FOOD SECURITY AND SUSTAINABILITY OF AGRICULTURE IN ASIA*

by: Roel R. Ravanera and Aquilina L. Galang

1.0 Food Security Situation in Asia

Two-thirds of the malnourished population of the world or close to 900 million is in Asia and the Pacific region. The total number of malnourished Asians, exceeded the total populations of all Western Europe, all Africa, all the Middle East, and not much below the human total for the entire

Western Hemisphere, which includes such large and populous nations as Brazil, Mexico, and the U.S (FAO, 1997). The incidence of undernutrition is highest in South Asia at 19% to 37% of its population or more than one-third (284 million) of the world's undernourished people. Half of the children under five in South Asia are underweight.

This poverty situation occurs despite the progress in per capita food production and the improvement in the marketing and distribution systems to provide access to cheaper foods. Economic access improved as most countries in the region experienced relatively high levels of growth in aggregate and per capita incomes in the 1980s up to mid-1990s. Over the period 1965-1996, national output increased at annual average rates, ranging from 4.6% in South Asia to 7.4% in East Asia and the Pacific, well above the population growth rates. As a result, per capita incomes grew at 2.2 and 5.5% in the respective sub-regions. Yet, because of the inability of the rural poor to participate in the growth process, poverty and food insecurity remains to be a reality in most rural households.

The Asian financial crisis in 1997 pushed Asians further down the poverty line. In Thailand, poverty incidence has increased from 11% in 1996 to 13% in 1998. In Indonesia, official estimates by the Indonesian Central Board of Statistics put the mid-1998 poverty incidence at 39%, or 79 million people. This means that in less

ANGOC's 200-Village Project, an on-going initiative to assess the level of household food security as concrete ground for community planning and national/regional policy advocacy, has comparatively revealed the seriousness of poverty and food insecurity problems among rural households in selected Asian countries. The initial results of the perception survey of 3,090 households from Bangladesh, Pakistan, Philippines, Sri Lanka and Thailand have shown that only 53% of the households are food secure.

In the five Asian countries, rural households of five- to six-member earn an average of 3.0 US\$ per day. Eighty per cent of this is cash income, while the rest is received in kind. These income levels, including the slightly elevated ones, have consigned the majority of Asian rural households to a state of chronic food insecurity. These survey findings confirm the World Bank 2000 report that as many as 1.2 million people in developing and transition economies were making do with less than a dollar a day.

The basic factors affecting food security based on the initial results of the baseline survey in five countries include access to land, productivity and access to credit and markets.

than two years within the crisis, the proportion of poor people in Indonesia had slipped back to where it was more than 15 years ago, and the absolute number had increased by 1.5 times during

^{*} Paper presented by ANGOC at the Philippine Agricultural Economics and Development Association (PAEDA) Biennial Convention; 25 October 2001; Century Park Hotel, Manila, Philippines.

the same period. In the Philippines, according to World Bank estimates, the number of poor people had increased by 655,000 in 1998. In Malaysia, the poverty incidence is also estimated to have increased from 6.8% in 1997 to 8.0% in 1998.

2.0 World Food Summit: A failed attempt to reducing hunger by half in 2015

The World Food Summit (WFS)** in 1996 brought together heads of states and government representatives of 185 countries in Rome to address the problem of global hunger and poverty. It led to a Declaration and a Plan of Action with the aim of reducing by 50% the number of hungry people by the year 2015. Latest information from FAO however, reveals that the estimated average annual reduction in the number of undernourished people in the world is 8 million. This is far below the average rate of 20 million per year necessary to reach the 2015 target set by the WFS.

Food Security, Productivity and Agricultural Sustainability

The **200-Village Project** baseline survey in five Asian countries show that there is a positive correlation between food security and agricultural productivity. Hence, the current low levels of farm productivity would explain the incidence of food insecurity. In all five countries, a larger percentage of households classed as food secure (albeit in varying degrees) harvested an average of about 3,500 kilos or more of rice per hectare than food insecure ones.

