

9441.1990(05)

OFFICE OF SOLID WASTE AND EMERGENCY RESPONSE

FEB 26 1990

Kathleen Wolf, Ph.D.
Project Manager
Source Reduction Research Partnership
1052 West Sixth Street, Suite 432
Los Angeles, California 90017

Dear Mr. Wolf:

This is in response to your letter of October 12, 1989, in which you requested clarification of the application of RCRA Subtitle C regulations to waste chlorofluorocarbons (CFCs) from the production of foam products. More specifically, these CFCs act as blowing agents by physically opening the foam cell. This interpretation is based on your account of the production process.

In your description of the manufacture of the rigid insulating and packaging foam product, the CFCs are retained within the product. However, in the production of the flexible foam, the CFCs open the foam cell and are then released to the ambient environment. Once captured by the vapor recovery system, the spent chlorofluorocarbons are then sent off-site for either recycling or disposal.

Proper waste classification depends upon having sufficient knowledge of the waste process and the source of generation. In order for the spent chlorofluorocarbons to be regulated as RCRA hazardous wastes, the material must first be classified as a solid waste. In the case of the rigid foam production where the chlorofluorocarbons are retained within the product, the RCRA Subtitle C regulations are not applicable because the product is not being discarded and thus is not a solid waste as defined in 40 CFR Section 261.2(a).

At issue, in this case, is the question of whether use as a blowing agent constitutes use as a solvent. The December 31, 1985 Federal Register (50 FR 53316) clarifies that "only solvents

that are used for their 'solvent' properties - that is, to solubilize (dissolve) or mobilize other constituents" would be covered by the F001 - F005 spent solvent listings. Specific examples include "solvents used in degreasing, cleaning, fabric scouring, as diluents, extractants, and reaction and synthesis media." In the case of foam production, the chlorofluorocarbons are not being used to mobilize or solubilize, rather, they are simply acting to open the foam cell by a physical mechanism. Therefore, the spent chlorofluorocarbons used in this manner would not meet a hazardous waste listing. The spent CFCs would only be RCRA hazardous waste if they exhibit a hazardous waste characteristic under 40 CFR 261.21 - 261.24. Waste not regulated under Federal regulations also may be regulated under more stringent State requirements.

Since the CFCs and methylene chloride used as blowing agents do not classify as solvents, recovered vapors of these substances also do not meet the spent solvent listing description. The "derived from" rule (40 CFR 261.3(c)(2)(i)) does not apply in this case because the recovered vapors are not derived from hazardous wastes and by themselves do not meet any hazardous waste listing description.

The Agency recently published a Federal Register notice clarifying the applicability of RCRA rules to CFCs which are spent or reclaimed (54 FR 31335, July 28, 1989). We are enclosing a copy of this notice for your reference.

Thank you for your inquiry. If you should have further questions please contact the RCRA/Superfund Hotline at (800) 424-9346 or (202) 382-3000.

Sincerely

Original Document signed

Devereaux Barnes
Director
Characterization and
Assessment Division

Enclosure