Table 1. Organization of Factors for Assessing Fiber Release Potential

Condition of asbestos-containing material
• Evidence of deterioration or delamination from the underlying surface (substrate)
• Evidence of physical damage
• Evidence of water damage
Potential for disturbance or erosion
• Proximity to air plenum or direct airstream
• Exposure (i.e., is it visible), accessibility (to building occupants and maintenance personnel), and the degree of activity (air movement, vibration, movement of building occupants)
• Change in building use

located in an air plenum or near a forced airstream are likely to suffer surface erosion. In addition, fibers released into an airstream may be transported to other parts of the building, possibly increasing the number of people exposed. A change in building use may cause changes in several of the other factors. Figures 6 and 7 illustrate several characteristics of asbestos-containing materials addressed by these factors.

Friability and asbestos content are two factors discussed in the initial EPA guidance document (USEPA 1979) that do not appear in Table 1. Friability has already been discussed in the context of inspecting for asbestos-containing material (Chapter 2). Since only material determined to be friable needs to be sampled and analyzed, using friability for assessment at this stage would be redundant. Asbestos content may still be important in some situations, but this factor proved highly unreliable as an indicator of airborne asbestos concentration in the previously mentioned EPA validation study (Constant, et al 1982). Substantial fiber release apparently can occur in damaged or deteriorating materials, even where asbestos content is low.

Detailed descriptions of each factor in Table 1 are given in Appendix D. The information there should assist the evaluator in judging the condition and exposure or disturbance potential of individual sites.

The interpretation of information from an assessment of fiber release and its use to reach decisions on abatement strategies is discussed in the last section of this chapter (Section 3.4). The factors in Table 1 are expressed in a way which fosters a "yes" or "no" type of response. The use of "yes" and "no" responses eliminates the need to rate and score each factor and provides a less ambiguous basis for decision-making.

3.2.3 Measuring Airborne Asbestos

Another proposed approach to assessing the need for corrective action is to measure asbestos fibers in the air. At best, this approach provides information only on current asbestos

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