Unique Solutions in WWT and Solidification
WHAT IS BENTONITE?

Bentonite is an ore whose main ingredient is the clay mineral named montmorillonite.

It was formed hundreds of millions of years ago through the aqueous deposition of volcanic ash.
Clay-based Technologies =

• In order to sell Compliance
• - we learned early in our development that “no 1 technology is a treatment panacea”
• Our “Technology Train” is our answer
• That is what we sell!
Cetco Canada OSC Core Business - 4 technologies

• Tech 1 - RM 10 got it started
• Tech 2 - Acco Floc created broader shoulders
• Tech 3 - Filtration medias polish treated streams for higher quality results
• Tech 4 - Solidification/Stabilization de-watering has become an industry in itself
• Polymers – Cationic +, Anionic -, Low, Medium, High Molecular Weights
• Acidic Components – Alum,
• Basic Components – Lime,
• Bentonite Clays
What is difference versus straight polymer treatment?
RM-10 Reaction Mechanism

Bentonite Component

- Clay will hydrate and swell
- Like a dry sponge
- Hydrates at a slower rate than the polymer
- Platelets opening
WWT and Aligned Clay-Based Technologies
Simple 1step Operation
Tech 2 - Acco Floc – Flocculant Aide
Tech 3 - Combine Clay Technologies - Pond Remediation
Industrial Installations
Demand for More product recovery

Demand for even lower costing
Tech 4 - Solidification Techniques
Broadcasting/Add-mix
Hell Blender
Better Thorough-mixing Lowered Material Usage
Mechanical/Chemical Process That leads to Waste Reduction
LiquiSorb/Sorbond/InstaSorb
Lagoon Solidification
Remote Flexibility
Massive solids accumulation
Liquid/Solids Separation
Clay-based = Reusable Soil
Compliance

• Compliance through Clay-based technology
  
  - We have proven technologies that ensure Compliance
  - Water and WWT
    - Chemistry/Equipment/Manpower
    - Compliance to whatever mandates required
      - Open water discharge, sanitary sewer or re-use

  Compliance to Landfill & Land Applications Disposal Mandates
  ex. Surpasses TCLP, Metals, TCLP Leachable Hydrocarbons
  Paint Filter Test (PFT), Slump and others