

# WYOMING DEPARTMENT OF ENVIRONMENTAL QUALITY

## SOLID AND HAZARDOUS WASTE DIVISION

### SOLID WASTE GUIDELINE #5

### IDENTIFICATION OF FRIABLE AND NONFRIABLE ASBESTOS

(A Guidance for Landfill Operators Accepting Asbestos for Disposal)

#### Introduction

Chapter 8, "Special Waste Disposal Standards", of the Solid Waste Rules and Regulations allows the disposal of both friable and nonfriable asbestos in permitted municipal and industrial landfills. Disposal methods differ as to type of asbestos received.

This document was prepared to provide you, the landfill operator, with guidance on determining whether or not an asbestos-containing solid waste is friable or non-friable. After the determination has been made, the asbestos-containing wastes can be disposed properly (as described in Chapter 8).

#### Definitions

"Asbestos-containing solid wastes" or "asbestos" means solid wastes containing greater than one percent by weight asbestos in any of the asbestiform varieties of: chrysotile (serpentine), amosite (cummingtonite, grunerite), crocidolite (riebeckite), anthophyllite, actinolite or tremolite, and which may be considered friable asbestos.

"Friable asbestos" means asbestos that, when dry, can be crumbled, pulverized or reduced to powder by hand pressure, and includes previously nonfriable asbestos after such previously nonfriable asbestos becomes damaged to the extent that when dry it may be crumbled, pulverized or reduced to powder by hand pressure.

#### Friable Asbestos Materials

-Asbestos-containing thermal insulation (generally refers to sprayed or trowelled asbestos coatings and molded or wet-applied pipe coverings. Sprayed coatings typically have a rough, fluffy appearance, while trowelled coatings have a smooth finish and may be covered with a layer of plaster or other non-asbestos material),

-Preformed pipe coverings (used for thermal insulation on steam pipes in industrial, commercial, institutional and residential applications. This product is usually white and chalky in appearance and was typically manufactured in 3-foot long, halfround sections, joined around the pipe with plaster-saturated canvas or metal bands),

-Preformed block insulation (used as thermal insulation on boilers, hot water tanks and heat exchangers in industrial, commercial, institutional and residential applications. These blocks are commonly chalky white, 2 inches thick, 1 to 3 feet in length and held in place around the boiler by metal wires and/or expanded metal lath),

- Pipeline wrap (used to protect underground pipes from corrosion particularly in the oil and gas industry),
- Millboard and rollboard (laminated paper products used in commercial construction such as walls and ceilings),
- Commercial insulating papers (used for high temperature applications in the metals and ceramic industries, for low-grade electrical insulation and for fireproofing steel decks in building construction), and
- Corrugated asbestos paper (used for pipe coverings, block insulation and specialty panel insulation).
- Miscellaneous friable asbestos-containing wastes:
  - plaster/stucco
  - artificial snow
  - spackle and joint patching compounds

### **Non-friable Asbestos Materials\***

- Asbestos cement (A-C) pipe (used for water and sewer mains, electrical conduits, drainage pipe and vent pipes),
- Asbestos-cement sheet (manufactured in flat or corrugated panels and shingles; used for roofing, siding, cooling tower fill sheets, canal bulkheads, laboratory tables and electrical switching gear panels),
- Asbestos-containing brake linings (include drum brake linings, disc brake pads and brake blocks),
- Vinyl (linoleum) floor tiles and wall paper, -asphalt flooring,
- Asphalt roof coatings (i.e. roof sealants and shingles),
- Traditional molded plastic products (i.e. cooking pot handles or plastic laboratory sinks),
- Roofing felt (smooth surface, mineral surface, shingles and pipeline), gaskets and other paper products which use asbestos fibers instead of cellulose, and
- Asbestos yarn, cloth and other textiles (used to manufacture fire-resistant curtains and blankets, protective clothing, electrical insulation, thermal insulation and packing seals).
- Miscellaneous non-friable asbestos-containing wastes:

(The following wastes may contain asbestos. If you have any questions concerning the content of these wastes, ask the responsible party for a material safety data sheet (MSDS) on the waste or contact the Solid and Hazardous Waste Division at 777-7752).

- shotgun shell base wads
- asphalt paving mix
- artificial fireplace logs for gas-burning fireplaces
- oil and gas drilling fluids
- caulking putties
- asphalt tile cement adhesive (cold-applied)
- mastics
- roof putty

\*Please note, the asbestos in these products is tightly bound and is not released under typical conditions or use. However, any damage, sawing, drilling, sanding or fabrication of these products during installation or removal will result in the release of asbestos and a reclassification from non-friable to friable.

Also note, some of these non-friable asbestos-containing products must be removed from any building or structure prior to its being demolished. Removal of any asbestos materials from buildings being demolished is regulated by the Department of Environmental Quality/Air Quality Division (307-777-7391).

### **Further Information**

Further information can be obtained from the following Solid and Hazardous Waste Division offices:

Casper	473-3450
Cheyenne	777-7752
Lander	332-6924

Signed,

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David A. Finley  
Administrator  
Solid and Hazardous Waste Division

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Date

