



How to Caulk The Air Leaks in Your Home

This instructional video has been produced by your WeatherizationPRO Dealer Network members. It is to show our homeowner clients how to install commercial grade caulk in the gaps, cracks, and holes to stop the air leakage in their homes. According to the Department of Energy, a typical U.S. home has over one half (1/2) mile of gaps and cracks. Your hard earned energy dollars flow out through these cracks around your windows and doors.

With such significant amounts of your conditioned air leaking from your home, this explains why some areas of your home may not be as comfortable as they should be. By installing commercial grade caulking around the trim of your windows and doors on the interior and exterior of your home, you can significantly reduce your air and energy leakage, and be more comfortable in your indoor living environment.

We recommend always having your WeatherizationPRO Home Performance Professional first measure to determine the actual amount of leakage of your windows and doors using a blower door, and infrared camera and/or air leakage detector (or smoke pencil). You should be present during the blower door assessment, so you can see where, and how much, your windows and doors are leaking air and energy.

This instructional video will show you how to air seal the gaps and cracks around your windows and doors using commercial grade caulking materials.

Please consult with your local WeatherizationPRO Dealer or Home Performance contractor if you need help in determining what type caulk is best to use in your home.

The tools and materials you will need are:

- **Commercial-Grade Low Odor LATEX Caulk in White and Clear colors**
 - **Commercial Grade Caulk Gun**
 - **Small Blade Putty Knife or Scraper**
 - **Paper Type Dust Mask Respirator and Safety Glasses or Goggles**
 - **Several pairs of disposable nitrile gloves - the tight fitting blue colored gloves**
 - **Old Clothes that may get dirty (sometimes caulk does not clean out of clothing very well)**
 - **Stable 6 foot step ladder**
 - **Utility Knife and Scissors**
 - **Several damp cleaning rags, and drying rags or towels (that may be thrown away after use)**
1. As you begin your air sealing and caulking project, you should take all normal necessary safety precautions and use good safety practices. You should always wear a respirator or dust mask, safety glasses or goggles, old clothes, and nitrile gloves as you are installing caulk.
 2. It is best if the area of the house in which you are working is well ventilated. We recommend using only a low odor caulk on the interior of homes, as there may be a small residual odor for 24 – 48 hours after caulking.
 3. Sometimes it will be necessary to remove old caulk and / or paint before installing new caulk around your windows and doors. This is typically best accomplished using your utility knife, putty knife and scraper.
 4. Before you begin installing caulk, you should clean the dust and dirt from all surfaces of the area in which you are working with a damp cleaning rag, and dry the surfaces with a drying rag or towel.
 5. Installing caulk is something that gets easier to do the more you install, so if it seems

uncomfortable at first, keep trying – you will get better with practice.

6. Place a caulk cartridge in your caulk gun and using your utility knife or scissors, cut the tip of the nozzle at a 45 degree angle so that a bead of caulk about one eighth inch (1/8") - to one quarter inch (1/4") will flow from the tip of the cartridge.
7. Using the "flip pin" or a nail, break the seal through the nozzle of your caulk cartridge. Using the shaft and trigger of your caulk gun apply pressure with your gun, so that caulk will flow from the tip of the cartridge.
8. Install (or apply) a one eighth inch (1/8") bead of caulk into the gaps of the trim around the window, door, or area in which you are working. Run the bead out about four feet or the full length of a particular trim piece.
9. We recommend wearing nitrile gloves when caulking and press the caulk into the gap using the tip of your index finger.
10. Immediately after "running a bead line" of caulk, use your index finger inside a clean damp cloth to clean the area you have just caulked. Lightly wipe over the areas you have already caulked to clean any excess caulk and provide a more uniform look to your caulk installation.
11. Continue this process around all your windows, doors, and other areas inside your home that need to have the gaps and cracks air sealed.
12. It may take up to 24 to 48 hours for the caulk to cure, and there may be a residual smell of caulk in the air. We recommend installing a carbon odor filter in the place of your regular furnace or air handler filter. Leave this filter in place until your next regularly scheduled filter change. This should help dissipate any residual odors from the caulking.
13. When your caulking and air sealing project is complete and you have inspected your own work, you may dispose of the gloves and your excess waste materials in your

normal plastic garbage bags and containers.

14. After completion of your project, be sure and clean the entire work site, and call your WeatherizationPRO Home Performance Dealer to come back and re-test for air leakage with their blower door and other Home Performance diagnostic equipment.
15. The air sealing and caulking on your home should be tested and evaluated every 2 to 3 years, depending on the part of the country in which you live.
16. You may want to also inspect around the windows and doors on the exterior of your home for significant gaps and cracks that need to be caulked on the outside of your home. This should probably be handled as a separate project.
17. Caulking around your windows, doors and the gaps and cracks in your home is one of the most economical ways to save energy. You should also be able to feel the difference in comfort in your home for many years to come.

(Sentence below scrolls across video page as it is read to finish video)

For more information, or to purchase your commercial grade caulking materials and supplies, contact your local WeatherizationPRO Dealer / Contractor or call our national WeatherizationPRO headquarters in Denver, Colorado at 303-978-1500. You may also return to the home pages of our WeatherizationPRO.com website and contact us electronically.