# How to Properly Remove Spray-on "Popcorn" Ceilings From Owner-Occupied, Single-Family Residences Only

This publication details the steps necessary for the safe removal of an asbestos-containing "popcorn" ceiling from an owneroccupied, single-family home. The term *single-family home* includes houses, mobile homes, trailers, detached garages, houseboats, and houses with a "mother-in-law apartment" or "guest room." This term does not include rental property or multiplefamily units, nor does it include any mixed-use building that contains a residential unit. Be aware that no set of instructions can anticipate all possible situations and variables that a homeowner may encounter in an asbestos removal project.

It is essential that you read these instructions from start to finish, making sure you thoroughly understand them before scraping and disturbing your popcorn ceiling in any way. **Failure to do so poses a severe health risk to you and your family.** 

Puget Sound Clean Air Agency strongly recommends that you hire a state-certified asbestos abatement contractor. However, if after reading this instruction manual you still choose to do the work yourself, it is critical that you follow each step completely and carefully — from site preparation to disposal — so that your removal project is effective, safe, and legal.

**Exposure to airborne asbestos may cause cancer or other lung diseases.** 

**Puget Sound Clean Air Agency assumes no liability or responsibility for house damage, injuries,** illnesses, or related health problems arising from you performing an asbestos removal project. You assume all risks involved.

This publication is limited to the removal of popcorn ceilings, one of the three most common asbestos abatement projects attempted by homeowners. Puget Sound Clean Air Agency also provides free information about removing asbestos-backed sheet vinyl flooring and cement asbestos-board siding. This publication can be downloaded from our web site at **www.pscleanair.org.** 



# ARE YOU PREPARED TO TAKE ON THIS PROJECT?

It is essential that you are aware of all the challenges and risks of tackling an asbestos removal project yourself. It can be time consuming, messy, expensive, and dangerous to your health if not performed correctly.



### Are you sure your ceiling contains asbestos?

Not all spray-on popcorn ceilings contain asbestos. To know for sure, submit a popcorn ceiling sample for laboratory analysis. Cost for such testing is minimal, typically \$25 per sample. Laboratories are listed in the yellow pages of your phone book under "Asbestos—Consulting and Testing."

### If you decide not to check for asbestos, assume the ceiling contains asbestos answer "Yes."

#### To take a ceiling sample for lab analysis you will need:

a spray bottle, liquid detergent, resealable plastic bags, putty knife, and rubber gloves.

- 1. Fill a spray bottle with water mixed with a few drops of liquid detergent.
- 2. Thoroughly wet the sample area and allow time for the water to soak in.
- 3. With a putty knife and while wearing rubber gloves, carefully scrape about one square
- inch of popcorn ceiling from the area into the plastic bag and seal it. Take samples in random locations throughout the ceiling area.
- 4. Take the samples to an asbestos testing lab.

The number of samples you must take for each ceiling type depends on the size of the ceiling area:

- 1,000 square feet of less: three samples
- More than 1,000 and up to 5,000 square feet: five samples
- More than 5,000 square feet: seven samples

In order to reduce the analysis cost, you may instruct the lab to test the samples only until they find the first positive sample for asbestos. Since any one positive sample indicates the entire ceiling area is asbestos, it may not be necessary to test all the samples. If a sample contains more than 1% asbestos, the asbestos regulations apply.

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**BE SMART** 

## If your ceiling contains asbestos, is removal the best option?

Asbestos is a problem only if fibers are released to the air. Popcorn ceilings that are in good repair and not disturbed by cuts or tears will not release asbestos fibers. Hence, the safest, easiest, and least-expensive option may be to leave your ceiling alone. Sometimes, it is possible to work around asbestos without removing it. For example, popcorn ceilings that are in good condition can usually be painted (spraying is recommended) to better encapsulate the fibers. However, be aware that painting these ceilings may prevent you from safely removing them in the future because do-it-yourself removal is highly dependent on your ability to thoroughly wet this material before disturbing it. Painting can seal the popcorn material, making it difficult or impossible to wet.



