

# **Restoring Mine Dumps**



#### **MINE DUMPS:**

Tailings, also called mine dumps, culm dumps, slimes, tails, refuse, leach residue or slickens, are the materials left over after the process of separating the valuable fraction from the uneconomic fraction (gangue) of an ore. Tailings are distinct from overburden, which is the waste rock or materials overlying an ore or mineral body that are displaced during mining without being processed.



## PREPARING THE MINE DUMP FOR REHABILITATION:

Generally any earth and rock from most mining activity has no plant nutritional value, often it has a low pH, and is laden with unwanted chemical compounds.

Prior commencing remediation it is important to terrace the sides of the said dump to avoid erosion of the top soil and nutrients when plants are seeded or transplanted. Any type of material can be used for the terracing, such as wood or blocks.

### **RESTORING MINE DUMP WITH ERGOFITO:**

First step to remediation: apply ground preparation:

- Spread organic matter (leaves, grass cuttings, chicken manure, secondary sewage sludge etc.)
  on the degraded area.
- Add all missing trace elements by using Ergofito Universal Plus
- Balance the pH. if necessary
- Apply 250 to 500 Kg of Ergostart Bio ground preparation per hectare, diluted with water at 1:100
- Wait three days and if possible mix the above 50 mm deep into the soil



The above intervention will decompose and convert all the above-added organic matter as well as many mineralised toxic substances into plant food.

Due to Ergostart Bio's fulvic acid reaction will open up the soil thus facilitating root development. It will populate the Rhizosphere and start the natural humus production.



# Second step to remediation: apply Ergofito Universal Plus:

- o Apply 24 Kg of Ergofito Universal Plus per hectare, diluted with water at a ratio of 1:200
- o This application takes place 30 days after the ground preparation application.
- o Planting or seeding can now take place.
- o Repeat step 2 with the same quantity (24 kg) three months later if possible.

All of the above products can be applied via the existing irrigation system.

#### **Conclusion:**

These are guidelines and variants will be applied according to the soil's requirements.