

Effect of species  
ethology on optimal  
training and  
management:  
domestic cat and d...



Title:

Discuss how an understanding of the ethology of a species can underpin their optimal training and management. And, how this knowledge can reduce the development of behavioural problems. Support your answer with reference to two domestic species of your choice.

Introduction:

The subject of this essay is to discuss how ethology of two domestic species can underpin their training and management. And, how this knowledge can reduce the development of behavioural problems. Ethology is understanding how a species has become the way they are. Understanding the ethology of an animal and its normal behavioural patterns is essential for when training an animal. Throughout this essay I will discuss how the domestic dog (*Canis familiaris*) and the domestic cat have evolved to their environment and how it effects their behaviour. The domestic dog *Canis familiaris* is a carnivore and as such a predator. The link between humans and dogs is thought to have arisen from a predatory link between the species (Willams, 2006). The dog is a member of the family Canidae, which includes such species as the wolves, coyotes and foxes. As carnivores they evolved a social structure related to the size of their prey (Willams, 2006). Darwin theorized that the wolf were the ancestors of the domestic dog. Konard Lorenzo theorized that some domestic dogs were evolved from the wolf, but majority evolved from the golden jackal (Willams 2006). Cats are social animals that, in feral conditions, live in groups consisting mainly of queens and their litters. The density of the group depends partly on food resources. Because

cats have been exposed to less selective breeding than dogs, there is far less breed diversity and a much narrower range of differences in both physical and behavioural traits (Landsberg and Denenberg, 2018). Most cats are solitary hunters that prey on rodents and other small animals, which is likely why their coexistence with people is so successful (Landsberg and Denenberg, 2018).

I will discuss the subject of this essay under the following headings

1. Socialisation and habituation
2. The normal behaviour of the wild dog
3. The normal behaviour of the wild cat
4. Behavioural development
5. Behavioural problems and prevention

#### Main Body:

##### *Socialisation and habituation:*

The most sensitive period of behavioural development in terms of socialisation and habituation is from 2 to 7 weeks in the kitten and 4 to 14 weeks in the puppy (Bowen and Heath, 2005). “ It is important to understand that this is a sensitive period rather than a critical one and therefore preferences can be formed and altered outside of these boundaries, but receptivity to socialisation and habituation is at its maximum at this stage of development and it is therefore advisable to take advantage of this biological window of opportunity” (Bowen and Heath, 2005).

The current literature and common consensus among dog behaviour experts are the lack of appropriate socialization during the sensitive period, along with lack of appropriate ongoing socialization during the dog's life plays a large role in whether the dog develops behavioural problems (Howell *et al.* 2015). Lack of appropriate early socialization to a range of people and other animals, as well as different environments, can result in adult dogs that exhibit problematic behaviours, such as undesirable aggression and fearfulness (Howell *et al.* 2015). In one study, social and environmental exposure administered to puppies was found to be positively correlated with measures of sociability, and negatively correlated with measures of fear and aggression. Socialization with other animal species was negatively associated with inappropriate predatory behaviour, and dogs that attended puppy preschool were found to be less fearful, less aggressive, and more social (Howell *et al.* 2015).

Kittens and puppies need to be introduced to a wide range of people and other animals during their socialisation period. In the case of kittens, it has been shown that introduction to at least four different people is needed before the kitten accepts human company, and it is recommended that these people represent a range of ages, sexes and appearances in order to maximise the beneficial effects of the socialisation process (Bowen and Heath, 2005). For the domestic cat, the aim is for them to be able to have a mutually beneficial relationship with their owners and to be able to cope with the normal range of human visitors to the home and interact with them without fear. When socialising puppies, it is important to remember that dogs need to cope not only with the family and their visitors but also with

delivery people who approach the home and with the vast range of human appearances that they may encounter when they are taken away from the home for exercise (Bowen and Heath, 2005). It is therefore important to pay attention to varying appearances when implementing socialisation programmes for puppies and to include people with beards, glasses, walking sticks and people in wheelchairs (Bowen and Heath, 2005).

