

Uganda



# Carbon Finance in the Solid Waste Management:

Emergence of Innovative Approaches  
(What Progress has been Made?)

National Environment Management Authority

Experience and lessons learnt from Uganda's  
POA- MSW Composting  
(first PoA in Africa)

*By: Dr. Aryamanya-Mugisha, Henry  
Executive Director - NEMA, Uganda*





## The Problem





# Amount of Waste Generated in 9 CPAs

Town	Population '02	Tons Per Day
F/Portal	40,903	60.6
Jinja	71,213	105.5
Kabale	41,344	61.3
Kasese	53,907	79.9
Lira	80,879	119.8
Mbale	71,130	105.4
Mbarara	69,363	102.8
Mukono	46,506	68.9
Soroti	41,711	61.8




Uganda



Location of CPAs / Sites for MSW-Composting

under CDM by NEMA-Ug and Urban Councils (MoUs signed)

### Key

 9 Current Sites  
= 8 Completed & operational

 New Sites  
= 8



# NEMA's Obligations To The Urban Councils

- provide funds for construction of composting plants, and setting up the necessary infrastructure.
- Procure **skips** , skip loader-**Trucks/Lorries**, Front-wheel loader **Tractors**.
- training of Urban personnel in waste composting and carbon trading.

## Obligations of Urban Councils

- Avail Land; construct access roads, site roads, parking and drainage systems; fencing of the sites.
- Provision of Water and Electricity.
- Provide personnel and operate composting sites.





# Project Activities

- **Civil works-** Construction of the composting plants
- **Supply of equipments-** Skips, Front-Wheel Loader Tractor and a Skip loader
- **Documentation-** (PIN, CPAs, POA, Validation)
- **Financial Management –**
- **Training and Project Implementation –** Staff of NEMA and Urban Councils trained in Composting Process management and Project Management under the CDM
- ERs generation = revenue sharing (50% NEMA, 30% Host Urban Council, 10% Host District, 10% Host Community)
- **8 of first 9 sites operational**
- **5 sites have produced 1-3 rounds of compost/manure (manure quality tests undertaken before application)**



# Project Activities

- **Civil works**
- - Composting Shade
- - Leachate Tank
- - Office Block
- - VIP Pit Latrine
- - Water Tanks
- **Supply of equipments**
- - Skips (collection)
- -Skip Loader Lorries (Transportation)
- - Front-wheel Loader Tractors (site opns)







# Project Activities Contd...- Composting



Sorting onsite



Sieving and Bagging Compost



Demo-Garden



Composting Operations



Harvest

11/12/2009 2:20



Uganda



## Benefits realized so far

- Cleaner Towns with reduced disease outbreaks
- Created employment, & thus income
- Farmers have improved agric yields
- Project host Community benefits (Water, electricity, roads, health, schools, farming-demos)
- Cut down production of methane (climate change mitigation), and bad smell from dumpsites



# Summary of how far we have come

- 2005: Meeting and sensitizing Urban Authorities on CDM-MWS-Composting.
- 2006: Signing of MoUs.
- 2006-2007: Procurement of Civil Works Contractors.
- 2007: Commissioning of civil works
- 2008: Procurement and handing over of equipment:
- 2008-2010: Completion of Civil Works.
- Aug 2009: Handing over of composting sites.  
Composting: 2009
- Dec 2009 – Apr 2010: Training of personnel in Composting and CDM project management.
- 2010: Implementation of Community Benefit Plans



Uganda



# Next Steps for 8 New CPAs

- Feb-March 2010: Preparatory activities for 8 new sites (Sensitization & signing MOUs);
- March – September 2010: Procurement of Civil Works Contractors and Equipment
- October 2010: Commissioning of Civil Works
- 2011: Training of personnel, handing over of equipment and composting plants, composting operations, implementation of Community benefit plans



# Key Recommendations

- CDM-EB should develop policies (incentives) that reduce CDM implementation costs, create a positive investment climate, and promote transparency
- DNA capacity, especially in Africa should be enhanced
- More awareness and capacity development on CDM projects should be undertaken in Africa
- WB Procurement guidelines should be flexible to accommodate applicable local rules