

# Aggression in Cats

## Overview

### Basics

#### OVERVIEW

- Aggression can be a normal and appropriate behavior in certain situations, such as allowing the cat to protect itself, or it may be abnormal, with serious consequences for the cat's physical and emotional well-being
- “Aggressivity” describes both mood and temperamental traits that relate to the likelihood to show aggression when environmental circumstances dictate it might be used
- Numerous types of aggression have been identified in cats, including the following:
  - ◆ Play aggression (toward people)
    - Typically refers to a cat that scratches and bites the owners during play
    - *Not* true aggression; overzealous play without proper impulse control due to lack of training or proper social feedback
    - The cat's intent is not to harm the person
    - Behavior encouraged and rewarded by owners through rough play when younger (that is, a kitten); as cat grew and became stronger, overzealous play then perceived as aggression
  - ◆ Predatory aggression (toward people or other animals)
    - Cats have an innate drive to “hunt” or show predatory behavior, which induces “stalk, hide, and pounce”
    - Predatory behavior is not a direct function of hunger
    - Typically stimulated by fast movements and can progress to the cat hiding and waiting for a person or animal to walk by
    - Play is a common way for young cats to perfect hunting (predation) skills; play aggression and predatory aggression may overlap
  - ◆ Redirected aggression (toward people or other animals)
    - Cat sees, hears, or smells a trigger (triggers are situations or things to which the cat reacts, leading to aggressive behaviors) and directs aggressive behavior toward the closest innocent bystander (a person or another animal)
    - In some cases, one person or animal in the home becomes the designated victim, and the cat may bypass a nearby individual and look for the preferred victim
    - Some cats may stay aroused for 24–72 hours after a triggered event
    - A common trigger inciting redirected aggression is the cat seeing another cat or wildlife outside the home
  - ◆ Fearful or fear-induced aggression/defensive aggression (toward people or other animals)



- Cat will show body postures indicating fear and/or anxiety; cat may hiss, spit, arch the back, and hair may stand up (known as “piloerection”); turn away; run away; cower; roll on its back and paw (a defensive position and not a submissive position) if cornered
- ♦ Territorial aggression (toward people or other animals)
  - Some cats, particularly male cats, show territorial behaviors in domestic home settings due to the size and presence of more resources (such as people, food, resting areas, feeding areas, litter box areas); the territorial behavior is designed to defend the cat's domain
  - Turf may be delineated by various territorial behaviors, such as patrolling the area, chin rubbing, spraying, non-spraying marking, scratching; threats and/or fights may occur if a perceived offender enters the area
  - In severe cases, the aggressive cat may seek out other individuals (people or other animals) and attack
  - Body posture with territorial aggression is assertive and confident
- ♦ Pain aggression (toward people and animals)
  - Cats in pain may show aggression (hissing, growling, scratching, biting) when they are physically handled or prior to or after movements, such as jumping onto or off a piece of furniture
- ♦ Maternal aggression
  - May occur during the period surrounding the birth of kittens (known as the “periparturient period”)
  - Protection—mother cats (known as “queens”) may guard nesting areas and kittens by showing aggressive behaviors toward individuals approaching the kittens
- ♦ Contact-induced/petting aggression (toward people)
  - Cat shows early signs of aversion when people pet or stroke him/her; ears go back, tail swishes
  - If physical contact or petting continues, the cat typically will bite
  - Owners often miss early warning signs
  - When cats groom one another, they typically limit grooming to head area
  - Some cats do not want to be petted or stroked along their backs
- ♦ Cat-to-cat (inter-cat) aggression within a home
  - Fifty percent of cat owners report fighting (scratching and biting) after introduction of a new cat into the home
  - The number of cats, sex, and age are not significant factors in predicting which cats will show cat-to-cat aggression

## **SIGNALMENT/DESCRIPTION OF PET**

- Any breed of cat
- Some types of aggression appear at onset of social maturity (2–4 years)
- Males more likely to show aggression to other cats than females
- Abyssinian, Russian blue, Somali, Siamese, and Chinchilla breeds showed more aggression than other cat breeds
- Maine Coon, Ragdoll, and Scottish Fold breeds showed the least aggressiveness

## **SIGNS/OBSERVED CHANGES IN THE PET**

- Aggressive behavior (such as dilated pupils, staring, biting, tail swishing, hissing, and growling)
- Physical examination findings in the recipient of acute aggression are generally secondary to fighting, such as lacerations, or damage to teeth or claws
- Continuous anxiety/stress—decreased or increased grooming; anxious behavior (such as “meatloaf position” and averting gaze), chronic disease such as inflammatory bowel disease, reduced immune responses, over-grooming, and lower urinary tract conditions
- It can take up to 72 hours for an aggressive cat to go back to baseline in behavior and stress hormone levels

