# SOLID WASTE MANAGEMENT IN KENYA OPPORTUNITIES AND CHALLENGES

### Mauritius 10-13 Sept.2012

BY

Benjamin Langwen

**Director Compliance And Enforcement** 

National Environment Management Authority

(NEMA)

**KENYA** 





### **Presentation Outline**

- Legal framework
- Status of waste management in Kenya
- Challenges
- Opportunities
- Conclusion







## Legal framework

- EMCA 1999
- Environment Management and Co ordination (Waste Management Regulation), 2006.
- Review of Regulation to incorporate;
- Plastic waste
- Waste oil
- Health care waste
- > E-waste
- Asbestos waste
- Waste tyres







### Status of Waste Management in Kenya

- Garbage Less than 40% collected
- Plastics below 30micron banned
- Health care -bio-medical waste incineration
- E- waste to establish collection centers and take back schemes(2 dismantlers licensed)









### Status of Waste Management in Kenya Cont'

- Waste oil decantation but moving to proper recycling
- Asbestos waste guidelines directing burial

Waste tyres – setting up collection centers –
cement industries(energy source)

## **Challenges**

- Legislative framework
- Lack of S.W.M policy
- Institutional arrangements
- > Gaps in sector specific regulations
- Capacity
- > Inadequate enforcement
- Low public awareness
- > Financial implications



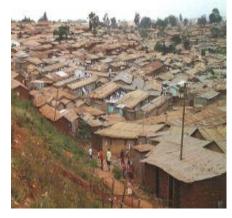




#### Challenges cont...

- Level of Economy(high vs. low income areas)
- Infrastructure
- >illegal structures and informal settlement
- ➤ Planning for collection centers and disposal/treatment sites











## **Opportunities**

- Resource recovery and reuse of valuable resources
- "Green economic growth" -
- Through creation of new

Business and employment creation

- Climate change mitigation
  - -Emission reduction
- Waste to energy- easing pressure on nonrenewable source of energy





### **Opportunities Cont'**

 Foreign exchange through export of fractions as raw materials for EEE







## E- waste material recovery

(SOURCE PETEC Japan)

	Flat Panel TV	Liquid Chrystal	Cathode ray tube TV	Washing machine/ dryer	Air Conditio ner	Refriger ator
Copper	1%	1%	3%	4%	17%	4%
Plastic	10%	40%	23%	36%	11%	40%
Aluminium	19%	4%	2%	3%	7%	3%
Iron	21%	30%	10%	53%	55%	50%
Glass	29%	6%	57%	-	-	-
Others	20%	19%	5%	4%	10%	3%





#### Conclusion

"Waste is a valuable source of resource. Let us exploit it for sustainable development"

Thank you