*Normal behaviour and traits of the wild dog:*

The wolf is the largest and the most social of all canids. Characteristically, wolves live in a pack of related individuals but, in common with most canids, they display significant flexibility in their social organisation depending upon the availability of food (Bowen and Heath, 2005). Under normal circumstances only one male and one female within the pack breed at one time and these individuals are referred to as the 'alpha' or top-ranking pair. Their role is to ensure the continuation of the pack through breeding and in order to achieve this, they provide leadership for the group, control access to shared resources and suppress breeding in other pack members (Bowen and Heath, 2005). The remaining lower-ranking members of the pack assist in the rearing of young and all members of the group cooperate in hunting in order to increase the size and range of prey that can be caught. Individuals only remain associated with the pack if it is advantageous to them (Bowen and Heath, 2005). The nature of aggression within the pack reflects this fact and the alpha female is very aggressive towards other females during the mating season. Studies have shown that through persistent attacks they will cause the cubs being carried by a lower-ranking female in the group to be miscarried. The alpha male, contrastingly, is most aggressive towards

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strangers that attempt to associate with the pack and this is presumably to ensure that no other unrelated wolf sires cubs that he will then help to raise (Bowen and Heath, 2005). Interestingly, the lower-ranking members of the group tend to be sociable to other wolves, both inside and outside the pack, and to demonstrate an inherent need for social interaction (Bowen and Heath, 2005).

*Normal behaviours and traits of the wild cat:*

Feline society is matriarchal in nature, with related females living together in highly cooperative groups, sharing the rearing of each other's offspring and defending each other from potential intruders (Bowen and Heath, 2005). For a society to function it is necessary for interactive behaviour patterns to signal group identity and structure and in many species, including dog and man, these patterns are related to hierarchical organisation within which an individual's position can be determined by observation of its interactions with other members of its group (Bowen and Heath, 2005). Some of the most significant of these patterns are those indicating submission but within the feline world no such pattern has been identified and their reaction to hostile interactions is one of defence rather than submission. Without the presence of a hierarchical framework, the stability of social groups relies on the presence of cooperative behaviours and in the case of feline society, it appears that the affiliative social behaviours of allogrooming and allorubbing hold the key to social harmony (Bowen and Heath, 2005). These mutual behaviours appear to be important in confirming the social relationship between individuals and in establishing and maintaining a common scent profile within the social group (Bowen and Heath, 2005).

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*Behavioural development:*

There are five phases of development in canine behaviour:

1. Neonatal period

- First 2 weeks of life
- Completely dependent on mother
- Sleep and feed
- Vocalization skills may vary between breeds (Willams, 2006)

2. Transitional period

- 2-3 weeks old
- Period of rapid development
- Starting to gain independence from the dam
- Development of the neurological system and sense organs
- Eyes and ears open, which result in the pup beginning to respond to stimuli (Willams, 2006).

3. Social period

- 3-10 weeks
- This phase corresponds to maturation of the spinal cord and central nervous system
- Play is initiated, and early manifestations of adult behaviour are observed, e. g. biting, barking sexual behaviour (Willams, 2006).

4. Juvenile period

- From 10 weeks until sexual maturity

- Basic behaviour patterns remain but undergo improvement as the pup's motor skills mature
- Males begin the adult male urination pattern as they use olfactory marking to establish their own territory (Willams, 2006).

## 5. Adulthood

- Puberty and sexual maturity are reached
- Animals are continuing to learn about their environment
- Different breeds will show different rates of learning and different behaviour patterns (Willams, 2006).

The cat has a less structured behavioural development pattern than the dog.

The same stages are apparent but are less developed:

1. Neonatal period
2. Transitional period
3. Socialization period
4. Juvenile period (Shepherd, 2015).

Cats may be behaviourally categorized as active, playful and aggressive, calm and sociable, or timid and shy (Landsberg and Denenberg, 2018). Social play, including biting, chasing, play fighting, begins at around week four, peaks at week 6-9 and declines at weeks 12-14. Object play begins at weeks 6-8 and peaks at 18 weeks of age. Object play stimulates the predatory sequence and includes stalking, chasing, pawing and biting (Landsberg and Denenberg, 2018).

*Behavioural problems and prevention:*



Scratching or clawing is a normal part of the behavioural repertoire of the domestic cat, but where it occurs inside the house on items of furniture, owners can perceive the behaviour a problem (Casey, 2015). Scratching behaviour, whether it occurs in an 'appropriate' or 'inappropriate' location from a human perspective, is considered to have two functions for cats. The behaviour may originate as a mechanism to maintain the claws for predation, or as a mechanism for providing an olfactory and visual communicative signal (Casey, 2015). In both cases, scratching has an important function for cats and they are highly motivated to display the behaviour (Casey, 2015).

Prevention of scratching as a signalling behaviour can be achieved through reducing the risk of anxiety about cats in other social groups, for example by enabling the creation of safe core areas and access to important resources (Casey, 2015). Owners should also be advised not to respond when cats scratch on inappropriate surfaces, to avoid the possibility of reinforcing the behaviour or causing anxiety in the cat. If inappropriate scratching does occur, immediate redirection by preventing access to the inappropriate surface and providing easy access to a suitable surface will generally prevent further recurrence (Casey, 2015).

