Oriental Vegetable Project in the Republic of Honduras
Oriental Vegetable Project in the Republic of Honduras

A. Project Objective

Assist Honduran farmers with improving agricultural cultivation techniques and raising incomes.

B. Project Background

In Honduras, the agriculture sector accounts for 35.9 percent of the workforce. Within the sector, Comayagua Valley has long been one of the country’s key production regions due to its favourable geographic and natural environment.

In 1994, several well-established crops in the valley (e.g. sweet pepper, tomato) were severely damaged by pests and disease, leading to serious financial losses for farmers. In order to recoup these losses and improve the long-term prospects for the farmers, the International Cooperation and Development Fund (TaiwanICDF) introduced several varieties of oriental vegetables to the area, including eggplant, bitter melon, leek blossom and cucumber. The project was implemented by the TaiwanICDF’s Taiwan Technical Mission (TTM) in Honduras.

The TaiwanICDF, established by the government of the Separate Customs Territory of Taiwan, Penghu, Kinmen and Matsu, operates from 29 permanent technical missions in 28 partner countries across Africa, Central and South America, the Caribbean, Asia-Pacific and Central Asia. The organization assists partner countries to develop their human resources and achieve sustainable socio-economic growth.

C. Design and Implementation

The vegetable varieties chosen to be cultivated as part of the project were selected on the basis of several common advantages: relatively high yields; resistance to pests and diseases; and, easy management. Furthermore, there already existed, and still exists, a market-driven demand for these products from the presence of a large Asian-American population within the nearby United States. In addition to assisting farmers with on-site production, the TTM has also been working with local packing houses to streamline processes such as packaging, freezing and quality control, as well as the final exporting to the target markets.
D. Problems Encountered

Initially, Honduran farmers had insufficient knowledge of cultivation techniques and were unable to acquire loans that would otherwise allow them to invest in their own operations.

E. Factors for Success

The TTM was able to make significant improvements to the quality of the varieties under production, while also improving associated cultivation techniques. Mission specialists established a fast-breeding system for seedlings, organized and supported the operations of farming cooperatives, operated a pilot scheme to support marketing and promotion teams, and provided loans to farmers for the purchase of seedlings.

F. Results and Achievements

By 2006, the export volume of oriental vegetables from the Comayagua Valley region had reached 49.89 million tons, earning more than US$ 30.12 million. At present, 1,000 hectares of cultivated farmland and four packing houses in Comayagua Valley are dedicated to the production of oriental vegetables. To manage and minimize risk, the project was designed in such a way as to ensure that the work of stakeholders – including local farmers, the TTM, packing houses, Honduran exporters and US importers – continues to be coordinated at all points in the supply chain.

According to official statistics from the government of Honduras, 1,702 containers of produce were exported in 2009, generating foreign exchange earnings for that year alone of US$ 28.6 million.

The TTM has performed a number of upgrades on the project since 2009, in particular by diversifying product lines and developing new varieties of crop. At the same time, mission personnel have passed on their knowledge of seed collection and propagation to local packing houses, allowing such enterprises to produce plantlets for onward distribution to contracted farmers.

As part of the project, the Honduran Ministry of Agriculture’s Bureau of Agricultural Science and Technology (DICTA) and Bureau of Animal Husbandry (SENASA) have
provided guidance and assistance to farmers by conducting a pest survey and by exploring the possibility of expanding into regional markets. Specialists from SENASA have been responsible for visiting packing houses to grant certification as required for export.

Throughout the course of the project, the TTM has focused not only on agricultural production on-site, but also on providing guidance and assistance to associated business operations. Widening regional production to include oriental vegetables has improved working conditions and wages among local Honduran families and enabled them to send their children to school.

G. The impact of the project after transfer the ownership

As mentioned above, roughly 1,000 hectares of oriental vegetables are now under cultivation in Comayagua Valley, with four packing houses engaged in associated business operations. Local farmers, the Taiwan Technical Mission in Honduras, packaging houses and exporters and importers have participated as stakeholders in the project, forming a supply chain that has boosted production and significantly reduced business risks.

Inverciones Mejia Company is the biggest exporter of oriental vegetables in Honduras. The company initially worked with just 14 farmers and has since expanded to the point where it retains more than 2,000 farmers under contract. Mejia was one of the first packing houses to cooperate with the TTM, and has continued to maintain close relations with the mission up to the present.

In 2008, the project was replicated and implemented in Olancho, eastern Honduras. The TTM plans to transfer ownership of this project to local stakeholders after a four-year period, with the expectation that this schedule will secure the sustainable development of project operations and improve the living standards of the beneficiaries.
### Appendix 1: Production outputs for Oriental Vegetable Project

<table>
<thead>
<tr>
<th></th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Seedlings supplied by Taiwan Technical Mission (1,000 units)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>1,677</td>
</tr>
<tr>
<td></td>
<td>480</td>
<td>530</td>
<td>600</td>
<td>67</td>
<td></td>
</tr>
<tr>
<td><strong>Quantity of production overseen by Taiwan Technical Mission (1,000 lb.)</strong></td>
<td>5,130</td>
<td>6,270</td>
<td>8,550</td>
<td>960</td>
<td>20,910</td>
</tr>
<tr>
<td><strong>Area of production overseen by Taiwan Technical Mission (ha.)</strong></td>
<td>70</td>
<td>77</td>
<td>105</td>
<td>10</td>
<td>262</td>
</tr>
<tr>
<td><strong>Value of production overseen by Taiwan Technical Mission, at original purchase price (US$ 1,000)</strong></td>
<td>720</td>
<td>880</td>
<td>1,200</td>
<td>120</td>
<td>2,920</td>
</tr>
<tr>
<td><strong>Foreign earnings (US$1,000)</strong></td>
<td>22,000</td>
<td>28,000</td>
<td>32,000</td>
<td>28,600</td>
<td>110,600</td>
</tr>
<tr>
<td><strong>Sales volume (1,000 lb.)</strong></td>
<td>17,100</td>
<td>17,960</td>
<td>24,230</td>
<td>23,820</td>
<td>83,110</td>
</tr>
</tbody>
</table>