



## **PROSTATITIS & PROSTATIC HYPERPLASIA**

### **Prostatitis? What's That?**

The prostate gland is part of the male reproductive system. It is located at the neck of the bladder. The urethra passes through it. Its job is to produce part of the dog's seminal fluid. What is commonly called "prostatitis" is an inflammation of this gland. Benign prostatic hyperplasia is an age related pathologic change in the prostate gland causing it to be non-painfully enlarged.

True prostatitis is quite painful and is subdivided into acute bacterial prostatitis, chronic bacterial prostatitis, and prostatic abscess. Prostatic abscess is an accumulation of pus inside the prostate.

### **What Causes It?**

Hyperplasia is caused by testosterone (male hormones), estrogens (female hormones), the character of the prostate gland itself, and the aging process. Prostatitis is caused by bacteria gaining access to the prostate gland by ascending the urethra and overcoming the lower urinary tract defense mechanisms. Most intact male dogs with bacterial urinary tract infection have the same bacteria present in the prostate gland. However, dogs with prostatic inflammation may have a prostatic infection without evidence of bacteria or inflammation in their urine. Intraprostatic accumulation of prostatic secretions (e.g., in animals with cystic benign prostatic hyperplasia) can become secondarily infected, resulting in chronic bacterial prostatitis or prostatic abscess. Among surveys of dogs with prostatic disease, infection was present in 40%.

### **What are the Symptoms of Prostatitis?**

The signs of prostatic hyperplasia are observed initially in non-neutered male dogs 1-2 years old, and the prevalence increases linearly so that 60% of male dogs are affected by 6 years of age and 95% of male dogs are affected by 9 years of age. Most dogs show no signs of hyperplasia, but signs may include: bloody urethral discharge,; bloody urine; bloody ejaculate; straining to defecate; ribbonlike stools; straining to urinate.

Prostatitis has the additional signs of lethargy, blood or pus dripping from the urethra independent of urination, straining, fever, and pain. It can also include shock, stiff hind limb gait, and swelling in the rear legs and prepuce. The physical examination shows a symmetric, nonpainfully large prostate gland in hyperplasia. Prostatic pain will be present in dogs with bacterial infection or prostatic cancer and the prostate may be very large and asymmetrical as well.

### **How is It Diagnosed?**

The history and physical examination form the preliminary diagnosis. Several tests may be indicated including urinalysis, blood tests, x-rays, and ultrasound. The prostate may need to be biopsied or cultured as well.

### **Can It Be Treated?**

Castration the most effective treatment and prevents recurrence of hyperplasia, though some hormones may be used in the breeding male in lieu of surgery. Dogs with chronic bacterial prostatitis are treated as outpatients with antibiotics. Dogs with acute bacterial prostatitis require hospitalization because they are systemically ill, and dogs with abscesses require surgery. After a treatment period and good follow-up test results, these dogs also should be castrated to help prevent recurrence. The prognosis will vary with the severity of the disease.

### **Prevention is Better than Treatment**

Prostatitis is virtually prevented by early (under 1 year) castration of the male dog. Its incidence is dramatically lowered in any neutered dog, regardless of dog's age at the time of castration.

*Thank you for this opportunity to serve you!*