For Cat Lovers (Ailurophiles):

How Will Lions Eat Straw Like the Ox?

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One of the most common criticisms of the theory of special creation is the fact that nature is "red in tooth and claw." Surely, it is reasoned, a benevolent Creator would not design creatures that lived by tormenting and devouring each other. Why is the natural economy one of destruction, in which animals prey on each other?

From the young-earth Biblical perspective, of course, carnivory, or destructive predator-prey relationships, came to be as a consequence of the Fall. When nature is reformed at the return of God to His creation, to walk among His creatures that is, when "the dwelling of God is [once again] among men" (Rev. 21:3) as it was in the original creation carnivory will be no more. The lion will eat straw like the ox (Isa. 11:7, 9; 65:25). More generally, as Isaiah writes, "They will not hurt or destroy in all My holy mountain, For the earth will be full of the knowledge of the Lord, As the waters cover the sea" (v. 25).

Some Christians have objected to this straightforward account in Scripture, asserting that, if it were taken to apply to the actual biological world, God would have to remake the lion or other carnivores so completely that they would be unrecognizably different animals. Thus, they interpret these (and other) passages figuratively, looking for some sense which does not require what they take to be the "complete redesign" of certain organisms.

While of course only God Himself knows the full outlines of His new creation, we might wonder whether carnivorous animals really need to be redesigned in toto. First, many meat-eating

animals can be switched, just as they are in their present form, to a strictly vegetarian diet. For instance, some dogs have subsisted almost entirely on a diet of coconut meat, sweet potato, and boiled bananas (Crandall 1964, p. 275).

Even felids (cats) are not as strictly carnivorous as is commonly believed. Van der Pijl (1982, p. 54) has compiled numerous cases of feline herbivory, or plant-eating, such as jaguars and wild cats eating avocado, and civet cats eating all kinds of fruit. One well-known creationist (John Woodmorappe) reports that his Siamese cat, Neil, enjoyed mango and papaya, greedily eating them whenever he provided the fruits.

Nevertheless, it is felt that the cats are such specialized and obligatory carnivores that it is unimaginable that they could be entirely vegetarian, at least without massive miraculous changes in their anatomy and physiology. However, a fascinating experiment described by Wyrwicka (1981, pp. 38-41) indicates that a minor "rewiring" of the brain may be all that will be needed to convert a cat from a carnivore to an herbivore.

In the experiment, a female cat was wired with electrodes to stimulate her hypothalamus (a part of the brain) upon the application of an electric current. The electric current was applied so that, when the cat ate cereal, she experienced pleasure.

After a time, the cat gave birth to kittens. Remarkably, upon their weaning, she taught them to eat cereal. Even a few months after their removal from their mother, the kittens--contrary to their supposedly innate carnivorous nature--would usually eat cereal even when given a choice between cereal and meat pellets. As Wyrwicka (1981, p. 41) notes,

As a result of the presence of these factors, a striking phenomena was obtained: cats, essentially carnivorous animals, ate entirely vegetable food and preferred it to animal food.

It is noteworthy that such a crude procedure as electrical stimulation of the hypothalamus at appropriate times should be sufficient to reverse an apparently instinctive, "hard-wired" trait like carnivory. Investigating this sort of behavioral plasticity is an open field for creationist research.

Even the actual biting attacks of cats, interestingly, may be easily reversible. Berntson and Leibowitz (1973) have demonstrated that predatory biting behavior in both rats and cats is under cholinergic control, with biting attacks induced either by electrical stimulation of the hypothalamus, or the injection of cholinergic chemicals. This suggests that a simple rewiring of the brain could eliminate predatory behavior in carnivorous animals, along with the desire for meat discussed earlier. Although much more research is obviously needed, it is interesting to speculate how carnivory may be reversed in the new natural economy to be established by God. A complete physiological "makeover" of carnivores, such as cats, appears to be unnecessary.

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