

Safe Handling of Chemotherapy for Pet Owners

Pet owners might be concerned about potential risks from exposure to chemotherapy when their pets are receiving treatment for cancer. While specific risks to owners caring for pets with cancer are unknown and some degree of contamination of a pet's environment is expected, we do know hazards can be minimized by following the guidelines recommended below. Keep in mind, specific questions regarding your own health or that of a family member should be directed to your personal physician, as veterinarians cannot provide medical advice for humans.

WHAT ARE THE GENERAL RECOMMENDATIONS I SHOULD FOLLOW?

Owners can come into contact with chemotherapy by direct handling of drugs (e.g. administering oral medications at home) or through exposure to urine/feces/vomit from pets that previously received treatment.

The duration of excretion of chemotherapy has not been established for most drugs in veterinary medicine. Studies show detectable concentrations of drugs found in urine for days to weeks after administration, although concentrations are markedly decreased within the first 3 days. Many drugs are eliminated in the feces and may result in drug excretion for 5-7 days post administration.

General recommendations are to handle urine/feces from patients receiving intravenous chemotherapy as contaminated for 48-72 hours after administration and as long as 7 days after oral medications.

How to handle contaminated urine/feces:

Pets should be allowed to urinate and defecate outside in a separate, designated, low-traffic area, if possible. Because ultraviolet light is believed to inactivate many drugs, an area with sunshine exposure or an area that can be cleaned easily is recommended. Gloves should be worn when handling feces. Hands should be washed after handling urine and/or feces. Urine can be diluted with water from a low-flow hose or watering can. Interactions between pets and young children should be supervised, mainly to prohibit contact with urine/feces/vomit/etc. Hands should be washed after contact.

Owners who are pregnant, attempting to conceive, or breast-feeding should not handle chemotherapy drugs or be tasked with cleaning up after pets that received treatment.

Owners are encouraged to talk with their personal physician before initiating treatment to discuss any potential contact risks or specific concerns.

WHAT CAN I DO TO PROTECT MYSELF?

- If your pet receives chemotherapy at home, you should always wear chemotherapy-rated gloves when giving medications, and hands should be washed after each administration.
- Do not store your pet's medications with medications for humans, near food, or where accessible by children.
- Chemotherapy pills should not be split or crushed, capsules should not be opened, and swallowing of medications by the pet should be confirmed. Compounding of chemotherapy into liquid medications is discouraged, because of the potential for environmental contamination during administration.
- If a pet commonly spits out a pill after it has been concealed in food or a treat, the medication should be administered alone. Talk with your veterinarian/veterinary oncologist about strategies for medicating your pet.
- Empty vials or syringes should be returned to the clinic for proper disposal.
- Animals receiving chemotherapy should remain in a controlled environment and not be allowed to urinate or defecate in community areas, areas where children may be exposed, or areas that cannot be easily cleaned for at least 48 hours after drug administration. Ideally a low-traffic, sunlit area would be preferred for elimination. If urine/feces are found in the house, the area should be cleaned, and hands should be washed afterwards (see below).

WHAT DO I DO IF MY PET HAS AN ACCIDENT/VOMITS IN THE HOUSE?

- Recommendations include wearing gloves, avoiding high-pressure sprays, and using disposable towels.
- Solid items should be removed with gloved hands and double-bagged with impermeable disposable bags for household wastes.
- Liquid wastes should be blotted dry.
- The area should be cleaned with detergent and dilute bleach once all evidence of visible contamination is removed. Gauze, wipes, or paper towels should be sprayed directly, and then used to wipe the surface.
- Cat litter boxes should be cleaned daily and litter should be double-bagged and discarded with household trash.
- Any soft items (e.g., bedding, towels, toys) should be washed twice, separately from other laundry, and ideally bleached.

WHAT DO I DO IF I ACCIDENTALLY TOUCH MY PET'S URINE/FECES/VOMIT/ETC. WITHOUT GLOVES?

If inadvertent direct contact with contaminated urine or feces of a patient occurs, the skin should be rinsed with water and washed using dishwashing detergent for a minimum of 5 minutes, in accordance with recommendations for chemical exposure www.ccohs.ca/oshanswers/chemicals/firstaid.html and any additional instructions from a personal physician followed.

Adapted from the ACVIM small animal consensus statement on safe use of cytotoxic chemotherapeutics in veterinary practice (J Vet Intern Med 2018;1-10)

Medical Oncology

go.ncsu.edu/NCStateMedicalOncology | PH 919.513.6690 | FX 919.513.6669 | Email NCStateOncology@ncsu.edu
1052 William Moore Drive | Raleigh, NC 27607