As a dog grows larger, or when it is muddy, jumping up is no longer acceptable. Commonly recommended strategies such as kneeling, pushing or shouting often result in increased enthusiasm on the part of the dog (Lindell, 2015). Many dogs behave as though physical intervention is a form of play.

When an owner complains that a dog is jumping up on visitors, it is

important to be sure that the behaviour represents excitement rather than a

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negative emotional response such as fear or aggression. Separation-related anxiety should be ruled out if the history suggests that jumping on family members is part of an exaggerated greeting (Lindell, 2015).

Immediate resolution of jumping up can often be accomplished through lead restraint. If the dog is wearing a buckle collar or standard harness, just enough tension should be applied to stop the dog's upward motion. Counter commanding is also a very good technique to hopefully prevent and stop the dog from jumping on humans. This technique involves asking the dog to perform a behaviour that is incompatible with jumping up (Lindell, 2015). For example, the dog could be asked to 'sit' before it is petted. During greetings, a clearly visible treat or toy can be held in front of the dog to attract its attention and improve its response to the 'sit' command. The reward is given as soon as the dog sits (Lindell, 2015).

### Conclusion:

Since domestication involves genetic modification of a population of animals, we would expect domestic animals to differ in several traits from their wild ancestors. Typical changes in colour, shape, size and function may lead us to expect that there will be pronounced behavioural differences as well.

However, research has found more subtle differences between domestic and wild animals. No new behaviour methods seem to be added to the behaviour repertoire of any domestic species. Evolution and the adaptations of the cat and dogs' ancestors, and the natural behaviour of these present-day animals, are the essential pieces of information we need to keep to understand the domestic cat and dog.

References:

1. Bowen, J. and Heath, S. (2005). An overview of canine social behaviour and communication. In: *Behaviour problems in small animals* . London: Elsevier Health Sciences. Page 23-25.
2. Bowen, J. and Heath, S. (2005). An overview of feline social behaviour and communication. In: *Behaviour problems in small animals* . London: Elsevier Health Sciences. Page 29-31.
3. Bowen, J. and Heath, S. (2005). Canine aggression problems. In: *Behaviour problems in small animals* . London: Elsevier Health Sciences. Page 117-120.
4. Casey, R. (2015). Management problems in cats. Editors: Horwitz, D. and Mills, D. *BSAVA Manual of Canine and Feline Behavioural Medicine*. 2nd ed. Gloucester: British Small Animal Association. Page 100-102.
5. Howell, T., King, T. and Bennett, P. (2015). Puppy parties and beyond: the role of early age socialization practices on adult dog behaviour. *Veterinary Medicine: Research and Reports* . 6 (3), Page 143-153.
6. Landsberg, G. and Denenberg, S. (2018). *Social Behaviour of cats*. Available: <https://www.msdtvetmanual.com/behavior/normal-social-behavior-and-behavioral-problems-of-domestic-animals/social-behavior-of-cats>. Last accessed 29th November 2018.
7. Landsberg, G. and Denenberg, S. (2018). *Social Behaviour of dogs*. Available: <https://www.msdtvetmanual.com/behavior/normal-social-behavior-and-behavioral-problems-of-domestic-animals/social-behavior-of-dogs>. Last accessed 29th November 2018.

8. Lindell, E. (2015). Management problems in dogs. Editors: Horwitz, D. and Mills, D. *BSAVA Manual of Canine and Feline Behavioural Medicine*. 2nd ed. Gloucester: British Small Animal Association. Page 87-88.
9. Shepherd, K. (2015). Canine behaviour and training. Editors: Lane, D. Cooper, B. and Turner, L. *BSAVA Textbook of Veterinary Nursing* . 5th ed. Gloucester: British Small Animal Association. Page 257.
10. Willams, J. (2006). Behaviour and handling of the cat and dog. Editor: Aspinall, V. *The Complete Textbook of Veterinary Nursing* . London: Elsevier Limited. Page 243-250.

### Bibliographies

1. Palmer, R. and Custance, D. (2008). A counterbalanced version of Ainsworth's Strange Situation Procedure reveals secure-base effect in dog-human relationships. *Science Direct* . 109 (4), Page 306-319.
2. Rooney, N., Bradshaw, J. and Robinson, I. (2000). A comparison of dog-dog and dog-human play behaviour. *Science Direct* . 66 (3), Page 235-248.