

Have Neb. Will Travel. *Asthma on the Run*

A mother we know writes:

"Studies show that using the new spacer is as effective, if not more effective than using even the nebulizer," stated Dr. Schneider, my child's pediatrician. For years now we've been using that small, white, portable machine. It pumps air through a tube into a canister of liquid medication mixed with sterile saline solution. The air and medication form a mist that is inhaled, delivering needed relief to the constricted lungs and air passageways of asthma sufferers. For my son, it is the only effective means of relief. Inhalers fail. Syrup takes too long.

Bronchodilators are one method of treating asthma "... which make breathing easier by relaxing smooth muscles in the airways," according to the online *MediZine*. Bronchodilators include a medicine called Proventil, Ventolin or Albuterol. I quickly learned after my son's diagnosis with asthma, that all these names refer to the same medication. Not only does this medication have three names, it has three methods of distribution to the lungs.

In syrup form, Albuterol delivers the needed relief in an estimated 40 minutes. During that 40 minutes there is no other relief that can be administered, so while on Albuterol syrup, my son has to suffer—something the doctor and I feel is unacceptable. The syrup also spreads the medication throughout his body, not just to the lungs. This causes accelerated heart rate and nervous irritability.

We attempted to use the inhaler, but to no avail. My son will continue to have difficulty breathing with no relief to his lungs. For some reason, it doesn't get enough medicine into his lungs to allow them to open and reduce the swelling. When my son turned three, the nebulizer was then recommended because of the problems found with the other forms of delivery and the side effects of the inhalers and syrup. At that time, it was the best relief that could be provided.

We adapted our life to The Neb. It is a portable, small machine about thirteen inches by six inches. In non-asthma time periods, (which were periods two weeks after the attack and until the next,) we run, swim, bike and play to our heart's content. During an asthma attack at its worst stage, we stay pretty homebound. But as soon as my son is up to it, we return to school activities, and the playground. All that is necessary is to bring along our method of medication delivery—the Neb.

My son is never embarrassed by hauling around the machine. The portability of the Neb enables him to continue schooling with minor five to ten minute breaks every four hours to receive medication. He has been able to educate other children about asthma as well as become a judge of his own limits. Modern medicine, I feel, has made it possible to travel. I carry that nebulizer everywhere during a bad asthma attack and it enables my son to live a fairly normal life.

Unfortunately, I have learned there are a few places you cannot carry a nebulizer and be able to use it. One is on a plane up in the air between Denver and Chicago. On that flight, I had to improvise. In order to deliver oxygen to my son's lungs, I used an oxygen tank with a mask and pumped inhalers into the mask. It took over 40 minutes, but he did begin to breathe a little easier by the time we disembarked in Chicago. I wondered if there was ever going to be an alternative to the use of the nebulizer as the most effective means of asthma relief.

Recently the American College of Physicians released the results of a "randomized controlled trial" on the use of inhalers with a spacer, versus a nebulizer. In their report, they stated, "A metered-dose inhaler with a spacer was more effective than a nebulizer in children with acute asthma." According to their report, the ACP found that the metered dose inhaler (MDI) group "spent less mean treatment time in the ED, and had a smaller mean percentage

increase in heart rate than patients in the nebulizer group. Fewer patients in the MDI group had episodes of vomiting."

This sounds impressive to me. Although, "In patients with severe acute asthma attacks," states the ACP, "nebulizers are probably still advantageous, allowing oxygen to be administered at the same time as the (medication;)" the "metered-dose inhaler with a spacer for the administration of albuterol (is) an effective alternative to a nebulizer in children with acute asthma and result(s) in both shorter treatment time spent in the emergency department and fewer side effects."

Forget the emergency room! I'll take a tiny blue inhaler spacer that fits in my purse, my son's backpack or the pocket of a jacket anytime to my current portable nebulizer. "Look mom, it's so small and it fits in my pocket," states my child. The inhaler reduces in size to roughly a four inch round circle, half a centimeter thick, with a mouthpiece attachment about four inches long. A pocket version Neb with no plug-in!

Now that's progress, if it is "as effective as a nebulizer in treatment of acute attacks" like an English study shows. Not only that, "see how light it is, and it's easy," my child continues. Yes, "(its) light, cheap, maintenance free, portable and prescriptible." Well, we were portable before, but with the limitations on that portability, we're trying the new option.

As a friend of mine states:

"As always, carpe diem"

Susan McLain