

Abstract

Social security systems in most developed economies are facing sustainability challenge due to demographic trends. Therefore social security reform proposals are on the agenda in many countries. This paper demonstrates that the analysis of fiscal sustainability of social security must include an additional dimension of public policy, namely education funding, which affects the productivity growth of future workers. This fact is true under both pay-as-you-go (PAYG) and fully funded (FF) social security system. While FF systems are known to be more conducive of national saving, some economists have conjectured that PAYG system have an advantage of an “intergenerational compact” leading to a relatively stronger political support for public education funding. This paper demonstrates that the latter conjecture may not be true in a closed economy framework. We consider an OLG economy where government, in addition to running social security, also funds education of future workers by means of taxes collected from the current ones. The education tax rates are chosen, in each period, by a majoritarian rule among the relevant constituents. We demonstrate, under conditions plausible for developed economies, that while the FF system produces political support for relatively higher (compared to PAYG) education funding, hence higher rate of human capital accumulation, as well as relatively higher rates of physical capital accumulation and economic growth, Furthermore, we show that under some meaningful conditions the FF system also results in lower degree of agents’ lifetime income inequality.