



Aerosol Therapy

An aerosol (AIR o sol) is a mist that has medicine in it. Aerosols help make breathing problems better. Your child breathes it into the lungs through a mask or mouthpiece (Picture 1). The effect of the aerosol depends on the type of medicine used.

The first few times the aerosol is given, your child may be afraid of the mask. He or she may have a feeling of shortness of breath for a few minutes. To get familiar with the mask, let your child hold the mask, look at it and try it on. Tell your child it will "smell funny," but after he breathes the medicine, breathing will be easier. You will need:

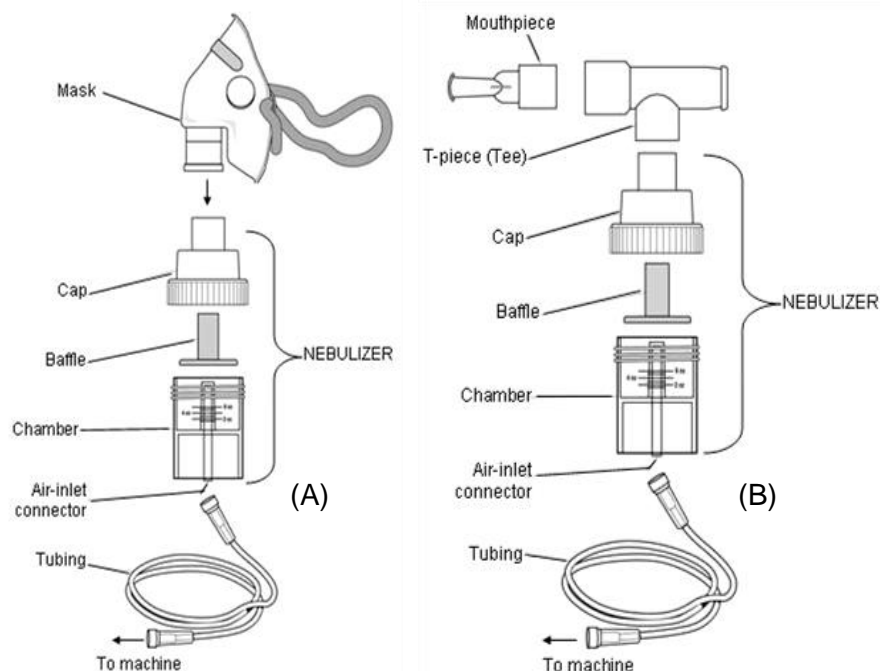
- 1 or 2 nebulizers (the container where the medicine is poured)
- Aerosol machine (compressor)
- Tubing
- 1 or 2 masks or mouthpieces (Picture 2)
- Medicine prescribed by your child's doctor
- White vinegar for cleaning the equipment (or disinfectant if ordered by your doctor)

If your child uses Pulmicort Respules®, Pulmozyme®, Tobii® or Hyper-Sal, he should use a PARI nebulizer. If you do not have one, talk to your child's doctor.

NOTE: Do not give more of this medicine than your doctor prescribed. If it does not work, call your doctor immediately.



Picture 1 The mask is used with the nebulizer until the child is about 6 years old.

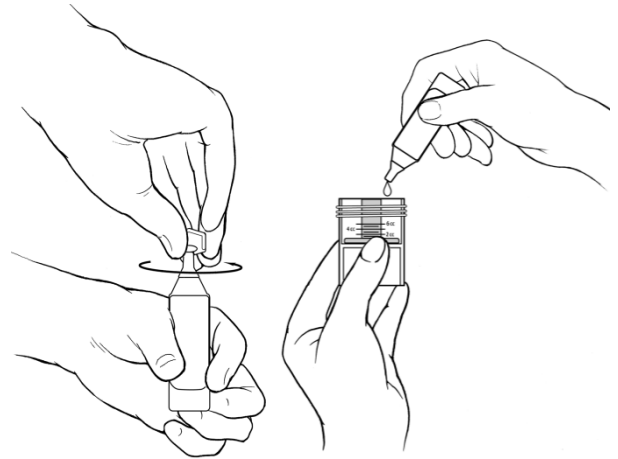


Picture 2 The nebulizer is used with either a mask (A) or a mouthpiece (B).

How to give an aerosol treatment

Opening the medicine and connecting the machine

1. Wash your hands well.
2. Unscrew the nebulizer and remove the cap from the chamber.
3. You will get the medicine from the pharmacy in a plastic vial or bottle. It is ready for use in the machine. Open the vial of medicine (Picture 3) and put it all in the chamber of the nebulizer (Picture 4).
4. Hold the chamber still and screw the cap back onto the chamber (Picture 5).
5. Connect the mask (or mouthpiece) to the top of the nebulizer cap. (Picture 6)
6. Connect one end of the tubing to the bottom of the nebulizer and the other end of the tubing to the aerosol machine (Picture 7). It does not matter which end of the tubing is attached to the machine.
7. Plug in the aerosol machine. **Do not use an extension cord.** Turn the machine on.