DANGER

# Are you prepared to accept the serious health risks associated with doing the asbestos removal yourself?

### Airborne asbestos is a serious health hazard.

### Breathing asbestos fibers can cause lung cancer and other diseases.

When disturbed, asbestos breaks down into fibers up to 1,200 times thinner than a human hair. If released into the air, asbestos cannot be seen and quickly circulates through your home. When inhaled, these fibers become trapped in lung tissues. Medical research tells us that up to 30 years after inhalation, asbestos fibers can cause **lung cancer**, **mesothelioma**, a related terminal cancer of the tissue that lines the chest cavity, and **asbestosis**, a condition that can lead to breathing problems and heart failure.

There is no known safe level of asbestos exposure. That's why medical, environmental health, and regulatory organizations stress the need to protect health by minimizing exposure to airborne asbestos fibers, particularly at elevated levels, such as can occur during a remodeling project.



# Without proper breathing equipment and body coverage at all times when working with asbestos, you or anyone in the vicinity of the removal area may be at serious risk.

The removal procedures described in this publication are intended to help homeowners minimize health risks associated with do-it-yourself asbestos removals. However, it should be understood that with any removal project some release of asbestos fibers into the air is unavoidable, and there are no known safe levels of asbestos exposure.

# ARE YOU PREPARED TO TAKE ON THIS PROJECT? (CONT.)

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# Are you prepared to assume the challenge of do-it-yourself asbestos removal and disposal?

### The work will be difficult, requiring the purchase of safety equipment.

Even under the best of circumstances, do-it-yourself asbestos projects can be physically demanding and potentially dangerous.

- Breathing through a respirator is more difficult than normal breathing and places additional stress on heart and lungs.
- Protective clothing can be hot and uncomfortable.
- Work spaces become very humid due to the water used in wetting the asbestos.
- Work can involve ladders and high spaces.
- · Eye protection often results in reduced visibility.
- Caution must be taken with wiring and electrical power because of all the water being used towet the asbestos.
- Without electricity, and with plastic sheets covering doors and windows, it can be difficult to see in the work area.

As a homeowner, you do not have the specialized equipment, materials, and experience of an asbestos abatement contractor to perform this work. Unlike contractors, who have special machines with high-efficiency filters to remove fibers from the workplace air, you have few, if any, safety "back-ups" if something goes wrong.

#### The work will be time consuming.

The total time it takes to remove a popcorn ceiling can be substantial. Time estimates to complete a removal project 500-700 sq. ft. are:

- Collect supplies 1/2 day
- Set up containment area 1 day
- Removal and clean up 1 day (Note: do not attempt more than what can be removed and cleaned in one day)
- Disposal ½ day

### TIP

To find out if you are ready for full-size projects, start with a small room (10' x 10') and follow these procedures.

#### The work may cause damage to your home.

These procedures may result in damage to walls and ceilings. Duct tape can discolor wood paneling, tear wallpaper, and remove paint and texture. Water may stain walls. Using metal scrapers on wetted plasterboard ceilings may result in tearing of the plasterboard paper.

## Are you aware of the legal issues involved?

#### **During removal**

The law prohibits you from hiring anyone other than a certified asbestos abatement contractor to perform — or assist with — asbestos removal work in your single-family residence. Homeowners may remove asbestos themselves. But as stated above, this option is difficult, time-consuming, and dangerous to your health if prescribed work procedures are not strictly followed.

### **During disposal**

If you choose to remove asbestos yourself, you take on the legal liability of ensuring proper bagging and identification of asbestos debris, correct transport (in a covered vehicle), and disposal **ONLY** at disposal sites or transfer stations authorized to receive such waste. These regulations protect your community from the harmful effects of asbestos.

The Washington State Department of Labor and Industries has regulations that may also apply. Call 800-4-BE-SAFE or visit **www.lni.wa.gov/wisha** for more information.



