

## Adaptive Immunity ~ Use it or Lose it!

There have been several studies recently, which point to the potential dangers associated with repeated antibiotic usage. Though the studies were conducted on humans, we can take the findings and apply those general observations to our racing pigeons. The most interesting study, followed 14,000 children from birth to age seven. This study showed that those children who received antibiotic treatments early in life, **appeared to develop dysfunctional immune responses** when compared to those children who did not receive antibiotics. The conclusions of the scientists were: "Children who had received more than four courses of antibiotics were almost twice as likely to have asthma develop."

Scientists suggest, that asthma is a greater problem for these children because their immune systems did not learn how to properly respond to their environment. In other words, the "natural learning process" which leads to the development of a healthy immune response was superseded by multiple courses of antibiotic usage. The end result being, the immune response becomes "dumbed down" and loses the flexibility to "adapt and learn". Obviously, **broad spectrum antibiotics** are even more likely to interfere with the "natural learning process" as these are capable of suppressing multiple microbial populations at the same time and thus interfere with multiple, concurrent, immune response learning processes.

I should point out that antibiotics can serve a valuable role in fighting infections, as they are sometimes "life saving" treatments. However, realize that the immune system not only "inherits" its defense mechanisms, but it also "learns", by trial and error, the best procedures for dealing with every pathogen with which it will come in contact. This learning process, when allowed to proceed naturally, leads to an improved immune response which can then be duplicated or modified as needed, in order to suppress new infections by the pathogenic invaders. We call this process of "learning, memorizing and duplicating" the correct immune response, "**Adaptive Immunity**".

**The Problem:** Many in our sport try to replace the natural immune response in our birds, with medications and antibiotics. We treat our breeders prior to the formation of the egg and this may well dilute the effectiveness of the immune factors passed in the egg to the embryo. We continue treating the parents and any babies while in the nest, reducing the immune factors passed in the pigeon milk. We treat youngsters while they are on the floor of the breeding loft and again after we move them into the YB section. We then put these youngsters on a 3-in-1, 4-in-1, or 5-in-1 "cure all" health program. Some fanciers prefer to cycle through a weekly rotation of different medications and antibiotics, in the hope of treating "any and all" possible pathogens.

**The End Result:** We are crippling the "adaptive immunity" of our birds! The immune system of our youngbirds are not allowed to "learn" how to successfully; encounter, identify, interdict and destroy many of these pathogens on its own. It is not allowed to come to a complete solution and then to imprint that solution into its immune "history", through genetic adaptation of its antigen receptors, "B" and "T" memory cells, somatic mutations, etc. Since the bird has not learned how to successfully adapt its immune response, it cannot recall from its "immunological memory", the solution, nor can it pass these "immunological adaptations" (immune factors) to its own young, during egg formation nor in the pigeon milk.

A pigeon passes "immunological adaptation" to its young twice, once in the egg and once again in the pigeon milk. Scientist sometimes refer to this transference process as the "immune factor". Most all mammals pass this "immune factor" in their milk. However, if the parent does not have a competent "history" to pass to the youngster then the immune response of that youngster is diminished, since there is only an **incomplete blueprint** of how to respond to certain pathogens. This leads to generation after generation of impaired "immunological memory" being passed on, and this may well point to why our birds seem less resistant today to diseases, than they were 30 or more years ago. **The generations of pathogens are adapting faster than our birds!**

The important information for us is that **if the process of "adaptive" immune response is short circuited** by continued usage of medications and antibiotics, there will be far less adaptive genetic encoding (learning) and therefore, diminished long-lived specific immunity. If the bird's immune response does not learn the solution, it cannot self-duplicate the solution nor pass that adaptation of the genetic encoding (antigen receptors, B and T memory cells, somatic mutations, etc.) to its progeny either in the egg or in the pigeon milk.

A window of opportunity exist during the first few weeks and months of a pigeon's life, where the immune system is most receptive to learning and adapting. **If this opportunity is squandered**, through multiple courses of medication and antibiotic treatments, a negative health effect will follow the bird throughout its life and pass to its offspring.

### Adaptive Immunity, Use it or Lose it !!!!

**What is a fancier to do? Adopt a sane approach to pigeon health based on supporting the natural immune response. Read the next page to find the best solution available to our sport today!**

# The Quiet Revolution in Pigeon Health and Performance

It was quite rewarding to view the 2007 Old Bird AU National Award Standings and to see that in 4 of 5 National Ace Pigeon categories, 6 of 9 AU Hall of Fame categories and 8 of 8 President's cup categories, at least one of our customers was listed in the top 10. In many categories there were more than one and in one category of National Ace Pigeon, three of the top five birds listed were from three different fanciers who use our products. Considering that I have a small clientele of about 160 customers, these accomplishments speak volumes about the results obtainable by fanciers who choose our products for loft health and racing performance.

