Are Recessions Good for Your Health?

When Ruhm Meets GHH

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Abstract

This paper first documents several important business cycle properties of health status and health expenditures in US. We find that health expenditures are pro-cyclical while health status is counter-cyclical. We then develop a stochastic dynamic general equilibrium model with endogenous health accumulation. The model has four distinguished features: 1) Health enters into utility function; 2) Health enters into production function; 3) Both goods and time input are used to produce health stock; 4) Depreciation rate of health stock negatively depends on working hours. We calibrate the model to US economy. The results replicate the stylized facts of health status and medical expenditure over business cycles. We also investigate the relative importance of each feature in affecting the business cycle properties of health accumulation.

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