If you answered "No" to any of the above questions, and if you still wish to have asbestos removed from your home, YOU MUST CONTACT A STATE-CERTIFIED ASBESTOS REMOVAL CONTRACTOR. This is the quickest, safest, and most-reliable way to remove asbestos from your home.

## **BEFORE YOU BEGIN ASBESTOS REMOVAL**

No set of instructions can address all possible situations and variables that a homeowner may encounter in an asbestos removal project. This publication is intended to address the common steps and most important issues involved in removing popcorn ceilings.



Common sense dictates that unique and particularly challenging projects should not be undertaken by the homeowner. In such cases, avoid the possibility of asbestos contamination by abandoning the "do-it-yourself" approach and hiring a state-certified asbestos abatement contractor.

The following three steps must be taken care of before you start your removal project.

### **1. Complete a notification.**

Prior to removing friable asbestos, you are required to mail a Notice of Single-Family Residence Asbestos Removal notification to the Agency with the \$25 processing fee. Be sure to keep a copy of the notice and post it on site during the project as no copy will be provided back to you. This form can be downloaded from our web site at www.pscleanair.org.

We anticipate after May 1, 2007, all asbestos project notifications, including single family residence, will only be accepted by submitting online on our web site www.pscleanair.org.

### 2. Conduct a "wet" test.

If your popcorn ceiling has been painted, you will need to test whether water can adequately penetrate the paint and wet the asbestos-containing material prior to the disturbance. Thorough wetting before, during, and after removal is critical for preventing the release of asbestos fibers into the air.

#### To conduct a "wet" test you will need:

a spray bottle, liquid detergent, putty knife, one foot square piece of plastic, and rubber gloves

1. Fill a spray bottle with water mixed with a teaspoon or less of liquid detergent.

2. Spray water over a few square inches of ceiling. Do this in several different test areas.



"Wet" Test Your Ceiling



- 3. Allow 15 to 20 minutes for the water to soak in, re-spraying each test area two or three more times during this period.
- 4. With a putty knife and wearing rubber gloves, carefully scrape off the material, catching the debris on a piece of sheet plastic held in your other hand.
- 5. Examine the removed popcorn carefully. It should be thoroughly wet.

If the removed popcorn was not thoroughly wet, repeat the "wet" test increasing the number of spray applications, the amount of water used, and the length of time allowed for the water to soak in to determine the best way to achieve the maximum wetting of the ceiling material.

If, after numerous tries, you are unable to get the water to penetrate the paint and saturate the ceiling materials DO NOT UNDERTAKE THIS PROJECT. Leave the ceiling alone or hire an asbestos abatement contractor to do the work.

## 3. Gather essential personnel and supplies.

## Workers



It is illegal to hire anyone other than a state-certified asbestos abatement contractor to perform, or assist in, this removal process.

Three people are recommended to remove a popcorn ceiling: two homeowners should perform the removal work and a third person should be "standing by" outside the work area to provide water, tools, and other supplies as needed while work is in progress. This will minimize the need for people inside the containment area to remove their disposable clothing and put on new clothing for each exit and entrance to the work area.

# **BEFORE YOU BEGIN ASBESTOS REMOVAL (CONT.)**

## **Protective equipment and clothing**



WARNING

**Proper Face Gear** 



Before beginning your project, you'll need to obtain the following items. All items marked with a triangle ( $\triangle$ ) must be purchased at special stores that carry approved health and safety equipment used for asbestos removal.

# Check the yellow pages of your phone book under "Safety Equipment and Clothing" for a list of safety equipment vendors.

**Respirators** — Half-face, dual-cartridge respirators, each equipped with a pair of HEPA filters are required. One respirator is required for each person working within the containment area. Respirators provide little protection if they do not fit properly, so request a fit test from the vendor.

# **Persons** with beards often cannot be adequately fitted with this type of respirator and should not work within contaminant areas.



