What is a zoonotic parasite?
A parasite is a living organism that lives upon or within another living organism at whose expense it obtains nutrients and shelter. Zoonotic parasites can be transmitted between pets and humans.

What are roundworms and hookworms?
Roundworms and hookworms are zoonotic parasites that commonly inhabit the intestines of cats and dogs. While most common in kittens and puppies, infection can occur in dogs and cats of all ages. The mouthparts of hookworms are modified into cutting plates that attach to the host’s small intestine allowing them to feed on the host’s blood. Roundworms feed in a similar fashion. Roundworms and hookworms can cause mild to extreme illness in pets and, in some cases, death.

Who in the family is at risk?
All human family members are potentially at risk from zoonotic parasites. The presence of dogs in a household, especially puppies, results in a greater risk factor due to their soiling habits. Cats can also transmit zoonotic diseases, but due to their tendency to defecate in one area and bury it, exposure is less likely. Children run a higher risk of coming in contact with a zoonotic disease due to their play habits, attraction to pets and pica (dirt eating).

Sources for infection in pets
Pets can ingest the eggs or larvae directly, through coprophagia (eating of fecal waste), or by eating rodents or other animals. Larvae can be transmitted from the mother to their puppies/kittens while they are still in the womb and while nursing. Pets should be treated for parasites prior to breeding to protect their young from developing the infestation.

How does infection occur?
Contaminated environments such as parks, playgrounds, and sandlots that are frequented by pets and other animals can expose humans to zoonotic parasites. When a human ingests infective eggs through the soil or through direct contact with pets, the eggs hatch and release larvae that migrate throughout the body. Roundworms can cause a variety of organs to become infected which can cause neurological problems, tissue damage and/or stomach pains. Migration of the parasite into the eye can cause blindness. Hookworms can also infect humans by directly penetrating the skin where they then undergo a longer migration that can leave painful track marks on the surface of the skin.
How do I know if my pet is infected?

Most pets will show no sign of infection, which is why it is so important for your Banfield medical team to perform two fecal exams a year and to administer a bi-annual dewormer to your pet. Some pets, especially kittens or puppies, do become noticeably ill and symptoms can include:

- Vomiting
- Severe weight loss
- Loss of appetite
- Swollen stomach
- Severe anemia
- Even death

What can you do to protect the entire family?

- Systematically deworming dogs and cats is the main defense for preventing roundworms and hookworms in pets and humans.
- Schedule twice yearly exams and fecal exams for your pets.
- Quickly clean up after your pets to remove potentially infective eggs from your environment before weather, insects, or active migration of the larvae allows them to spread.
- Discourage children from eating soil.
- Cover sand boxes when not in use, and avoid possibly contaminated areas.
- Practice good hygiene for both your family and pet.

Deworming schedule recommended by Banfield Pet Hospital and the Center for Disease Control (CDC)

**Puppies:** First at 4 weeks of age then every four weeks until 20 weeks, and then every six months and as needed.

**Kittens:** First at 6 weeks of age, then every four weeks until 20 weeks, and then every six months and as needed.

**Adult pets:** Bi-annual fecal exams and bi-annual deworming medicine. Additional fecal exams and/or deworming as recommended by your Banfield veterinarian.