

Metropolitan Veterinary Hospital

Akron Veterinary Internal Medicine/Oncology Practice

1053 S. Cleveland-Massillon Road Akron, OH 44321 Phone: 330-666-2976 or 330-670-2351

Immune-Mediated Hemolytic Anemia

Client Handout

Roma has been diagnosed with a disease called Immune-Mediated Hemolytic Anemia (IMHA).

Definition:

This is a disease in which the body's own immune system begins to attack and destroy its own red blood cells.

Red blood cell and organ function:

One of the functions of red blood cells is to carry oxygen from the lungs to the rest of the body's tissues and organs. Inadequate numbers of red blood cells is known as anemia and leads to a number of clinical signs that you may notice in your pet. The body utilizes two organs in which to destroy its red blood cells. These are the liver and the spleen. When the liver begins to rapidly breakdown the red blood cells a product known as bilirubin is formed. This substance can increase in concentration in the blood and can discolor the skin and urine.

Clinical Signs:

You may notice the following symptoms in your pet: lethargy, weakness, panting, exercise intolerance, loss of appetite, vomiting, diarrhea, orange or reddish urine, or a yellow tint to the skin (jaundice).

Animals commonly affected:

This disease usually affects dogs more than cats. Dogs commonly affected are the cocker spaniel, miniature poodles, and Old English sheepdogs that are of the middle age. But remember, any age, any sex (neutered or not), and any breed can be affected.

Causes of IMHA:

These are two classifications of IMHA.

- 1.) Primary IMHA: The initiating cause is often never found, even after extensive laboratory and clinical testing.
- 2.) Secondary IMHA: The cause for secondary IMHA is often due to infectious agents, heartworm disease, cancer, toxic agents, and drugs. As the immune system fights one of the above agents, it sometimes receives an inadvertent signal that the red blood cells also need to be attacked.

Diagnosis of IMHA:

Diagnosis of this disease is based on the information you provide your veterinarian, the symptoms your pet is exhibiting, and laboratory/clinical tests.

Treatment of IMHA:

Treatment is based on correction of the underlying cause (if found), suppression of the immune system with steroids and sometimes chemotherapy drugs are needed. If the anemia is severe, a blood transfusion will be required. Treatment is continued until laboratory tests reveal a resolved anemia and there is no further evidence of red blood cell destruction. Sometimes life-long therapy is needed.

Follow-up visits:

Frequent recheck visits to your veterinarian will be required to monitor how your pet is responding to therapy once he/she is discharged from the hospital.

Prognosis:

The prognosis for IMHA is variable with mortality rates ranging from 33- 50%. Prognosis often depends on the type of IMHA your pet has been diagnosed with, what the inciting agent is (if any), and their response to therapy. Relapses can potentially occur weeks to years later.

Complications of IMHA:

Complications can include: Lung and multiorgan thromboembolism (blood clots) in about 44% patients. Cardiac arrhythmias, liver and kidney damage and/or failure, DIC (disseminated intravascular coagulation), infection, and persistent RBC destruction despite appropriate therapy.