**Coveralls** — Several pairs of disposable coveralls with built-in booties should be purchased for each person who will be in the work area. Oversized coveralls make it easier for workers to move around. NEW COVERALLS WILL BE NEEDED FOR EACH ENTRY INTO THE CONTAINMENT AREA. Every time a worker leaves a containment area, coveralls should be wetted and disposed of in a properly sealed asbestos waste disposal bag.



**Rubber boots** — Laceless, pull-on rubber boots without fasteners will protect coverall booties so they do not wear through. Rubber boots can be washed off later or disposed of as contaminated debris.



**Eye protection** — Each worker within the containment area should be equipped with non-fogging goggles.

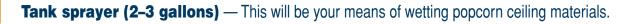


Asbestos Waste Disposal Bag **Rubber gloves** — Several pairs of durable, disposable rubber gloves should be purchased for each worker. Rubber gloves must be worn by each person working within the containment area. NEW GLOVES ARE REQUIRED WITH EACH RE-ENTRY INTO THE CONTAINMENT AREA. Every time a worker leaves a containment area during a removal project, these gloves should be wetted and disposed of in an asbestos waste disposal bag.



**Asbestos waste disposal bags** — These special bags will be used to contain asbestos-contaminated debris and materials. The bags should be sized 33 inches by 50 inches and be made of 6-mil polyethylene. Each should be pre-printed with required asbestos warnings. Assume you'll need at least four bags per 100 square feet of ceiling to be removed.

## **Tools and Supplies**



**Garden hose with automatic shut-off spray nozzle (optional)** — If you do not have a worker outside the containment area available to refill your tank sprayer you will need this item. Leave the hose just outside a window or door in the room you are working on. You want it within reach, but not inside the house where it might leak.





**Wallboard taping or "putty" knives** — The best sizes for scraping off popcorn ceiling materials have 4to 6-inch blades.

**Polyethylene plastic sheeting** — This will be used to create containment areas. You'll need enough sheeting to cover 1.5 times the area of the walls and enough 6-mil sheeting to cover 3 times the area of the floors in the work area.



**Screen molding and finishing nails (optional)** — SEE STEP 5. If you have wallpaper that you wish to protect when taping plastic to the walls of the containment area, you might wish to use narrow strips of wood for hanging the plastic.

**Permanent marker pen** — You must write your last name, address, and removal date on each waste disposal bag.

# **BEFORE YOU BEGIN ASBESTOS REMOVAL (CONT.)**



**Duct tape** — Numerous rolls will be needed for building a containment area and sealing waste disposal bags.

**Clean, disposable rags** — A large supply should be on hand for assorted removal and clean-up purposes.

**Spray bottle** — A water sprayer bottle will be needed to spray workers upon exiting the containment area.

**Bucket** — You will need a bucket for washing tools at the end of the project.

**Ladder with cushioned legs** — If you need a ladder to reach the ceiling areas, you may need to wrap and tape rags or foam around the ladder legs so they do not puncture the plastic on the floor of the containment area.

**Encapsulant** — This could be latex primer paint or an approved latex asbestos sealing product. It will be used for encapsulating areas after popcorn materials have been scraped off.

## SITE PREPARATION

### 4. Prepare the house.



**Post asbestos signs** warning friends, family, and others who might visit to stay well away from the work area. Make sure pets cannot come near the work site.

Containment Area with Sign

**Remove all furniture** from the room(s) where the popcorn removal is to take place.



Turn off heating and air conditioning systems.



Tape all light switches in the off position.

**Turn off electrical power to all ceiling light fixtures in the project area, then remove them.** After removal, seal exposed wires with electrical tape. Be careful not to disturb the popcorn material during these activities.



**Remove any smoke alarms or other devices** attached to or near the ceiling, once again being careful not to disturb popcorn material.

### 5. Build a containment area.

TIP

Hang these instructions like a calendar using a piece of duct tape, a nail, and the hole at top. See instructions for details. You need to contain asbestos debris by constructing a plastic containment area around the ceiling areas you wish to remove. This is accomplished by covering the walls and floors within the project room(s) to ensure all debris is captured and remains on plastic sheeting during the removal process.

