FLUID BUILD-UP IN THE ABDOMEN (ASCITES)

BASICS

OVERVIEW
- "Ascites" is the build-up of fluid in the abdomen

SIGNALMENT/DESCRIPTION of ANIMAL

Species
- Dogs and cats

SIGNS/OBSERVED CHANGES in the ANIMAL
- Episodic weakness
- Sluggishness (lethargy)
- Abdominal fullness or swelling
- Discomfort when the abdomen is felt during physical examination (known as "palpation")
- Difficulty breathing (known as "dyspnea") from abdominal swelling, putting pressure on the chest and lungs; or associated fluid build-up in the space between the chest wall and lungs (known as "pleural effusion")
- Lack of appetite (known as "anorexia")
- Vomiting
- Weight gain
- Fluid build-up (known as "edema") in the scrotum or penis
- Groaning when lying down

CAUSES
- Nephrotic syndrome (a medical condition in which the animal has protein in its urine, low levels of albumin [a type of protein] and high levels of cholesterol in its blood, and fluid accumulation in the abdomen, chest, and/or under the skin)
- Cirrhosis (progressive damage and scarring) of the liver
- Right-sided congestive heart failure (condition in which the heart cannot pump an adequate volume of blood to meet the body's needs)
- Low levels of protein in the blood (known as "hypoproteinemia")
- Ruptured bladder
- Inflammation of the lining of the abdomen (known as "peritonitis")
- Abdominal cancer
- Abdominal bleeding

RISK FACTORS
- Kidney or liver disease
- Trauma (rupture of urinary bladder; abdominal bleeding)

TREATMENT

HEALTH CARE
- Outpatient or inpatient treatment, depending on physical condition of the animal and underlying cause of fluid build-up in the abdomen (ascites)
- If patient is markedly uncomfortable when lying down or has more difficulty breathing (dyspnea) with stress, consider tapping the abdomen and removing enough fluid to reverse these signs
- Dietary salt restriction may help control some fluid accumulation related to progressive damage and scarring of the liver (cirrhosis), congestive heart failure, or low levels of protein in the blood (hypoproteinemia)
- Can re-circulate non-infected abdominal fluid in patients with liver insufficiency or nephrotic syndrome (a medical condition in which the animal has protein in its urine, low levels of albumin [a type of protein] and high levels of cholesterol in its blood, and fluid accumulation in the abdomen, chest, and/or under the skin) that are no longer responding to conservative medical and dietary management

ACTIVITY
- Depends on underlying cause and condition of the animal

DIET
- Depends on underlying cause
- Patients with liver insufficiency or congestive heart failure—restrict sodium

SURGERY

• Corrective surgery often may be indicated (examples, to remove a tumor or to control abdominal bleeding)

MEDICATIONS

Medications presented in this section are intended to provide general information about possible treatment. The treatment for a particular condition may evolve as medical advances are made; therefore, the medications should not be considered as all inclusive.

• Patients with liver insufficiency or congestive heart failure—medications to remove excess fluid from the body (known as "diuretics"); combination of hydrochlorothiazide and spironolactone; if control is inadequate, furosemide can be substituted for hydrochlorothiazide with spironolactone continued; must monitor serum potassium concentration to prevent potassium imbalances
• Patients with low levels of protein in the blood (hypoproteinemia), nephrotic syndrome (a medical condition in which the animal has protein in its urine, low levels of albumin [a type of protein] and high levels of cholesterol in its blood, and fluid accumulation in the abdomen, chest, and/or under the skin), and fluid build-up in the abdomen (ascites)—treat with medications to remove excess fluid from the body (diuretics) and add colloids (fluids that contain larger molecules that stay within the circulating blood to help maintain circulating blood volume), such as hetastarch
• Antibiotic therapy for patients with fluid build-up in the abdomen due to bacterial infection (known as "septic ascites"); antibiotics should be selected based on bacterial culture and sensitivity testing

FOLLOW-UP CARE

PATIENT MONITORING

• Varies with the underlying cause
• Check blood work (serum chemistry profile, including sodium, potassium, blood urea nitrogen, creatinine) and body weight periodically, if the patient is maintained on medications to remove excess fluid from the body (diuretics)

PREVENTIONS AND AVOIDANCE

• Keep animals in confined locations (such as in the house or in a fenced yard) or on leash to prevent trauma

POSSIBLE COMPLICATIONS

• Aggressive administration of medications to remove excess fluid from the body (diuretics) may cause low levels of potassium in the blood (known as "hypokalemia"), which could lead to worsening of clinical signs or complications

EXPECTED COURSE AND PROGNOSIS

• Vary with the underlying cause

KEY POINTS

• "Ascites" is the build-up of fluid in the abdomen
• Aggressive administration of medications to remove excess fluid from the body (diuretics) may cause low levels of potassium in the blood (known as "hypokalemia"), which could lead to worsening of clinical signs or complications
• Keep animals in confined locations (such as in the house, in a fenced yard) or on leash to prevent trauma