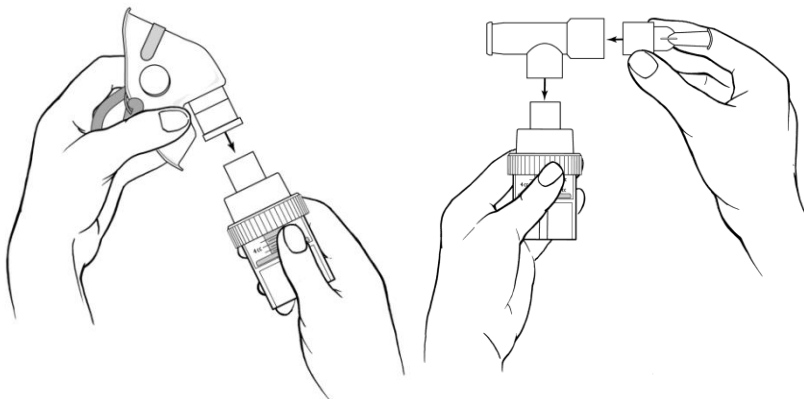


Picture 3

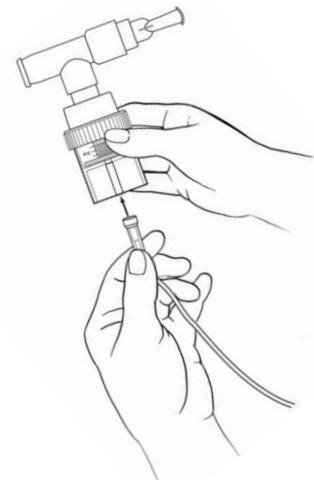
Picture 4



Picture 5



Picture 6



Picture 7

How to give an aerosol treatment, continued

Using the mouthpiece

You will need to make sure your child is breathing through his mouth. You can tell this by watching the far end of the mouthpiece. If you can see the mist coming in and out, your child is breathing through his mouth. But if the mist is always coming out the far end of the mouthpiece, he is breathing through his nose.

1. Have your child sit in an upright position. Let him hold the mouthpiece.
2. Tell your child to place his teeth and lips on the mouthpiece. Tell him to breathe in and out through the mouthpiece.
3. Have your child breathe normally through his mouth and breathe in the mist for 10 to 15 minutes or until the medicine is gone. Remind him to breathe through his mouth.

A good age to start using the mouthpiece is about 6 years old. If your child has trouble breathing through the mouth, you may need to use the mask for the aerosol treatments.

Using a mask

1. Your child should sit in an upright position or on your lap (Picture 1).
2. Have your child breathe normally and breathe in the mist for 10-15 minutes or until the medicine is gone. When using the mask, your child can breathe through **both** the nose and mouth.
3. Make sure the mask covers both the nose and mouth of your child. You can help by holding it in place or by using the strap.

After each treatment

1. Turn off the machine.
2. Remove the nebulizer from the tubing.
3. Unscrew the top half (nebulizer cap) from the bottom half (chamber) of the nebulizer. Remove the inner baffle. (Picture 2, page 1) **Note:** If the removable baffle is lost or not in the nebulizer, the nebulizer will not work.
4. Wash the parts with soap and warm water and rinse well.
5. Let the equipment air dry on a clean paper towel.
6. Store the equipment and the medicine out of the reach of children.
7. Check the nebulizer and tubing for breaks and cracks. Throw away broken or cracked equipment. Be sure to reorder new equipment when needed.

How to clean the aerosol equipment

Every day - Clean the outside of the machine with a damp cloth after unplugging the machine. Do not wash the tubing or compressor.

Clean the nebulizer to kill bacteria and remove the build-up. All parts attached to the tubing can and should be washed. Take it apart and wash the parts in warm, soapy water. (Check the booklet or video that comes with your child's machine. Many nebulizers can be washed in the dishwasher.)

Once a week - Disinfect the equipment using either a vinegar solution or a disinfectant ordered by your doctor:

1. To make a vinegar solution: mix 3/4 cup of water with 1/4 cup of white vinegar (the kind that looks like water).
 2. Take the nebulizer apart and place the parts in a clean pot or bowl.
 3. Pour enough vinegar solution in the bowl to cover the parts. Let them soak for half an hour.
 4. Wash the mouthpiece or mask with hot soapy water.
 5. Rinse the equipment with water and air-dry on a clean paper towel.
- If the filter on the aerosol machine is dark brown, put in a new one. Follow the manufacturer's directions for replacing the filter. Always keep an extra filter on hand. If you need a new one contact the provider.
 - Store the equipment and medicine out of reach of your child. The nebulizer can be stored inside the machine, along with the tubing.

How to get an aerosol machine

- You must have a doctor's prescription to get an aerosol machine. Often the staff at the doctor's office will order the machine for you.
- Several different medical supply companies stock the aerosol machine. Supply companies are listed in the yellow pages of the phone book or on the internet under "Oxygen." Most of them let you either rent or purchase the aerosol machine. You may want to compare costs before ordering because the cost of the machine varies with each medical supply company. Many insurance companies, Medicaid or Medicare will pay for some or all of the cost.

Please ask a staff member at the doctor's office or at the hospital to assist you with finding a medical supply company.

- Usually someone from the supply company will deliver the machine to your home and instruct you in its use and care.