**Cover the floors with 6-mil polyethylene plastic sheeting** throughout the area of the house where the popcorn ceiling is to be removed. Place the sheets so that they overlap room edges by about a foot. Run the extra foot of sheeting up each wall and tape all edges there securely. DO NOT PULL TIGHT. Make sure there's plenty of excess plastic so that the plastic won't pull away from the walls when you're working near room corners and edges. Tightly seal all floor seams between sheets of plastic with duct tape. If popcorn is to be removed from rooms that are joined by halls or spaces where no removal is to take place, lay 6-mil plastic sheets on the floor to create a path on which to walk between containment areas.

**Hang polyethylene plastic sheeting on the walls,** approximately 1 inch down from the ceiling, with duct tape. SMOOTH THE DUCT TAPE FOR A TIGHT SEAL. Make sure the plastic sheets overlap and extend to the floor. Seal all wall seams with duct tape.

To minimize damage to wallpaper, consider using slender finishing nails to secure a small strip of wood (like screen molding) to the top of the wall and then hang the plastic sheets from the wood strip using duct tape.



**Hang these instructions like a calendar** using a piece of duct tape, a nail, and the hole at top. Select an accessible location within the containment area away from where you'll be spraying water. To prevent tears in the plastic containment, place a small piece of duct tape on the plastic sheeting at the location where you hammer a nail to hang the instructions.



Lay a second layer of LOOSE 6-mil plastic on the floor. In larger rooms, install this second layer in pieces of 100–120 square feet. Lay the plastic in a loose, generously overlapping manner. DO NOT SEAL EDGES OF THIS SHEET WITH TAPE.

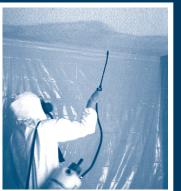


**Construct plastic "isolation" walls in doorways or room openings.** It may be necessary to separate the work area from the rest of the house by sealing the openings with 6-mil plastic.

# SITE PREPARATION (CONT.)



TIP If someone outside the containment area is not available to refill sprayers, use a garden hose with automatic shut-off nozzle at the entrance to the plastic enclosure for refilling the tank sprayer.



Spraying the Ceiling



Windows may be opened for ventilation. However, the law requires that there be no asbestos fibers can be released into the air outside. Cut and tape an oversized plastic flap over the inside of each open window to ensure no debris passes through the windows.

**Create a secure entry/exit point.** If there is a door to the outside within the containment area, make this your designated point of entry and exit to the work area. Open the door and seal the doorway with 6-mil plastic. Create an entrance/exit through the plastic by cutting a 5- to 6-foot vertical slit in the plastic and covering it on the inside with a plastic flap. **Then lay down a sheet of 6-mil polyethylene outside the door.** This is your decontamination area. If there is no exit door to the outside from the containment area, create an entrance/exit within the house either through a door or through an "isolation" wall.

**Label asbestos waste disposal bags** using a permanent marker pen. Write your last name, address, and date of removal on each bag. It is easier to label bags prior to filling them. These bags must also specify the asbestos warning sign required by Labor and Industries or OSHA.

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**Place supplies at the entry/exit point.** At a minimum, have a water sprayer bottle, clean wet rags, a bucket, and asbestos waste disposal bags at any entry/exit location.

**Check your work.** Once you've completed the plastic containment, make sure the entire area where the removal is to take place is isolated with polyethylene sheeting. The only exposed surfaces within the containment area should be the ceiling and about an inch or less of wall below the ceilings. This ensures that all asbestos material will be contained during removal.

## 6. Wet the ceiling.

Thorough wetting is critical to keep asbestos fibers out of the air. If your ceiling is painted and the "wet" test you conducted in Step 2 failed to thoroughly wet the popcorn ceiling to the substrate, do not proceed. Leave the ceiling alone or hire an asbestos abatement contractor to do the work.



