



Tropentag 2008  
University of Hohenheim, October 7-9, 2008  
Conference on International Research on Food Security, Natural  
Resource Management and Rural Development

---

## **Cattle Cooperatives in Cuba: How Will Policy Changes Affect their Members?**

Jaffé<sup>a</sup>, Mercedes, and Manfred Zeller<sup>a</sup>

<sup>a</sup> University of Hohenheim, Institute of Agricultural Economics and Social Sciences in the Tropics and Subtropics, 70593, Stuttgart, Germany. Email: jaffem@uni-hohenheim.de

### **Introduction**

In Cuba's agricultural sector, a number of segments coexist with varying types of property and use rights over land, livestock and machinery. Each sector has different organization types, which range from non-organized smallholders, cooperatives and collectives, as well as state farms. The state-controlled collective sector has most of the agricultural land (38%), while the one that produces most of the food and other agricultural goods is the private sector, with only 27% of the land. The state collectives are called UBPCs (Basic Units of Cooperative Production), and are under tight state control, even if they are officially listed as non-state (Alvarez 2004; ONE 2006, 2007). They are at the core of recent reforms directed at increasing food production and land use efficiency.

A number of publications have appeared, both inside Cuba and internationally, analysing the problems of the UBPCs from different points of view. Little or no attention has been paid to the household level characteristics of this sector. Only few household level studies have been carried out in the last 15 years in Cuba's agricultural sector (Deere *et al* 1995; Enríquez 2003). Nevertheless, these and other studies seem to point out that the worst-off sectors in terms of income are the salaried workers (Mesa-Lago 2003), such as the families of the UBPC workers.

In light of the little published information regarding the present status of the rural and agricultural households, as well as the factors that are related to their wellbeing, a study was planned in the eastern provinces of Cuba. The objectives of the study were:

- To describe the socio-economic characteristics of households of members of UBPCs, and explore variables associated with their poverty status
- To analyze the possible implications that policy changes could have on their poverty status, by relating it to UBPC variables such as production and economic performance; as well as other factors that will presumably be affected by the reforms

### **Methodology and data**

The mainly descriptive study combined quantitative and qualitative data, and included 30 cattle UBPCs and 172 members' households in the eastern part of the country. The provinces of Santiago de Cuba, Holguín and Las Tunas have the additional characteristic of being considered of the poorest and most food insecure of Cuban regions (PMA & IPF 2001). The collection of data was carried out with the help of standardized questionnaires focused on poverty indicators at household level (expenditures, dwelling and durable assets, after Henry *et al* 2003), semi structured interviews with UBPC members and directives, and experts in the sector. Observation and participation in numerous meetings and activities, from October 2007 to March 2008, also

were an invaluable source of information on subtle but important rules of behaviour. The survey data and interviews were carried out during the first three months of 2008. The possible impacts that the changes in policy could have on this sector are analysed by relating the poverty benchmark (household incomes) with variables that will be affected by the reforms.

The restrictions to carry out household level studies in Cuba are enormous. Surveillance and control by the authorities included modifications to the original questionnaire, selection of the households to be interviewed and active participation during the data collection process. Therefore, the data presented cannot be trusted to be representative, as was the original idea. Nevertheless, the case study approach can give important insights on the UBPC sector, and the possible changes that their workers could experience with the reforms.

### **Results and discussion**

It was found that households are generally small, consisting of an average of a little over 3 members. Many households do not have children, or their children live in boarding schools that are fully responsible for their nourishment and care. The educational level of the adults could be considered high, with less than 2% not having finished primary education and 47% having finished 12<sup>th</sup> year or having gone on to higher education.

In terms of occupation, it is worthwhile to notice a couple of things. First, it was not unusual to find several members of the same household belonging to the UBPC, and actually, it was observed that many of the interviewed households of any given UBPC were part of the same extended family. Other occupations that were relatively common were as salaried employees in the public sector (mostly education or agriculture). On the other hand, there is very little overlapping between different agricultural subsectors, meaning that very few of the households interviewed had members that consider themselves private farmers. This result contrasts strongly with the fact that around 80% of the interviewees produce food for home consumption. Mostly they keep small livestock, such as pigs and poultry, meaning they probably do not have land available for production. At the same time, during interviews it was observed that being considered a private farmer was something negative, and associated with being rich. Therefore, I would suppose that subsistence farmers do not consider themselves “farmers”, as this name is associated with marketing their produce. In any case, there seems to be little relationship between the UBPC members and private farmers or this relationship is hidden because it is perceived as negative.

