Supplemental Oxygen For Your Pets

Owners of aircraft know the advantages of flying at higher altitudes when traveling to far off destinations. The question then begs to ask, "Where do you want to fly to today?" Once you have that special destination planned it is known that you will need oxygen to breathe while you are climbing to altitudes that are best for the aircrafts performance. Supplying oxygen to yourself and other passengers is not complicated, but what about your "other" family members.

More and more pilots are taking their family pets on vacations and business trips. What do you do to keep them healthy while at these altitudes? Most pilots I have heard from say, "Well the dog just goes to the back of the plane, lies down, and goes to sleep. Then when we arrive the dog sometimes acts lethargic, walks sideways, and generally doesn't act right for about an hour, then they are just fine." These are just some examples of short-term side effects of Hypoxia.

The medical definition of Hypoxia is, a reduction of oxygen supply to a tissue below physiological levels despite adequate perfusion of the tissue by blood. To me as a pilot it means a lack of oxygen in the blood, which leads to headache, dizziness, shortness of breath, blurred vision, and mental confusion. Most of these effects are short term and a person or pet can recover. But what about long term effects of Hypoxia?

This was a major concern of Kent and Lori Carter, owners of Precision Grinding and 4 Paws Aviation located in Warsaw, Indiana, and who own a Cessna Turbo Centurion. They fly with their "family" all the time for business and pleasure at altitudes where oxygen is required. They have two male Brussels Griffon, Cody and Moe. They love to fly and go everywhere with Kent and Lori.

In 2006 Lori had read an article in AOPA called, "Flying with Pets". The information in the article was not to fly over 5,000 feet with short nose dogs. By going higher it would increase the chances of Hypoxia and create health issues. On a trip planned to Gatlinburg, Tennessee and while taxiing out, Kent received his clearance to 12,000 feet, and then he felt something. He knew right away it was the feeling of Lori looking at him from the right seat. Being the husband that he is, he responded, "what?" It was then Lori said "we're not going over 6,000 feet with the dogs." After a short discussion and Kent knowing he was PIC, he finally compromised and agreed to not go above 8,000 feet. Clearance Delivery amended his NEW altitude request and off they went. At this moment the idea of an oxygen delivery hood for their dogs was born.

On the following Monday Kent and Lori started searching for some type of Oxygen delivery for their dogs. Outside of an oxygen box nothing they found would work. They contacted their local veterinarian and together it was determined that a hood, that covers the dogs head, was needed and attached in a way the dogs could not remove them.

There has now been over four years of research and development and now the final product is available to the public. 4 Paws Aviation has done research with several volunteer animals. Our test results have shown animals start decreasing blood oxygen levels starting at 8,000 feet and a significant decrease at 10,000 feet and above. We recommend oxygen use at 10,000 feet and above for your pets, lower if the owner thinks it is necessary. Since our hood unit uses constant flow oxygen, we recommend about 60 percent of the flow rate for humans for large dogs. This has produced a blood oxygen level in the middle to upper 90 percentile. With oxygen the animals are alert and responsive. Without oxygen they have been lethargic, not responsive, and have labored breathing. These are signs of Hypoxia.

According to veterinarians, some of the long-term effects of Hypoxia are brain damage, blindness, congestive heart failure, and even death. These effects are unacceptable for 4 Paws Aviation.

To date we have shown and sold the hoods at Sun-N-Fun and Oshkosh with great interest. Several units are being used today in the United States, Canada, United Kingdom, Australia, Germany, France, Brazil, and South Africa. The feed back from the owners is upbeat and positive. The dogs have adapted to the hoods well and know when they see the hood, they're going flying! What could be better then that.

We are continuing our research here at 4 Paws Aviation and Cody and Moe are a vital part of that. They love to go on trips and get to meet new friends during testing.

Our oxygen hoods can be found at <u>www.4pawsaviation.com</u>. They come in five sizes, Small to XX-Large. Custom colors and sizes are available too. Watch for our new line of noise reduction Muffs for your pet too!

If you have four legged family members and hate to leave them behind, now you can take them with you, knowing they will be safe from Hypoxia and any of its short or long term effects. Keep them happy, safe, healthy and flying. Safe flying from all of us at 4 Paws Aviation.