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## Categorising Farm Households for Policy Research

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### Abstract

Policymakers rely on researchers to predict the effects of policy-induced price/technology changes on product mix, production technology and ultimately on human welfare in rural areas. While all households are in some ways different, groups of households may make similar resource use decisions and may respond similarly to policy changes. Identifying such groups can be useful for targeting policy action, identifying important groups for predictive modelling, facilitating that modelling process and for cross-site comparisons. This poster suggests one way of categorising farm households into homogeneous sub-groups. Farm households were classified using a Principal Component Analysis combined with a Cluster Analysis using a new data set from the *Zona Bragantina* in the Eastern Brazilian Amazon. Emerging farm categories served as a sampling framework for collecting technical coefficients and other model parameters relevant for selected groups. Results suggest that this combination of multivariate techniques improves cluster interpretation by reducing the number of variables used to establish clusters. The inclusion of regional dummies in cluster analysis is controversial, but it can produce meaningful results if dummy variables contain information that is exogenous to farm households. The usefulness of identified farm household categories for research comparing land use and deforestation patterns in the eastern and western Brazilian Amazon is explored in the final section.

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