FILE NAME: Marley (MAR)

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DOCUMENT DESCRIPTION: Report-Asbestos Content of Marley Components

Marley
Cooling Technologies

Asbestos Content of Marley Components

Honeycomb Eliminators, M-67 Fill, M106 Asbestos Fill, ACB

PLAINTIFF'S EXHIBIT 4 SPX

The requirement of Material Safety Data Sheets (MSDS) became effective for manufacturers in November, 1985. Since Marley discontinued the manufacturing of asbestos products prior to this date, MSDS were not made available by the original supplier to Marley.

In lieu of the requested MSDS, the following information will provide the necessary information for the proper handling of this material:

Asbestos Honeycomb Eliminators and M67 Fill

Material Composition:			
	Asbestos Fiber	79%	Percentage by Weight
	Neoprene Binder	8%	Percentage by Weight
	Moisture	1%	Percentage by Weight
	Resin Solids	12%	Minimum

M-106 Asbestos Fill

Material Composition:			
	Asbestos	54.5%	Percentage by Weight
	Kraft Fibers	7.6%	Percentage by Weight
	Moisture	1.0%	Percentage by Weight
	Resin Solids	30.0%	Minimum

Description:

The neoprene was added by the asbestos paper manufacturer to serve as a binder for the paper. Once the neoprene asbestos paper was received by Marley and after fabrication of the sheets, the sheets were then dipped in a Melamine/Phenolic resin, which penetrates the neoprene asbestos paper. By impregnating the neoprene asbestos paper with the Melamine/Phenolic, this encapsulates the neoprene and asbestos fibers.

Asbestos Cement Board (ACB)

Material Composition: Asbestos 13 - 19% Percentage by Weight

Description:

ACB consists of the above asbestos percentage with the remainder being portland cement and water of hydration (possibly some silica flour in autoclaved ACB).

Friability: The term friable refers to the physical characteristics of the above materials, such as, easily crumbled and/or pulverized. The above materials as received in its original stateare not friable. The asbestos fibers are securely bound within the composite and on the surface during manufacturing. After years of service, it is possible that certain water conditions could cause the surface bond to break down, causing a possible friable condition.

In handling and/or disposing of the above ACB and/or Asb HC material, it is recommended that you contact the federal agency, O.S.H.A., EPA, as well as, the local and state agencies for information concerning specific state regulations and requirements for handling and the disposal of asbestos wastes.

Deloache DEPOSITION EXHIBIT NO. 5 9/25/13 SARAH THOMAS EVANS REPORTING SERVICE

DESCRIPTION OF NEOPRENE-ASBESTOS M67 FILL AND HONEYCOMB ELIMINATORS MANUFACTURED BY MARLEY COOLING TOWER COMPANY:

1. Neoprene/asbestos paper.
   Asbestos fiber ..... 79% by weight of final product
   Binder (neoprene and other rubber) ... 8% by weight of final product
   Thickness: .017 to .021 inches
   Basis weight: 41 to 47 lbs. per 480 sq. ft.
   Manufacturers: Armstrong Cork Company, Kansas City, Mo.
   Armotex AM8016 asbestos paper
   Nicolet Industries, Norristown, Pa.
   Nicel #309 asbestos paper
   GAF Corporation, Erie, Pa.
   E 539 asbestos paper

2. Impregnating resin. ...12% by weight of final product
   Type: Melamine or Phenolic, with phosphoric acid catalyst

3. Adhesive.
   Type: Vinyl acetate, crosslinked with urea formaldehyde

M106 FILL:
Neoprene-Asbestos paper supplier for M106: Hawley

ASBESTOS CEMENT BOARD SUPPLIERS:

1. GAF
2. National Gypsum
3. IBP
4. Atlas-Turner
5. Toschi
6. Johns Manville
7. Ruberoid