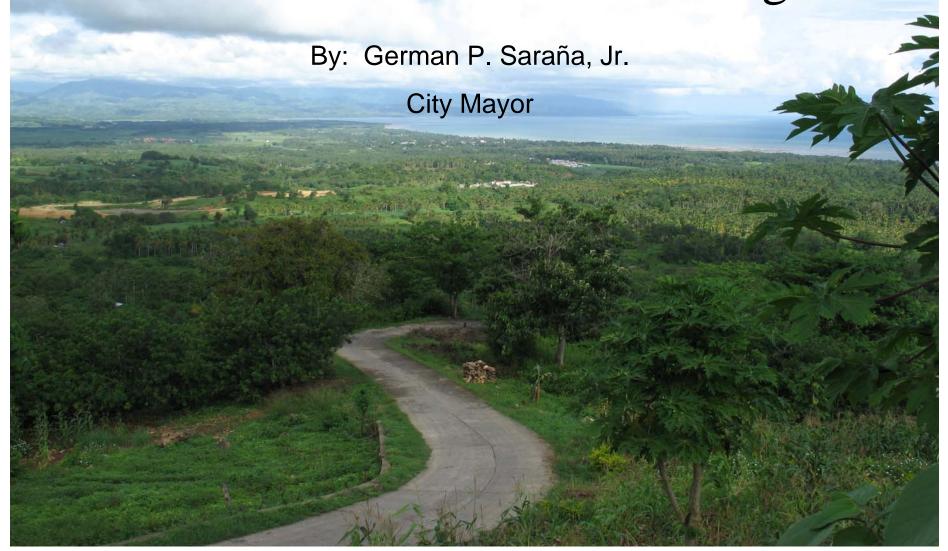
# Bayawan City Adopts Ecosan as a Tool in Health and Environmental Management



# **BAYAWAN CITY PROFILE**

• Population : 105,000

Area: 69,908 hectares

• 28 barangays (7 urban, 21 rural)

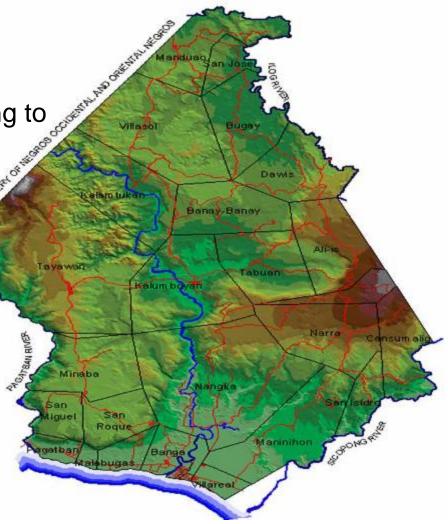
Predominantly hilly, moderately sloping to

