DETERMINANTS OF FUEL CHOICE AMONG INDIAN HOUSEHOLDS: AN EMPIRICAL INVESTIGATION

Abstract

This master’s thesis applies a Multinomial logit model to fuel choices and patterns of cooking fuels in urban and rural Indian households. A large microeconomic dataset is employed to carry out the analysis. Sample survey data collected from Indian households between November 2004 and October 2005.

It uses data collected by Indian Human Development Survey (IHDS) 2005 contains information on levels of living, poverty and inequality in Indian households from direct interview questionnaires. This survey was designed and implemented by the University of Maryland in collaboration with the National Council of Applied Economic Research (NCAER), New Delhi.

The results show that in addition to income, there are several socio-demographic factors such as education, sex of the head of the household, family size, and household’s asset, which are important in determining household fuel choice. In addition, the model performs better when information on the shares of different fuels in total useful cooking energy is included, and this suggests that it is important to incorporate multiple fuel use patterns in modeling fuel choice in the Indian context.