**Max Immune Plus** ~ To be used as a preventive and during recovery from Youngbird Sickness, Circovirus, Adenovirus, Enteritis, etc. Destroys viruses, bacteria, yeast, fungus, allergens and other toxins. Contains antibodies against Rotavirus, Coronavirus, E coli, Clostridium, Salmonella, Paratyphoid, Streptococcus, Staphylococcus, Candida, H pylori, Cryptosporidium and many other pathogens. Also contains important minerals, vitamins, amino acids and **Bio-Fresh probiotics** necessary for stabilization and recovery. One teaspoon per 80 birds once a week. May be applied to feed or in the water. **5% off when you buy with Show Stopper. 44 teaspoon container = \$14.99 / 88 tsp. = \$27.95**

**Show Stopper** ~ When you use Show Stopper and Max Immune Plus (on separate days), there is no greater protection you can give your birds than these two synergistic products. Show Stopper and Max Immune Plus can be used individually as excellent Immunity builders but when incorporated together into a health program, they create the most effective immune building health system for the racing pigeon sport available today. **Show Stopper**, is the only pigeon product on the market today that includes antibodies, immunoglobulins, and "Cocci-Gone", a scientifically proven "all natural" coccidiosis inhibitor. Additionally, we include special healing ingredients that condition and repair the intestinal wall lining from pathogen induced tissue scarring. Protection from scarring, allows for better nutrient absorption and better waste elimination through the digestive tract. Show Stopper, also contains important minerals, vitamins, amino acids, and our **Bio-Fresh probiotics**. Fanciers who utilize the Max Immune Plus and Show Stopper products will have little need for medications or antibiotics throughout the year. One teaspoon per 50 birds twice a week on the feed. **5% off when you buy with Max Immune Plus. 50 teaspoon container = \$12.99 / 100 teaspoon container = \$23.95**

**Bio-Fresh** ~ Our probiotics are grown for us by the top culture lab in North America, then shipped by overnight delivery right to our doorstep. Our product also contains antibodies and immunoglobulins plus special pre-biotics to supply specialized nutrients for better colony growth and effectiveness in protecting your birds. Studies have shown that these **pre-biotics increase the probiotic effect in your birds by 2 - 4 fold**. Every gram of our probiotic / prebiotic mixture contains billions of the colony forming friendly bacteria most helpful for pigeon health. *There are several companies offering probiotics with inflated friendly bacteria counts. Don't be fooled by these false numbers.* One gram supplies 3.0 billion Friendly Bacteria + antibodies + immunoglobulins and **2 - 4 fold** prebiotic boost. **100 grams only \$15.95**

**Super Creatine Plus** ~ **Now 20% More !! Only available through RacingPigeonMall.** This "micro-encapsulated" three-in-one product gives 20 times greater utilization than regular creatine products (with none of the toxins associated with regular creatine usage). "Super Creatine Plus" is the **premier "performance enhancing" supplement** on the market today, secretly used by many top racing lofts in America today. Additionally, customers are reporting back to us, how beneficial Super Creatine Plus is in the Breeding Loft, and how youngsters raised on this product seem to mature quicker and come out of the nest with superior muscle development and feathering. Also, the breeding pairs stay in top physical condition throughout the breeding season even during those later rounds when the hens usually wear down. **Breeding:** Use ¼ teaspoon in the water per 35 birds once or twice weekly. **Racing:** Use ½ teaspoon per 35 birds on the day prior to basketing. For quick recovery give after returning from a race. Will replenish and rebuild the breast muscles quickly!!! Because of our new volume contract, we are now able to increase the product size by 20% without raising our prices. **Don't be disappointed** with other creatine based products, get the proven leader and reap the same rewards as our many nationally recognized winners. **Highly concentrated (Now 20% more) = \$24.99 (last about a year for most lofts)**

**Baby Booster Pills** ~ Special blend of our immunoglobulins, antibodies, growth factors, probiotics and prebiotics. Very high in easy to digest fats, proteins, and carbohydrates. Should be given to your youngsters in the nest, starting a day or two before the parents stop giving pigeon milk. Will help overcome the set-back (stress) associated with weaning off of pigeon milk and onto grains. Will provide "natural" protection to the intestinal lining after "pigeon milk immunity" is withdrawn. May also be given to old or young bird in the loft that shows signs of stress or comes home late from a race. **Baby Booster Pills: 900+ for \$12.95** Also, ask about our popular "No Light" Yellow and "No Light" Green Pills.

**Priority Mail Shipping is flat rate of \$5.95 regardless of number of items shipped**

**Website: RacingPigeonMall.com To Order, please call John Vance at: 949-496-4825**

**Make checks out to John Vance • 35401 Camino Capistrano • Capistrano Beach, CA 92624**

**We Accept All Major Credit Cards**