Mix liquid detergent with water at a ratio of 1 cup to 5 gallons.



**Spray the ceiling with the liquid detergent and water mixture using the tank sprayer.** Spray the popcorn material enough times, according the results of your "wet" test in Step 2, to ensure the ceiling will be satured with water before removal.

Wait 15 to 20 minutes for the water to thoroughly penetrate. Spray-on popcorn material is very porous and absorbs a lot of water, so keep applying water during this time.

## **PROTECT YOURSELF**

### 7. Put on protective clothing and equipment.



**Put on coveralls, gloves, goggles, and respirator.** Those who will enter the containment area to do the removal must put on disposable coveralls outside the containment area while standing on the entrance/exit plastic. They should then put on gloves, goggles, and respirators equipped with HEPA filters.



Tape your gloves to the sleeves of your disposable coveralls around the wrists to ensure your arms and wrists remain covered.



If you must leave the plastic containment area during the project, use the spray bottle to wet down and remove protective equipment and clothing while standing on the plastic just outside the entrance/exit to the work area. Place coveralls and gloves in an asbestos waste disposal bag. Then step off the plastic. Upon returning, put on new coveralls and gloves.

# **PROTECT YOURSELF (CONT.)**



# **ASBESTOS REMOVAL**

## 8. Test ceiling for water saturation.



Enter the containment area fully clothed in protective gear.



**Test for wetness by scraping off a few inches of ceiling material.** If it is thoroughly wet to the gypsum board or other ceiling substrate underneath, you're ready to being removing the popcorn ceiling. IF THE MATERIAL IS NOT THOROUGHLY WET, REPEAT STEP 6, re-applying water with detergent and allowing time for it to soak in.



WARNING

If, after more applications of water, you are still unable to thoroughly wet this material, do not proceed. Use a state-certified asbestos abatement contractor to perform any additional work.

## 9. Scrape off popcorn.

Keep the plastic on the floor and walls wet at all times by periodically spraying them to prevent any asbestos debris from drying and becoming airborne.



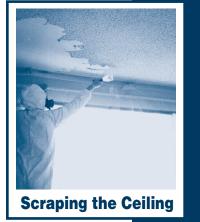
**Thoroughly scrape the spray-on popcorn material from the ceiling** using 4- to 6-inch putty or wallboard taping knives and, if needed, standing on a ladder with cushioned legs. Allow the debris to fall onto the plastic sheets below.



**Wipe any remaining ceiling residue off with clean wet rags.** Turn rags frequently so you are wiping with a clean surface. Otherwise, remaining asbestos material will be smeared around but not removed. If the ceiling beneath is painted, wet wiping is very effective. With unfinished sheet rock, wiping is helpful but is less effective.



**Dispose of all rags in an asbestos waste disposal bag.** Do not try to rinse contaminated rags.



## **CLEANING UP**



### Under no circumstances should you sand ceilings after removal of spray-on popcorn material.

If your popcorn ceiling was applied as part of original house construction, the ceiling was likely never finished for painting. Thus, even if you did no damage during the popcorn removal, you will likely need to refinish or re-texture the ceiling before painting. Sanding the ceiling would result in remaining asbestos fibers being released into the air. DO NOT SAND YOUR CEILING.

### **10. Remove loose plastic and debris from floor.**



Once removed, asbestos debris must be kept wet until packaged and sealed for disposal.



**Fold and roll up top layer of loose floor plastic.** After you've removed all the popcorn ceiling material in one room within the containment area, carefully fold and roll up the top layer of loose plastic sheets that contain fallen debris.



**Double bag the folded plastic, along with the ceiling debris it contains, into pre-marked asbestos waste disposal bags.** The top level of the floor plastic was put down in 100- to 120-square foot sections. Plastic plus wetted popcorn on this square footage will be quite heavy and may be all you want to carry in a single, double-bagged container. Follow this process for each room.



Wipe down all tools and ladders with clean wet rags after removing all asbestos material from the project enclosure.



