

MANAGEMENT OF STREET SWEEPINGS AND OTHER SEDIMENTS

DECEMBER 6, 2002



Topics

- **Street Sweepings Issue:**
 - **Brief History**
 - **Research Implemented**
 - **Research Results**
- **Implications of Research on Management:**
 - **Disposal Options**
 - **Beneficial Use Options**

Brief History of the Issues

- Before 1993, the solid waste rule allowed "trash" to be disposed of in a Class III landfill.
- The definition of "trash" included street sweepings.

Rule Language Before 1993

- Rule 17-701.050(1)(c), F.A.C. – "Class III landfills are those which receive only trash or yard trash."
- Rule 17-701.020(68), F.A.C. – "Trash means combinations of yard trash and construction and demolition debris along with other debris such as paper, cardboard, cloth, glass, street sweepings, plastics and other like matter."

January 6, 1993 Rulemaking

- DEP had concerns about misuse of the term "trash."
- So, the term "trash" was removed from the rule.
- Result - Because of this change, street sweepings could no longer be disposed of in Class III landfills, without DEP approval, and had to go to permitted, lined landfills (i.e., usually Class I).

DEP Permitting & Compliance

- **DEP began finding large piles of street sweepings stored by municipalities.**
- **In some cases this practice required permits as solid waste management facilities.**

Lakeland Street Sweeping Permitted Facility



Below the City of Tampa Crosstown Expressway



City of Tampa Street Sweepings Mountain



City of Tampa Street Sweepings Mountain



BACKLASH!

- **Municipalities began expressing frustration over increased disposal costs.**
- **04/28/98 DEP memo stating OK for wastes to go to permitted, lined landfills.**
- **Contaminated Soils Forum, 12/ 2-3/1998**
 - **Municipalities "speak to" Bill Hinkley.**
 - **DEP commits to forming Focus Group.**

Focus Group Summary

- **Planning meetings on: 02/03/99, 05/21/99 and 08/09/99.**
- **08/17/99 DEP memo on legal authority to regulate street sweepings.**
- **09/05/00 Townsend research begun with \$175,000 of funding.**
- **November 2002 draft report ready.**
- **12/02/02 meeting to discuss report.**

Possible Concerns Raised by the Research

- Total arsenic concentrations.
- Leaching of some primary metals: cadmium, nickel, and lead.
- Leaching of some secondary metals: aluminum and iron.
- Leaching and total concentrations of a few organics.

Total Arsenic

	Number of Samples	Number of Detects	No. Above Residential SCTL	Average Conc. (mg/kg)
Street Sweepings	199	94	45	1.2
Stormwater Pond Sediments	74	43	30	2.4
Catch Basin Sediments	82	41	30	2.0

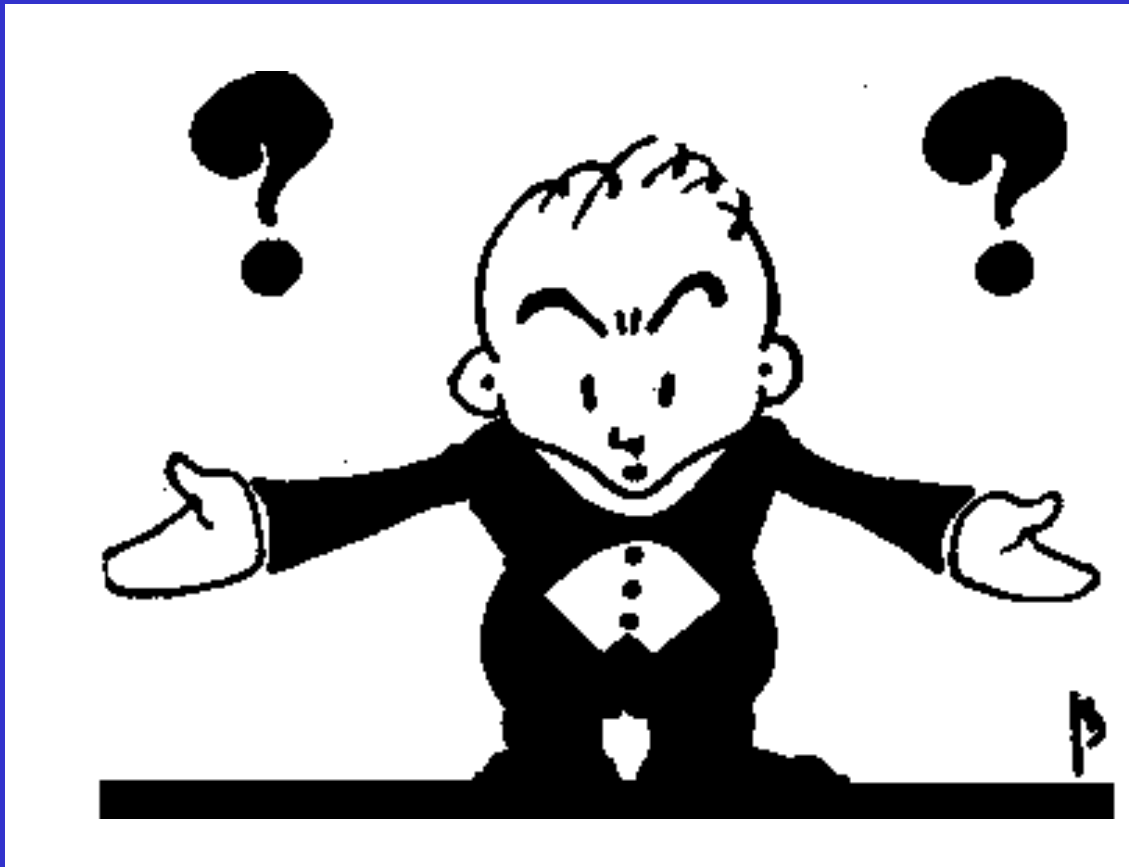
Metals Leaching – All Samples

	Cadmium	Nickel	Lead
No. of Samples	178	184	184
No. of Detects	3	3	50
No. Above GWCTLs	1	3	8

Secondary Parameter Average Leaching Results

	GW MCL (mg/L)	Street Sweepings	Pond Sediments	Catch Sediments
Al. (mg/L)	0.2	0.43	1.53	0.34
Fe. (mg/L)	0.3	0.38	0.57	0.35

So now whadda we do?



Possible Implications of Research on Disposal

- **Consider allowing street sweepings to be disposed of or used as cover in Class III landfills.**
- **Other sediments may also be OK in Class III landfills if not liquid wastes.**

Possible Implications of Research on Use

- **Some beneficial uses of street sweepings may be allowed depending on decisions about bio-availability of arsenic.**
- **Other beneficial uses may be allowed but are yet to be determined and currently must be decided case-by-case.**

May 27, 2001 Rulemaking

- **Rule 62-701.220(2)(g), F.A.C. exempts (from solid waste regulation) the collection and processing of materials from construction and maintenance of roads if they are beneficially used in a road construction or maintenance project.**
- **09/13/01 DEP memo clarifies what applies.**

QUESTIONS?