However, shifting to high input agriculture does not guarantee food security. The fact that majority of the food insecure households practice traditional agriculture would seem to make a case for improvements in agricultural technology. Asia's farmers cannot hope to augment their incomes, much less thrive in the globalized trade of agricultural goods, given their present practice of agriculture. While the survey does show that farmers engaged in high-input conventional agriculture are relatively better-off compared to other households, the former group's better financial situation may have preceded, rather than resulted from the shift in farming practice. For instance, it is more than likely that the households engaged in conventional agriculture already owned "good farm land" to begin with, as the hybrid varieties perform best in irrigated fertile lands. They would also have the capacity to buy expensive external inputs. However, what is disturbing is the fact that as much as 37% of these supposedly well-off farmers are food insecure in varying degrees.

For resource-poor farmers, shifting to high-input conventional agriculture is not a viable alternative. The situation requires a shift towards a more sustainable farming system utilizing local resources.

The glaring reality remains that percentage wise attaining food security has been a very slow climb. As previously stated, over 2/3 of the world's malnourished children live in Asia. Around 6.6 million or 54% of 12.2 million deaths among children under five is associated with malnutrition in developing countries. Again, life expectancy is lowest in South Asia and other countries with the highest levels of undernourishment. On the quality of food, Asian countries have obtained 70% or more of their diet from cereals, roots and tubers within 1996 to 1998. This indicates a

relatively poor diet, which perhaps accounts partly for the number of undernourished in the region. Of the Asian countries, Bangladesh posted the highest percentage consuming 84% starchy staples, a rate far exceeding the total dietary energy supply (DES) coming from starchy food.

**

^{**} At the time this paper is being prepared, FAO announced that WFS-FYL might be postponed to June 2002.

Asia and the Pacific has also become a disaster-prone region in the world with its high population density, environmental degradation and continuing migration to vulnerable areas. Increasing difficulties in improving disaster preparedness are hampered by a decrease in food aid, increasing natural disasters, reduction in food subsidies and a shift of people's livelihoods away from food production.

The World Food Summit – Five Years Later (WFS-FYL) to be held in Rome on 5-9 November 2001 will again bring the heads of state and government from around the world to evaluate the implementation of the commitments and to take systemic measures to achieve the original target. No renegotiations of the texts of the WFS Declaration of Plan of Action are expected. Agriculture has been a major focus in the World Food Summit. The third WFS commitment states that participatory and sustainable food, agriculture, fisheries forestry and rural development policies and practices in high and low potential areas will be pursued, being essential to reliable and adequate food supplies at the household, national, regional and global levels; as well as combating pests, drought and desertification, considering the multifunctional character of agriculture.

3.0 SOME of the Major Issues in Asian Agriculture: Civil Society Perspective

NGOs/CSOs, alarmed by the slow progress in the implementation of WFS commitments, convened two regional consultations to discuss issues and recommendations mostly concerning agriculture in the region. The first consultation was held in Yokohama, Japan in August 2000 and the other was conducted recently in Bangkok, Thailand on August 2001. The following are among the major issues raised.

3.1 INEQUITABLE ACCESS TO PRODUCTIVE RESOURCES

Issues:

Governments in the region have never seriously applied themselves to implementing genuine agrarian reform. Some progress has been made in land registration and in improving tenancy rights, but changes in the order of giving land to the tiller remain an unfinished agenda. Genuine agrarian reform is imperative not just because social justice demands it, but because widespread landlessness has been shown to cause social and political upheaval that could engulf the whole process of development.

Attempts to privatize common property resources through a variety of licensing agreements as well as their over-exploitation by private companies are undermining the sustainability and access by the poor to these resources. In fisheries, for example, rampant encroachments by big commercial fishers on coastal waters have resulted in a serious decline of fish catch among small fisherfolk. Mangroves, which are spawning ground for fish, are cut down to make way for aqua-farms (e.g. shrimp farms). This widespread practice not only results in declining fish populations, but also in the salinization of lowland areas adjacent to shrimp farms.

