ghosh factor of X_1
$X_1(-1)$ is X_1 lagged by 1 month
ϵ is the residual

is available here.

The End