

# THE MANAGEMENT OF CONTAMINATED LAND IN SOUTH AFRICA

#### **PURPOSE**

- SA is a developing country
- Rural upliftment is one of the key focus of the SA Government
- Contamination from existing and historic activities renders areas unavailable or under-utilised for development



#### **PURPOSE**

- sustainable development (water resource depletion & human health protection)
- •To give effect to SA's Constitution, NEMA and the National Environmental Management: Waste Act, 2008 (Act 59 of 2008)



#### LEGAL BASIS

- •The development of the NEMWA provides an opportunity for development of national norms & standards towards the management of contaminated land in SA.
- •Section 7(2)d of the Waste Act provides for the Minister of Environmental Affairs to "set National Norms and Standards for remediation of contaminated land and soil quality"



#### LEGAL BASIS

Key Elements of Contaminated Land as contained in the Waste Act: Part 8 of the NEM:WA

- Site Investigation (desk top study, site visit, determination of contamination potential)
- Sampling & Generic Assessment Values
- Principles of Risk Assessment
- Remediation Guidelines

The Waste Act provides for the development of Regulations for site assessment methods &



#### THE DEVELOPMENT OF N&S

Compilation of norms and standards will require the development of a methodology for the assessment of contaminated land that becomes the accepted norm &standard of practice for compliance with the Waste Act. This will take the following into consideration:

- Consistency with existing policy decisions and legislation.
- Satisfying clauses of the Waste Act.



#### THE DEVELOPMENT OF N&S

 harmony with other forms of evolving regulatory guidelines e.g. waste classification system

- compliance with existing guidelines such as National Water Quality Guidelines
- taking into account sensitive populations eg. informal settlements



#### **CURRENT SCENARIO**

- •Currently there are various methodologies used for remediation of contaminated land in South Africa and these are usually based on international standards which in some cases may not be appropriate for SA conditions.
- •The only SA approach available (though hardly used) is the DWAF 5- Step remediation process which is a generic approach (master equations for 8 most commonly encountered heavy metals for all environmental pathways)



#### **CURRENT SCENARIO**

Key guiding principles on which the current development of remediation N&S are based:

- Duty of care to prevent pollution
- Use of a generic, risk-averse approach
- Precautionary Principle and assessment of uncertainty in all assumptions
- Best Practicable Environmental Option
- Polluter Pays Principle
- Co-operative governance
- Public Involvement



### WAY FORWARD TOWARDS THE MANAGEMENT OF CONTAMINATED LAND

- Establish a Stakeholder database
- Conduct an in-depth literature review of local and international approaches currently being used
- Identify and clearly define at least 3
  possible contaminated land
  approaches/methodologies that will be
  best suited for South Africa



## WAY FORWARD TOWARDS THE MANAGEMENT OF CONTAMINATED LAND

- Develop a draft framework document based on the 3 identified options and workshop them extensively across the country including other government departments who share a common mandate
- Compile the final framework document taking into account all comments received.



#### PROJECT OUTPUTS & TIMEFRAME

- Project Inception meeting Aug 20th
- Stakeholder database End Aug
- International Literature Review Mid Sep
- Assessment of alternatives Mid Oct
- Draft Framework document Mid Nov
- Stakeholder workshops Nov to Dec
- Consolidation of stakeholder workshops Jan
- Technical peer review Feb
- Final Report End Feb
- •Training of Authorities and BEE co. Mid Mar

