## Externality and Strategic Interaction in the Location Choice of Siblings under Altruism toward Parents

Meliyanni Johar, University of Technology Sydney Shiko Maruyama, University of New South Wales. <u>s.maruyama@unsw.edu</u>.

http://research.tigrou.jp/

## Abstract:

While adult children wish the well-being of their elderly parents, the costs of caregiving and associated long-term commitment create a public good problem in families with multiple children. Children have incentive to free-ride on their siblings and informal care to the parent is underprovided. In this paper, we estimate an empirical discrete sequential game to investigate externality and strategic interaction among adult siblings regarding their location choice relative to their elderly parents. When relocation costs are non-negligible, the eldest child, who is likely to make the location decision before his younger siblings, may move far away from parents to free-ride on the caregiving provided by their younger siblings. Using data from the US Health and Retirement Survey (HRS), we find an evidence of a positive externality and strategic interaction. The well-being of elderly parents is a "public good", and children behave non-cooperatively. The value of sequential strategic move, or the first mover advantage, and the prisoner's dilemma are likely to exist but their implications are found negligible compared with family inefficiency due to externality. Externality is larger in a family with a widowed mother and with children who are younger (conditional on the parent's age) and have higher education. Efficiency loss (under the Kaldor-Hick criterion) due to externality is especially large when the widowed mother is educated and does not own a home and when children are married and similar to each other. The impact of this public good problem is striking. Among the 2010 HRS families with multiple children, had families fully internalized externality and maximized their utility sum, 17% more parents would have had at least one child nearby. Public policies that reduce children's private costs of providing care and attention to elderly parents may enhance social welfare.