## **CAUSES**

- Underlying medical issues can cause aggression (e.g. pain)
- Temperament/behavior is influenced by genetics, rearing, socialization, environment in which the cat lives, and types of interactions the cat has with people and other animals

## **RISK FACTORS**

- Poor socialization

- Abuse—cat may learn aggression as a preemptive strategy to protect itself
- Administration of steroids or other medications may induce aggression or remove normal inhibition for aggressive behavior
- Underlying painful conditions

## Treatment

### HEALTH CARE

- Never use physical correction or punishment, as it may escalate the aggression
- Avoid known triggers (triggers are situations or things to which the cat reacts, leading to aggressive behaviors)
- Identify triggers and desensitize and counter-condition cat to the triggers
- Implement safety measures (for example, use of Soft Claws®, wearing long pants/long sleeves to protect people, keep flattened cardboard boxes around the home to place between the person and cat)
- Behavior modifications to redirect the cat and reduce arousal
- Train cat to respond to commands, such as “sit” or “go to” a certain place in the home
- Implement environmental enrichment for the cat
- After a high aggression incident, isolate the cat for 24 hours if the cat remains aroused

## 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 listed should not be considered as all-inclusive, some medicines will be for the aggressor, other medications for the subject of the attacks

- No drugs are approved by the federal Food and Drug Administration (FDA) for the treatment of aggression in cats; your veterinarian will discuss the risks and benefits of medical treatment
- Anti-anxiety medications that increase levels of serotonin in the central nervous system, such as tricyclic antidepressants (TCAs) and selective serotonin reuptake inhibitors (SSRIs)
- Amitriptyline (example of a TCA)
- Benzodiazepines: oxazepam (for a fearful subject of the attacks)
- Buspirone; may make some cats more assertive; thus may work well for the victim in anxiety-associated aggression
- Clomipramine (example of a TCA)
- Fluoxetine or paroxetine (example of a SSRI)
- Feliway® spray or diffusers in the home
- Natural calming agents such as Zylkene®, or SAME

## Follow-Up Care

### PATIENT MONITORING

- Owners should consult with the cat's veterinarian every 1–2 weeks for the first 2 months after a treatment plan has been recommended to evaluate response
- If the cat is receiving medications, the dose will be reevaluated every 3–4 weeks
- Frequency of follow-up will be determined by the severity of the aggressive behavior
- Blood work (including complete blood count [CBC], serum chemistry, and thyroid [T4] levels) should be obtained prior to beginning medications and 2–3 weeks after starting medication, blood work for liver and kidney tests should be obtained; thereafter, blood work should be rechecked annually in young, healthy pets and semiannually in older pets or at the interval recommended by your pet's veterinarian
- Physical examinations should be repeated semiannually in older pets as painful conditions may start to contribute to the aggressive behavior or make it worse

### PREVENTIONS AND AVOIDANCE

- Ensure appropriate socialization of kittens with people and other cats

- Avoid provocation of the cat
- Observe signs of aggression (such as tail flicking, ears flat, pupils dilated, head hunched, claws possibly unsheathed, stillness or tenseness, low growl) and safely interrupt the behavior; leave cat alone and refuse to interact until appropriate behavior is displayed
- Avoid direct physical correction or punishment; may intensify aggression
- Remember that a cat displaying aggressive or predatory behavior can bite or scratch any person or another animal—*always be careful to ensure that you do not get injured*; the best approach in some situations is to leave the cat alone in a quiet area until it calms down

## **POSSIBLE COMPLICATIONS**

- Human injuries; surrender of cat to animal control or animal shelter; euthanasia of cat

## **EXPECTED COURSE AND PROGNOSIS**

- Ultimately depends on the specific kind of aggression and the ability of the owner to carry out the suggested treatment; multiple modes of treatment are frequently required to maximize the chances of improvement
- Some types of aggression can improve or resolve within a few weeks, while other types may take several months or longer
- Some forms of aggression have a poor prognosis

## **Key Points**

- Most cases of aggression need a combination of behavioral modification, environmental modification, training, and, when necessary, medication to maximize chances of improving the cat's behavior
- Behavioral medicine is concerned with recognizing and identifying abnormal or inappropriate aggressive behavior
- Numerous types of aggression have been identified in cats