Dispose of all contaminated wipe rags as asbestos debris.

Place tools in a bucket or plastic bag for more thorough cleaning later.

### **11.** Apply ceiling encapsulant to seal in residual asbestos.



**Roll or spray ceiling areas with a latex primer paint or an approved latex asbestos encapsulant.** In spite of your best efforts to thoroughly remove the asbestos fibers, some fibers will remain. Before you remove any plastic sheets that are taped to the walls and floor, encapsulate any residual asbestos on those ceiling areas from which popcorn material has been removed. ANY FUTURE CEILING FINISHING WORK SHOULD NOT INVOLVE SANDING THESE SURFACES.

### **12. Remove wall and floor plastic.**

Spray plastic walls with water one last time, making sure any visible asbestos debris is thoroughly wet.



**Beginning at the point most distant from your containment entrance/exit, remove all plastic.** First, peel the plastic off the walls and lower them onto the floor. Then carefully roll up the plastic on the floor, being careful that all debris stays contained within the plastic. Work toward your exit. Stay on the plastic flooring at all times during this process. In larger rooms, you may need to bag the wall plastic separately to avoid creating a bundle of plastic too large to bag. Roll and fold the plastic sheeting toward you while remaining on the plastic.



Place each roll of contaminated plastic inside asbestos waste disposal bags.



Place each bag of asbestos debris into a second, clean bag, carefully securing each by twisting the tops, bending the twisted part over and securing with duct tape.



Never attempt to vacuum or sweep up asbestos debris. This will cause any fibers present to become airborne in your house.

# **CLEANING UP (CONT.)**

## 13. Decontaminate.

Stand on the last piece of plastic sheeting outside the entry/exit door.

**Spray yourself (or each other) with water** to wet down any asbestos debris/fibers on the outside of your respirator and disposable coveralls.

**Remove boots.** Double bag them in asbestos waste disposal bags for disposal or, should you want to keep them, remove any accumulations of popcorn material and set them aside on the plastic sheet for further cleaning.

**Remove your disposable gloves and coveralls** by peeling them off and turning them inside out as you remove them. Double bag them in asbestos waste disposal bags. Step off the last plastic sheet.



**Remove respirators and take out their filters.** Discard the filters with other asbestos waste.

**Clean safety gear and tools.** Using clean wet rags, wipe down your respirator, goggles, tools used in the removal, and, if you elect to keep them, your boots. Place your respirator, goggles, and tools in the bucket and your boots in a plastic bag for washing later.



**Double bag all remaining debris,** including all cleaning rags, disposable items, and the last plastic sheet, in asbestos waste disposal bags.

Tightly twist the tops of each bag, bend the twisted part in half, and seal with duct tape.



Take a shower.

## DISPOSAL

## 14. Prepare and check all waste disposal bags.

All debris must be properly packaged for disposal: double bagged inside pre-labeled 6-mil bags designed specifically for asbestos waste disposal. Tops should be twisted and securely taped down. If you haven't already done so, use a permanent marker pen to write your last name, address, and date of removal on each bag.

### **15. Transfer bags to an approved asbestos waste disposal site.**



Don't forget to complete an asbestos waste material shipment record which can be downloaded from our web site at www.pscleanair.org.

All double-bagged or wrapped debris must be hauled to the disposal site or transfer station in a covered vehicle within 10 calendar days of being removed.

Asbestos debris from an asbestos project must be disposed of only at disposal sites or transfer stations authorized to receive such waste. A list of disposal sites can be found on our web site www.pscleanair.org. Call individual sites for disposal fees and any additional requirements they may have for disposal.

Debris must be legally disposed of within 10 calendar days of being removed. If you must store the packaged debris prior to disposal, store it in a secured area, such as a locked basement or garage.



Asbestos Waste Disposal Bag



1904 3rd Avenue Suite 105 Seattle, WA 98101-3317 (206) 343-8800 (800) 552-3565