Food consumption patterns included a high proportion of households consuming mostly foodstuffs provided through the rationing system, such as rice, bread and pulses, and in lower proportion, meat and eggs. Products not included in the rationing system, such as vegetables and tubers, were consumed relatively often, but not as much as the rationed ones. Other products not rationed, such as fruits or fish, were very seldom consumed. When asked about their life quality in general, food quality and quantity, as well the availability of cash to buy food were some of the most frequently mentioned problems. The fact that the UBPC sold them tubers and vegetables, or that they produced their own food, was seen as a positive aspect.

Household expenditures were calculated, and per capita expenditures were used as a poverty benchmark. The distribution of expenditures in some of the most important items can be observed in Table 1, where two groups of households according to their food production are compared. Households that produce their own food have a per capita value of food bought that is similar to those that do not produce, but they have the additional value of food produced that can be as high, or more, than the value bought. This means, that per capita values of food consumed in the household are approximately double for the ones that produce food for home consumption. One explanation could be that households with access to land or livestock have access to bigger quantities of food, or to more valuable foodstuffs, such as meat, eggs, roots and tubers. These foodstuffs are either not included in the rationing system, or only in a small amount (such as

eggs), and therefore have much higher prices, both in legal and illegal markets (ONE 2008). The differences in their total per capita expenditures are basically explained by food, with no other items showing significant differences. Other values not presented in the table include expenses for celebrations, remittances sent to family members, and others.

**Table 1: Annual household expenditures of two groups of members of cattle UPBCs, Cuba 2008**

Per capita expenses in Cuban pesos	HH produces food N=139		HH doesn't produce food N=33	
	Mean	Std. Dev.	Mean	Std. Dev.
<b>Value of food bought</b>	1.744,31	1.196,53	1.709,91	1.258,31
<b>Value of food produced**</b>	1.905,71	2.058,80	--	--
<b>Total value of food**</b>	3.650,01	2.652,47	1.709,91	1.258,31
<b>Clothes and shoes</b>	1.238,65	2.244,11	950,57	713,58
<b>Health, education and services<sup>2</sup></b>	233,39	214,06	248,30	141,29
<b>Housing, repairs, appliances<sup>3</sup></b>	728,46	1.257,33	461,37	709,41
<b>Transport</b>	275,65	362,38	204,53	320,92
<b>Total per capita annual expenditures** in Cuban pesos</b>	6.787,91	4.878,26	3.954,80	2.407,52
<b>Total per capita annual expenditures** in US\$<sup>4</sup></b>	<b>271,52</b>	195,13	<b>158,19</b>	96,30

<sup>1</sup> the stars \*\* show differences at the 95% of significance, according to the Mann-Whitney test

<sup>2</sup> services include electricity, water, telephone and community fees

<sup>3</sup> includes rent, repairs, and purchase of household appliances, such as refrigerators

<sup>4</sup> using the official exchange rate of 25 Cuban pesos = 1 US\$

As may be already guessed from the above presented results, per capita annual expenditures are strongly correlated mainly with food-related indicators such as the consumption of roots and tubers, or whether the family has livestock or plant production. Other variables related to the family structure, education level or occupation, for example the position that the household member has in the UBPC, are only weakly correlated, if at all, with the chosen poverty indicator. This probably reflects the homogeneous characteristics of the population, for example in terms of education, and the egalitarian policies of remuneration and social services. On the other hand, the accumulation and value of durable assets, for instance vehicles, transport animals or refrigerators, were also strongly correlated with expenditures, and indicate the long term income of the households. Curiously, the quality or repair status of the dwelling did not have any correlation with expenditures. It is possible that this is related with the general housing problem that Cubans face, including a lack of building materials, and the prohibition to sell or buy houses.

The relationship between household expenditures and the type of UBPC the members belong to was also explored. In general, it can be said that the researched UBPCs vary greatly in terms of size, be it land, number of workers or cattle herd size. For example, their area ranges from 350 to over 3.400 hectares. They also show marked differences in their production levels both of their main and secondary products. Primary production was milk and meat, and secondary activities ranged from vegetables, fruits and tubers for member consumption, to coal and wood. The UBPCs are forced to sell all their milk and beef to the State, while other production activities can be used for member consumption. However, the importance of these secondary activities was highly variable. The economic performance of the UBPC, expressed by their annual net benefit, ranged from losses of more than 100 thousand pesos, to profits of over half a million pesos.

