Business Model for Removal, Disposal and Processing of Faecal Waste from Urine Diversion Toilets



Scenario 2

UD Toilet

Fill 100 litre sealed containers

PROBLEM STATEMENT

- Health Risks to residents when removing waste
- Dissatisfaction with self-removal of waste
- High cost of disposal at hazardous waste sites

Truck transports faecal waste

> Fly breeding for eggs

Transfer to pickup point

Remove waste from

chambers

METHODOLOGY

Institutional analysis

• Environmental and health compliance

• Ground truthing

- Business Modelling of two scenarios:
 - Burial on site with tree planting
- Processing using Black Soldier Fly (BSF) technology

Livestock farms

- Development of UD waste removal contract
- Development of SLA for operation of BSF plant
- Emerging business support framework

Livestock feed

oil

Larvae processing

Soil residue

Bio-conversion

using larvae

BSF PLANT

Larvae



Industry



Emerging farmers



BENEFITS

UD Waste Removal Contract

- Limits risks to Municipality
- Development of Emerging Businesses
- Efficiencies and Cost Savings
- Job Creation

BSF Processing Plant

- Recycling of waste
- Reduction of disposal costs
 to Municipality