Recommendations:

- a. Fast-track the implementation of existing agrarian reform laws that consolidate access, ownership, control and management of resources without gender and ethnic discrimination of small farmers, fisherfolk, and other producers.
- b. Implement appropriate land use and policy planning to discourage conversion of agricultural land to real estate and other purposes.
- c. Regulate the awarding of license agreements that give big corporations control over the sue of common property resources, such as forests, mangrove areas, and fisheries in manner that do not deprive the rural poor equitable access to sources of livelihood.
- d. Community based sustainable resource management (CBNRM) schemes should be instituted to allow local people to sustainably manage land, water, forests, fisheries, mangroves, and other common property resources.

3.2 TRADE LIBERALIZATION AND COMMERCIALIZATION OF AGRICULTURE

Issues:

The conventional wisdom that national self-sufficiency was the best guarantee of food security has been replaced by the idea of a global free market. <u>Increasingly</u>, governments are relying on <u>trade</u> to ensuring food security.

A logical extension of food security policies based on trade liberalization is the commercialization of agriculture. Much of governments' resources and many of their programs are being used and designed to promote large-scale, industrial farming operations to the neglect of small, family-size farms, especially in marginalized areas.

Moreover, deregulation and privatization and cutbacks in public spending in the 1990s have led to a <u>decline in investment in agriculture and public support services</u>. Small-holder operations and family-size farms stand no chance against the economies of scale commanded by the commercial producers, and are forced out of business in the rural poor communities, are <u>increasingly</u> under threat from large industries and multinational corporations.

Recommendations:

- a. Clearer policy and concerted action is needed for raising the levels of food self-sufficiency through increased and sustainable domestic agricultural production since this is the most important source of livelihood for the rural poor communities.
- b. More focused attention should be paid to the problems of **small farming communities**, **fisherfolk**, and other small local producers forming the majority of the rural poor in the region. Even those countries that lack natural comparative advantages may have to engage in agriculture to ensure employment and income of the rural dependent on agriculture, at least until a smooth transition to a more rewarding and sustainable enterprises takes place. **Governments should facilitate such transition** by providing productive sustainable technologies, capacity building and support services accessible to small and marginal farmers and the landless.
- c. Multi-functionality of agriculture should be recognized. To promote the social and economic viability of rural areas, it must be concerned not just with domestic agricultural production, but with achieving sustainable food security, through conserving land and the natural environment, maintaining and revitalizing rural communities, and generating rural employment, among others.
- d. Agricultural trade liberalization should be pursued only to the extent that it promotes domestic food security. **The emphasis should be on domestic production.**

3.3 AGRICULTURAL INTENSIFICATION

The "Green Revolution" technology promoted in the 1970s as a long-term solution to recurring and expected global food shortages has not succeeded in its mission. From the start, small and subsistence farmers, who comprised the majority in the region's food producers, were passed over by the new technology. Lack of access to formal sources of <u>credit</u> rendered this capital-and input-intensive practice effectively beyond their reach. Nor did it prove of much help to those who tilled hilly, arid or swampy areas, lands with poor soil, lands perennially seared by drought or submerged in floods. Those who initially benefited from the new farming practice quickly became acquainted with its downside. The hybrid crops did turn in an impressive performance, but one that, it turned out, was chemically induced and only chemically-sustained. But as prolonged use of chemicals and heavy machinery took their toll on the land, productivity tapered off. The farmers compensated by applying progressively bigger input doses, which further undermined the land's carrying capacity. Government subsidies, which made the inputs much cheaper than they would have been, exacerbated the farmers' tendency to use more inputs than was necessary. Yields dropped just as the debts started piling. Thus, it set off cycle of indebtedness that impoverished a great number of farmers in the region.

Recommendations:

- a. Sustainable food security must be the guiding principle. The demands of food security should not be used to justify the overexploitation of resources and damaged to the environment. Rather, food security initiatives should incorporate the dual objectives of producing enough for present needs without compromising the ability to meet future demands. This implies the need to promote environment friendly, sustainable, yield improving technologies compatible with resource endowment of poor farmers.
- b. Ensure that loans or investments targeted to the agricultural sector have, at the very least, a strong sustainable agriculture (SA) component to overcome economically and environmentally unsustainable overly agro-chemical dependent mode of production.
- c. Continue and sustain research on SA to adapt it to particular farming conditions, and consolidate productivity gains. This effort should be a partnership between farmers and "scientists" in formal research institutions.