rolling terrain

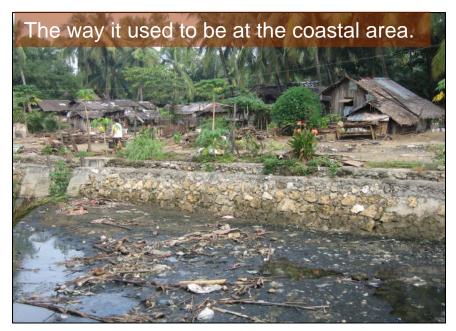
Major crops: sugar, rice, corn

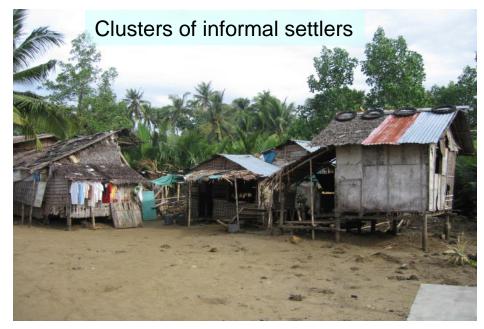






# THE ROAD TO ECOSAN









#### **CHALLENGES IN LOCAL SANITATION**

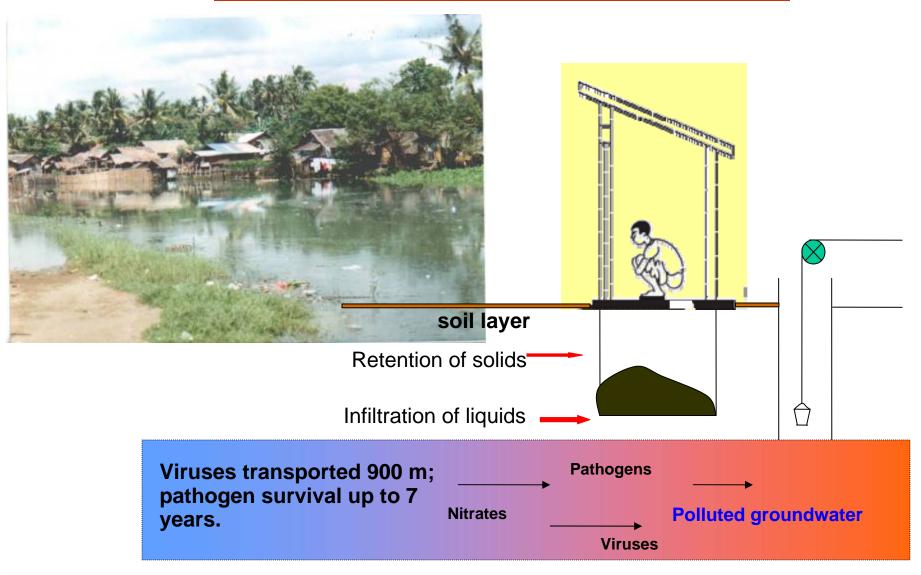


- RA 9275 Clean Water Act of 2004
- PD 856 Sanitation
  Code of the Philippines





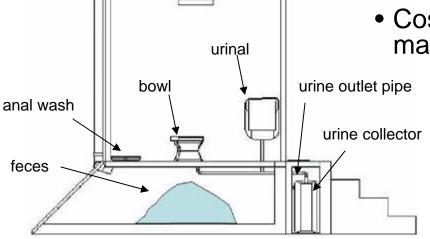
## The Typical Toilet Scene - A Septic Challenge



500,000 morbidity and 4,200 mortality cases a year in the Philippines

#### **DESIGN FEATURES OF OUR UDDT**

- Does not need septic tank
- Feces and Urine go into two (2) separate containers / chambers which serve as storage area.
- Cost is variable, depending on the type of materials used



ventilation







#### **Collaboration / Mobilization / Implementation**

- The Mayor creates a Technical Working Group to implement ecosan dry toilets in the city.
- A Project Management Team was also formed to carry out various components in the constructed wetland project
- Both teams worked with GTZ experts and consultants regarding details of the projects



TWG maps out plans and strategies



GTZ experts conducting inspection and project appraisal





City Mayor leads the way in advocacy of ecosan, and social preparation of qualified users



structure as key strategy

## Sanitation Concept of Bayawan City (1)



 For rural / hinterland areas with scattered population, the use of onsite ecosan facilities in the form of Urine Diversion Dehydration Toilets with re-use of urine and feces.





## **Sanitation Concept of Bayawan City (2)**

 For peri-urban areas with dense population, installation of decentralized waste water treatment with re-use options for sludge and effluent





## **BENEFITS AND ADVANTAGES**



- Reduced pollution of the downstream environment and contamination of water for the protection of human health
- Conservation of water resources







## **MORE BENEFITS AND ADVANTAGES**



 Enhancement of agricultural productivity by treating human waste as a resource

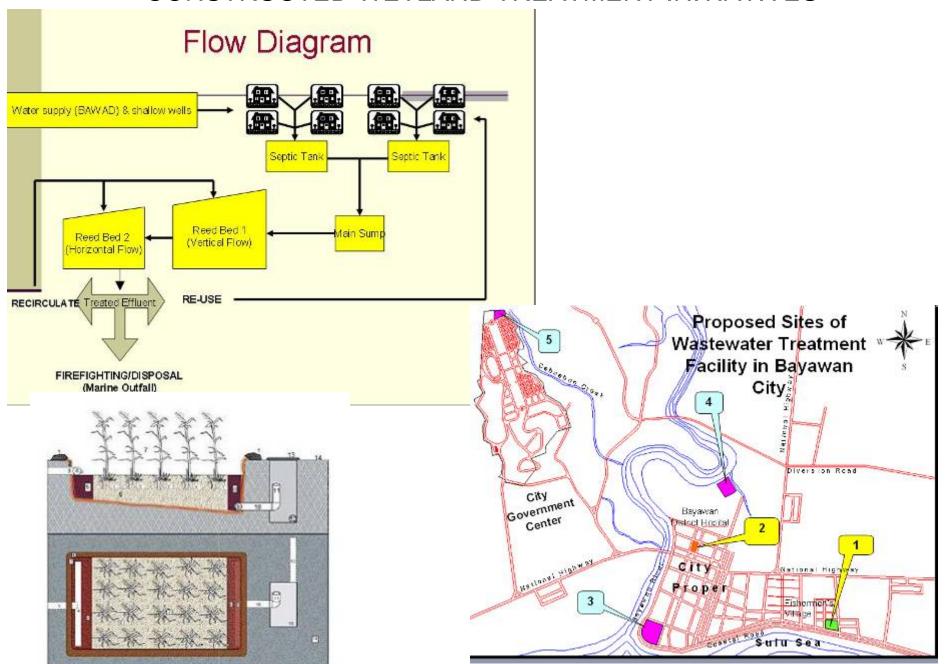






 Protection of the environment and promotion of the general well-being

#### CONSTRUCTED WETLAND TREATMENT INITIATIVES



# **SOME OF THE TOILETS USED BY RURAL HOUSEHOLDS**



Barangay Minaba



Barangay Banay-banay





## **ECOSAN DRY TOILETS FOR PUBLIC USE**



Barangay Tayawan



Barangay Narra

 These toilets were installed by the city at Barangay Agricultural Development Centers to promote the concept of re-use for farm production

Barangay Kalumboyan

## **INTEGRATION WITH THE CITY'S MAJOR PROGRAMS**









- Healthy City
- Watershed Development
- Coastal Resource Mgt
- Solid Waste Mgt
- Organic Farming
- Poverty Alleviation
  Rubber, Jatropha, Coconut, etc
- Character First
- Forest Land Use
- Food Security
- Eco-Tourism







#### LAUNCHING AND INAUGURATION: ONWARDS TO ECOSAN









