VACCINATIONS FOR CATS

What is a vaccine?

Vaccines contain a virus, a bacterium, or a disease-causing organism that has been killed or modified so that it no longer causes the disease. Recent vaccines may contain components from genetic engineering that are derived from these causal agents.

When administered to an animal, vaccines stimulate the body's immune system to produce cells and proteins (called antibodies) that fight the disease. Although the protection provided by vaccines can be diminished by poor health or a deficient diet, most vaccinated animals resist the diseases against which they have been immunized.

Against which diseases can vaccines protect my pet?

We recommend that all cats should be vaccinated against widespread, serious, or highly contagious diseases (core vaccines). These are feline panleukopenia, rhinotracheitis, and chlamydiosis. Other vaccines may be considered depending on the risks faced by certain cats.

It should be noted that many owners believe that vaccines provide 100% immunity in all cats, which is incorrect. Some vaccines will protect most cats, but others may only reduce the severity of clinical signs.

Feline Infectious Panleukopenia (parvovirus, cat distemper)

Panleukopenia is a potentially fatal viral disease that causes vomiting, diarrhea, severe dehydration, fever, and sudden death. Kittens born to an infected mother can suffer from permanent brain damage. Young cats seem more vulnerable to the parvovirus. This disease is easily prevented by vaccination, which is considered very effective.

The virus is very resistant in the environment and can remain infectious for a long time, contaminating kennels, food bowls, litter boxes, and other surfaces. Vaccination represents the only way to protect your cat, as exposure to the virus is highly probable, even for indoor cats. Humans can spread the virus into a home via shoes or hands, and boarding, shows, or travel can increase the risk of contact. Furthermore, it has now been shown that canine parvovirus subtype 2b affects cats, but the vaccine appears to protect exposed cats. An injection or intranasal drops can be used to vaccinate cats and kittens.

Feline Rhinotracheitis (herpesvirus type 1) and Calicivirus infections

These viruses are very common among our cats in Quebec. These organisms infect the respiratory tract of cats, causing discharge from the eyes and nose, sneezing, mouth ulcers, and sometimes a loss of appetite. Although the vaccine does not entirely prevent infection, it can considerably reduce its severity.

Spread usually occurs through contact between cats, aerosol particles from sneezing cats, and infected surfaces. Sometimes, caliciviruses can spread and cause arthritis or other serious consequences. In several cats, these conditions can develop during periods of stress. A cat that has already recovered may manifest symptoms and transmit the virus to other cats. Kittens at high risk can be vaccinated early against these agents, and all cats should receive vaccines against these infections. Mild clinical signs may be observed after vaccination.

Rabies

All mammals, including humans, run the risk of contracting rabies, which is almost always fatal. Infected animals can be affected by the "paralytic" form, which manifests as lethargy, weakness, and paralysis, or the "furious" form, which is characterized by abnormal aggression. In certain regions of Canada where the risk is high, vaccinating cats is mandatory.

Cats may appear friendly, approach a person, and then react violently and bite when petted. Research shows that animals carrying rabies can shed the virus (and infect people) before symptoms become evident, which is why you should never approach a stray animal! Recent data show that cats have now surpassed dogs as the most likely carriers of rabies, so be suspicious and do not handle dead, sick, or feral cats. Once people or animals contract this disease, it is fatal unless they have received an effective vaccination. Recent vaccines have a safe formulation and are specially designed for our felines. Even indoor cats should receive this vaccine, as they can escape and wild animals could enter the house without our knowledge (bats, skunks, raccoons).

Additional vaccines recommended for cats that go outdoors or into breeding environments:

Feline Leukemia Virus

This virus causes multiple conditions ranging from tumors, such as leukemia, to bone marrow destruction, and it can also cause weight loss, chronic infections, and anemia, even though some infected cats may not show symptoms for several years. Transmission occurs easily—food and water bowls, saliva, nasal discharge, mother cat, feces, urine, contact—regardless of whether kittens are exposed (particularly young kittens under 16 weeks of age), they will contract the disease!

Leukemia vaccines are used in situations where the cat lives with an infected cat, participates in shows, travels a lot, goes outdoors, or is part of a multi-cat household, such as a boarding facility or a cat shelter, where it may be exposed to cats whose status regarding the virus is unknown. Although the vaccine may not offer protection to all cats, those that go outdoors or are exposed to infected cats could benefit from vaccination. Ideally, the cat should be isolated from infected cats. All cats must be tested before starting the vaccination program.

