



# Social capital and the distribution of household income in the United States: 1980, 1990, and 2000

Lindon J. Robison<sup>a,\*</sup>, Marcelo E. Siles<sup>b</sup>, Songqing Jin<sup>a</sup>

<sup>a</sup> Michigan State University, Department of Agriculture, Food, and Resource Economics, United States

<sup>b</sup> Northern Michigan State University, United States

## ARTICLE INFO

### Article history:

Received 24 September 2010

Received in revised form 19 March 2011

Accepted 6 April 2011

### JEL classification:

D-31

### Keywords:

Social capital

Household income distributions

Socio-emotional goods

Social capital motives

Social capital indicator variables

Intensive (extensive) changes in social capital

## ABSTRACT

Social capital is a person or group's sympathy or sense of obligation for another person or group. The objects of sympathetic feelings have social capital. Those holding sympathetic feelings for others provide social capital. Because social capital providers internalize the consequences of their choices on the objects of their social capital, they trade with each other on different terms and at different levels than would occur in arm's length transactions, all other things equal. Furthermore, changes in the distribution of social capital alter the terms and level of trade which in turn alter the distribution of income.

This paper demonstrates mathematically the connection between changes in social capital and income distributions and then tests empirically the influence of social capital on household income distributions in the 50 U.S. states for the census years 1980, 1990, and 2000. The mathematical and empirical findings of this paper support the proposition that social capital measured by social capital indicator variables have important influences on the distribution of household incomes.

© 2011 Elsevier Inc. All rights reserved.

## 1. Introduction

Social capital is a multi-disciplinary concept that has been employed to explain a variety of socio-economic phenomenon. This paper employs social capital to explain variations in household incomes across the 50 U.S. states for U.S. census years 1980, 1990, and 2000. The main connection between social capital and household income distributions is social capital's influence on the terms and level of trade which in turn alters the distribution of income. This study follows a similar work by Robison and Siles (1999, RS) who found support for the hypothesis that social capital measured by social capital indicator variables was a significant influence on the distributions of household incomes in the 50 U.S. states for the census years 1980 and 1990.

In what follows we define social capital and explain why its applications in economics have been limited. Then, we introduce the concept of social capital into the standard neoclassical utility maximizing model and deduce several important outcomes. In particular we show that under certain conditions, increases in social capital can increase average income and reduce disparity of income between trading partners. In a later section, the macro

consequences of social capital are examined. The macro analysis is based on the fundamental assumption that increasing specialization and trade increase productivity.

Final sections of this paper examine the empirical evidence for social capital's influence on income distributions for the 50 U.S. states for census years 1980, 1990, and 2000. This paper concludes by restating earlier findings, that changes in social capital have important consequences on the distribution of household incomes in the U.S.

## 2. The difficulty of employing social capital in economic models

The definition of social capital adopted in this paper is that proposed by Robison et al. (2002b, RSS): social capital is: . . . a person or group's sympathy or sense of obligation for another person or group.<sup>1</sup> They defend their definition of social capital as sympathy because it takes seriously the capital metaphor and is social.

<sup>1</sup> Sympathy as used here is consistent with Smith's (1759) notion of sympathy and the definition found in Webster's Ninth Collegiate Dictionary; namely, sympathy is an affinity, association, or relationship between persons or things wherein whatever affects one similarly affects the other.

\* Corresponding author. Tel.: +1 517 282 4880.

E-mail address: [robison@msu.edu](mailto:robison@msu.edu) (L.J. Robison).

A long list of alternative social capital definitions have been suggested by Bourdieu (1985), Burt (1992), Coleman (1988), Fafchamps and Minten (1998), Flora and Flora (2003), Fukuyama (1995), Lin (2001), Narayan and Pritchett (1999), Putnam (2000), and Woolcock (1998) to name a few. However, RSS argue that many proposed definitions of social capital are not really definitions. Instead of defining social capital using statements like *A equals B*, many of its definitions equate it to its possible uses, where it resides, and how its service capacity can be changed. In addition, RSS argue that many of the proposed definitions of social capital fail to satisfy the fundamental requirements of capital. The consequence of social capital definitions that do not define and conflicting definitions that differ across the social sciences and which are not always consistent with the concept of capital has been to limit social capital's application, especially in economics, and made interdisciplinary communication about social capital difficult.

In an effort to separate the definition of social capital from other discussions related to social capital, Robison et al. (2004), Robison and Flora (2003), and more recently Robison and Ritchie (2010) proposed the social capital paradigm. The social capital paradigm separates the definition of social capital from what social capital produces, where it resides, how it is conveyed, the rules that organize its use, and the power associated with social capital.

### 3. Introducing social capital into the neoclassical utility maximizing model

Social capital as defined above introduces several changes into the neoclassical utility maximizing model. First, including social capital in the neoclassical model allows for sympathetic relationships to alter the terms and level of exchanges. Allowing sympathetic relationships to enter in the standard economic model also redefines externalities. An externality or spillover of an economic transaction is created when an agent can impose consequences on another agent not directly involved in the transaction without the agent's consent. A positive externality, for example, would be created when a home owner invests in and increases the value of her home and in the process improve home values for the entire neighborhood. A negative externality, for example, would be created when a factory pollutes a river and reduces the well-being of those living downstream.

