

# Competitive equilibrium and the Core: discrete convex approach

横手 康二

早稲田大学 経済学研究科博士課程

## Abstract

In this research, we show the coincidence between the Core and the competitive equilibria in the market with indivisibility by utilizing discrete convex analysis. We consider the market in which consumers and firms trade indivisible commodities and money. Consumers demand at most one unit of commodity, and quasi-linearity is not assumed. Firms have  $M^\sharp$ -convex cost function. The difference with previous works is that firms can produce several types of commodities. We also prove the existence of a competitive equilibrium.