Bordetellosis

This is a respiratory condition caused by the bacterium Bordetella bronchiseptica, which can cause numerous symptoms in cats. One can observe a cough, nasal discharge, pneumonia, ocular secretions, fever, and lethargy. It can be transmitted by dogs suffering from kennel cough caused by bordetellosis. About 30 to 50% of cats test positive for the bacterium, but only a small proportion of the animals develop the disease. The most common modes of spread are transmission through contact between cats, nasal discharge, or via aerosols. Cats in contact with affected cats in shelters, multi-cat environments, feral cats, and cats that travel represent good candidates for vaccination.

Frequently Asked Questions

How are vaccines administered?

Most vaccines are injected subcutaneously or into a muscle. Some vaccines are administered in the form of nasal drops.

Which vaccines does my cat need?

Although certain vaccines (core vaccines) are recommended for all cats, your veterinarian can help you choose those your cat needs based on the risks to which it is exposed. It is notably important to take into account the number of animals in the home, contact with other pets or wild animals, the

cat's age and health status, the travel it will undertake, and boarding accommodations. It is important to re-evaluate these needs with your veterinarian if your pet's situation changes.

How often should my cat be vaccinated?

Your veterinarian can help you establish a vaccination protocol that suits your cat's needs. In general, all kittens receive a series of vaccines during the first six months of their life, and the first booster one year later. The duration of immunity provided to cats by vaccines varies greatly between different diseases and vaccines, and it is currently the subject of intense research and debate within the veterinary profession, so current protocols could change. It appears necessary to adapt the vaccination protocol to each cat.

Regardless of the vaccination protocol chosen, the Canadian Veterinary Medical Association (CVMA) recommends an annual physical examination as a starting point for your cat's preventive care, and an examination twice a year for senior cats. Cats age much faster than humans, and a regular exam will allow your veterinarian to detect and treat diseases, such as dental conditions, diabetes, heart disorders, and kidney failure, which can manifest with age. Several breeds may be predisposed to certain health problems, even at a young age. Additionally, an annual visit gives you the opportunity to discuss other topics such as behavior, nutrition, parasite control, and the care of your pet.

Are vaccines safe?

Although vaccines must undergo safety testing before being licensed in Canada and are considered very safe, they can still cause reactions in a small number of pets. Often, cats will be lethargic or feverish for 24 to 48 hours after vaccination and may not eat. In some cats, a small, painless lump may form at the vaccine injection site and will usually disappear four weeks later. Rarely, a cat may experience facial swelling or a severe allergic reaction (anaphylaxis), accompanied by vomiting, diarrhea, breathing difficulties, and collapse. Intense facial itching can also occur. Anaphylactic reactions are rarely fatal if treated immediately and adequately.

What is a vaccine-associated sarcoma?

Since 1991, researchers and veterinarians have been discovering malignant tumors at vaccination sites in cats. Their frequency is estimated at 1 in 10,000 cats, and they are mainly associated with rabies and feline leukemia vaccines. New studies and research focus on the prevention of this reaction. Any persistent lump appearing in or under your cat's skin after vaccination should be examined by the veterinarian.

Are there alternatives to vaccination?

No. Despite the occasional risks associated with immunization, it is universally recognized that vaccination plays an important role in protecting pets. However, some owners may be reluctant to have their pets vaccinated frequently. For booster vaccines, the antibody titer can be measured by taking blood samples. Although these tests do not always provide solid proof of immunity, some clinicians use high-titer results to decide, by examining the risks, if vaccines can be administered at longer intervals than the usual annual frequency. At present, not all laboratories possess standards allowing an accurate interpretation of results, nor is it possible to verify immunity against all diseases. Community health requires vaccination as a strategy to control disease outbreaks.

What is the future of pet vaccination?

Vaccines will continue to play a very important role in protecting pets against serious diseases. New technologies may offer safer and more effective forms of protection. Additionally, vaccine companies

will continue to develop new technologies that provide safer and more effective forms of protection, as well as new vaccines against existing and emerging diseases in pets. Current research on the duration of immunity and the side effects of vaccines will help develop the best possible protection for cats in Canada. Unvaccinated cats also present a risk to the feline population by serving as a source of infection for other cats, including young kittens; it must therefore not be forgotten that vaccination does not only protect your cat !