Sustainable approaches to promote would generally include, among others (i) <u>balanced</u> and integrated plant nutrient management (ii) environmentally safe, non-polluting and <u>sustainable pest management approaches and (iii) sustainable energy systems based on renewable sources such as solar, wind, hydro and biomass.</u>

d. Continue the analytical work to develop a comprehensive framework, which takes into account among other things the multifunctional character of agriculture to further contribute to the policy formulation for enhancing sustainable agriculture and rural development.

3.4 THE MARGINALIZATION OF WOMEN IN AGRICULTURE AND DEVELOPMENT PROCESSES

Issues:

In Asia and the Pacific, the women are responsible for half of the workload. Yet, the demands on them are not matched by access to and control of the necessary resources.

In many countries, women are barred, not just by custom but by law, from holding property rights. Conjugal property rights are not even everywhere recognized. The same patriarchal thinking permeates institutions, notably government, from whom reform is expected to come.

Women are also generally denied access to credit because they have no negotiable property. The result is increasing feminization of food insecurity. If efforts to achieve sustainable food security are to make any impact, then they must address the present inequality between women and men.

Recommendations:

- a. Amend existing laws to institutionalize equal access of men and women to land and other productive resources.
- b. The <u>technological bias that favors men</u>, particularly in agriculture, should be addressed. Agricultural technology has mechanized many of the tasks traditionally assigned to males; on the other hand, it has <u>largely failed</u> to reduce the drudgery of work associated with <u>women</u>. More active intervention is necessary to address this imbalance.
- c. Build women's capacity and skills to participate more fully in development processes and enhance women's access to production credit, which are presently constrained by lack of negotiable property rights. In this regard, innovative micro-credit programmes packaging provision of credit along with skill development would be effective in empowering rural poor women.
- d. It is likewise indispensable that women are organized at the local and national levels. At the same time should be given **access to information**, including agricultural, sales and agriculture-related regulations so that their participation in dialogue, and decision-making will be meaningful.

4.0 Conclusion

The right to food is really no less than the right to life. Few people would seriously dispute that food is a basic human entitlement. Food, like air and water, is indispensable to survival and on humanitarian grounds, no person should have to go without it.

Hence, there is no way but to recognize the direct role of agriculture in guaranteeing that a basic human right to food will never be denied to anyone. And the lesser chance one is given to produce its own food the greater is the possibility for food insecurity, especially in the context of unfair and unjust systems. The inequitable access to productive resources, trade liberalization and commercialization of agriculture, agricultural intensification and marginalization of women in agriculture and development processes are critical issues that threaten sustainability of agriculture in Asia and the pacific region. Unless carefully considered, they will reinforce the projection that it is impossible to attain the goal of reducing the number of undernourished by half.

ANGOC's 200-Village Project is built upon this perspective and hopes to contribute to poverty eradication by overcoming hunger through community action. Any effort that sincerely intends to promote food security must seriously consider the real situation at the household and community level. Their perspective and participation contributes largely to understanding the real issues of concerning poverty and food security and in identifying the real solutions.

The World Food Summit-five years later will provide venue for key stakeholders, particularly governments, civil society/NGOs and the FAO to assess the implementation of the commitments to eliminate food insecurity. In this global event, the importance of exacting accountability, strong political will and multi-stakeholder effort in combating poverty should be strongly recognized for amore food secure Asia.

References:

Asian NGO Coalition for Agrarian Reform (ANGOC); "Asian NGO Perspoectives: The ADB Poverty Reduction Strategy"; July 2001.

FAO-RAP and Asian NGO Coalition for Agrarian Reform and Rural Development (ANGOC); "FAO-NGO/CSO Consultation Report"; Yokohama, Japan; 27-29 August 2001.

P.K. Mudhbahary, FAO-RAP; "Food Security in Asia and the Pacific Region: Concerns and Expectations Among NGOs and CSOs"; Tokyo, Japan; 17-20 September 2001.

R. R. Ravanera, et. al., "Overcoming Hunger through Community Actions"; 200-Village Project Regional Conference; 27 August 2001, Bangkok, Thailand.