Regardless of the huge disparity in all UBPC variables, the only ones that had any correlation with household level expenditures were the ones related to food production for member consumption. These results indicate that there is little, if any, connection between the economic

performance of the cooperative and the economic wellbeing of the members. It also points toward the failure of the State to establish a performance-related salary system in the UBPCs, as was one of the objectives of the creation of these collectives (Alvarez 2004; López 2007).

All these results, and especially the lack of a mechanism to transfer the benefits (or losses) of the UBPC to their members, suggest that any reforms aimed at increasing production or profitability at the UBPCs will have little or no impact at household level. This brings us to the question of what kind of reforms have been announced. The reforms were announced in Cuba at the end of 2007 and beginning of 2008, but public information concerning their nature, extent and timing is still sketchy. We had the exceptional opportunity of meeting with Agricultural Ministry authorities, and of learning first-hand the main points of these reforms. They will try to tackle production and land degradation problems by granting more autonomy to the UBPC sector, as well as better access to markets and services, and by allocating unused state land to private producers and cooperatives (López 2007, 2008 personal communication).

Whether these reforms will be deep and bold enough to solve production problems at UBPC level is still to be seen. It is worrying that there seems to be no change towards the internal functioning of the collective, and in particular, to their profit distribution mechanisms. These changes could have several important consequences: first, it would not solve the possible incentive problems at worker level, and it would not stimulate an increase in production or a better use of resources. On the other hand, the population dependant on the UBPCs would not benefit from any improvements, unless they are granted land for their private use. I believe that it is not very probable that UBPC members will receive land, as very few of them are considered farmers. I also think that authorities are not interested in promoting a competition between both sectors (UBPC and private), because it would probably lead to a labour problem for the UBPCs.

### **Conclusions and outlook**

We can conclude that food access seems to be the single most important determinant of poverty of UBPC member households. Households that have subsistence production have better access to food and higher household expenditures. The UBPCs can improve the access to food for their members by producing vegetables, roots, tubers and other foodstuffs, but are apparently unable to improve the families' cash availability. Reforms aimed at improving the production and economic performance of the UBPCs will probably not influence the household welfare if the internal functioning of the collective is not altered.

### **References**

- ALVAREZ, J. (2004). Cuba's Agricultural Sector. Gainesville, University Press of Florida.
- DEERE, C. D., GONZALES, E., PÉREZ, N., AND RODRIGUEZ, G. (1995). Household Incomes in Cuban Agriculture: A Comparison of the State, Co-operative, and Peasant Sectors. *Development and Change* 26 (2): 209-234.
- ENRÍQUEZ, L. J. (2003). Economic reform and repeasantization in post-1990 Cuba. *Latin American Research Review* 38 (1): 202-218.
- HENRY, C., SHARMA, M., LAPENU, C. AND ZELLER, M. (2003). Microfinance poverty assessment tool. Washington DC, The World Bank.
- LÓPEZ L., A. (2007). Tras el hilo del ovillo. Hacia una gestión estratégica en las UBPC (First part). Editorial José Martí, La Habana.
- MESA LAGO, C. (2003). Las crecientes disparidades económicas y sociales en Cuba: Impacto y recomendaciones para el cambio. Cuba Transition Project. Miami, University of Miami, Institute for Cuban and Cuban-American Studies: 72.
- OFICINA NACIONAL DE ESTADÍSTICAS DE CUBA ONE. Annual statistics for years 2005, 2006, 2007. Available online at: [www.one.cu](http://www.one.cu) (July 2007, April 2008).
- OFICINA NACIONAL DE ESTADÍSTICAS DE CUBA ONE. (2008). Sondeo de precios en el mercado informal, febrero 2008. Available online at: [www.one.cu](http://www.one.cu) (April 2008).
- PROGRAMA MUNDIAL DE ALIMENTOS PMA AND INSTITUTO DE PLANIFICACIÓN FÍSICA IPF. (2001). Análisis y Cartografía de la Vulnerabilidad a la Inseguridad Alimentaria en Cuba. World Food Programme, La Habana.