When social capital providers create externalities for the objects of their social capital, they experience vicariously the effects of their choices on the objects of their social capital, internalizing what was once an externality. As a result, what is an externality may depend on the distribution of social capital.

An absence of social capital will motivate an agent to behave as if he were selfish. In contrast, the presence of social capital motivates decision makers to allocate more (less) resources to a project than their own profit maximizing output would require when there are benefits (costs) for those who own social capital. And if social capital is strong enough to induce an agent to weigh his/her own income and another agent's equally, then the agent will allocate resources to maximize the total of his income and the income of those who own social capital.

The main point of social capital is this: rational economic agents attempt to meet not only their own economic and physical needs, but their social ones as well. These social needs include the need for validation, the need to experience caring, and the need for knowledge of connections between actions and physical and social outcomes. Economic and physical needs are fulfilled by the consumption of goods and services provided by physical, financial, and human capital. Social needs are fulfilled by consuming socio-emotional goods created by social capital that resides in relationships. Including social capital in the standard neoclassical

economic model allows agents to allocate resources to meet both their economic and physical needs as well as their socio-emotional ones.

Traditional economic models include measures of profit and wealth may provide adequate proxies for economic goods and services in arms-length transactions. But these models contain no arguments that represent an agent's social needs, nor the mechanism through which these needs are satisfied. Thus, traditional profit and utility maximization models fail to account for social motives that often substitute for and sometimes complement the pursuit of economic goals. While some models such as principle agent (Laffont and Martimort, 2001), transaction cost (Coase, 1937), warm glow (Videras and Owen, 2006), club (Cole and Prescott, 1997), and altruism models (Rose-Ackerman, 1996) may mimic social capital outcomes, they do so inadequately because they do not recognize that social capital resides in relationships in which resources are invested and disinvested, and that one's social capital provides both economic and socio-emotional goods and services valued by agents.

The social capital model that is introduced next describes how sympathetic relationships influence how decision makers pursue their economic and social goals. It further enhances economic analysis by recognizing that social capital, like other forms of capital, can be changed through investment (disinvestment), maintenance, and used in ways consistent with well-accepted maximization principles.

### 4. Including social capital in the own utility maximizing model

In what follows we introduce social capital into the neoclassical economic model by assuming that people satisfy socio-emotional needs through vicarious experiences—something like watching an engrossing movie in which the viewer becomes involved with the actors, vicariously experiencing their successes and disappointments. In this approach the social capital providing agent *i* experiences the social capital owning agent *j*'s well-being vicariously and in the process earns a socio-emotional good. A social capital coefficient  $k_{ij}$  describing the degree to which agent *i* experiences vicariously changes in the well-being of agent *j*. The argument that vicarious experiences can produce socio-emotional goods has some support from a rich body of evidence that we choose the location and intensity of our vicarious experiences so as to maximize our own utility.<sup>2</sup>

#### 4.1. Social capital motives

In an earlier work, Robison and Schmid (1994) identified five distinct social capital motives. These motives include investing resources  $\alpha$  to increase one's own income,  $\pi_i(\alpha)$ ; investing to increase the income of a friend,  $\pi_j(\alpha)$ ; investing to increase the social capital one provides a friend,  $k_{ij}(\alpha)$ ; investing to increase the social capital one is provided by a friend,  $k_{ji}(\alpha)$ ; and investing to increase one's social capital with one's idealized self,  $k_{ii}(\alpha)$ . Robison et al. (2011) recently explored the relative importance of these motives and found them to be significant. The model they examined is expressed as:

$$\text{Max}_{\alpha} U_i[(\pi_i(\alpha), \pi_j(\alpha), k_{ij}(\alpha), k_{ji}(\alpha), k_{ii}(\alpha))] \quad (1)$$

Maximizing Eq. (1) over the resource  $\alpha$  leads to the five motives already discussed.

<sup>2</sup> A discussion of this point is found in Robison and Ritchie (2010).

متن کامل مقاله

دریافت فوری ←

**ISI**Articles

مرجع مقالات تخصصی ایران

- ✓ امکان دانلود نسخه تمام متن مقالات انگلیسی
- ✓ امکان دانلود نسخه ترجمه شده مقالات
- ✓ پذیرش سفارش ترجمه تخصصی
- ✓ امکان جستجو در آرشیو جامعی از صدها موضوع و هزاران مقاله
- ✓ امکان دانلود رایگان ۲ صفحه اول هر مقاله
- ✓ امکان پرداخت اینترنتی با کلیه کارت های عضو شتاب
- ✓ دانلود فوری مقاله پس از پرداخت آنلاین
- ✓ پشتیبانی کامل خرید با بهره مندی از سیستم هوشمند رهگیری سفارشات