## The Outside Story



## Fisher Families Fall Out In Fall By: Carolyn Lorié

Along with the crisp mornings and crimson colors that signal summer's slide into fall, there are changes occurring in the forests that go mostly unnoticed. Among them is the dispersal of fisher kits from their mother's territory into their own. Little is known about the process of fisher families breaking apart, except that it generally starts in late summer or early autumn and unfolds gradually.

What is known is that fishers (*Martes pennanti*) are born in March, blind, helpless, and dependent on their mothers. It takes nearly three weeks for fisher kits to grow fur and nearly two months for their eyes to open. Despite the burden of caring for her helpless kits, the mother will wander off for short periods within a week or two of giving birth in search of new mates.

From late March through April, the female will mate with several males – ovulation is induced by copulation – and then carry the fertilized zygotes-turned-blastocysts for the next 10 or 11 months. The change of day length in late winter acts as a trigger for the embryos to implant in the uterus. Thus the female is technically pregnant for all but maybe 10 days of the year, even though her active pregnancy is only around 50 days.

Males do not play a direct role in the rearing of the young, but they do allow adult females to overlap onto their territory, said Chris Bernier, Furbearer Proiect Leader for the Vermont Department of Fish and Wildlife. This sharing of space can have a positive effect on litters. "Because males exclude other adult males from their territory, but not adult females, the foraging opportunities for the females [are increased], and hence, their kits' survival is likely enhanced," said Bernier.

Young fishers spend the spring and summer under their mother's care, learning to hunt and forage. They are primarily carnivorous, eating a variety of animals, including mice, moles, snowshoe hares, and woodchucks. Fishers are one of the few animals to successfully prey on porcupines.

Sometime in late summer or early autumn, the family dynamic starts to shift. "During this period, kits and their mothers start to squabble," said Roger Powell, a professor of applied ecology at North Carolina State University and author of a book on fishers. "They stop

sharing resting sites and start doing more foraging on their own."

Exactly how the squabbling, known as inter-familial aggression, starts and what it looks like is not well understood. Rebecca Green, a doctoral student studying fishers at the University of California, Davis said that photos taken with remote cameras suggest that the fighting may occur more often between kits, as opposed to between a mother and her kits. While the interactions are "rough and tumble," they don't seem to be overly aggressive. "It looks largely playful and is probably good practice for interacting with other fishers and prey," said Green.

Bernier, however, noted that studies done on fishers taken by trappers in the fall show that adult females and juveniles of both sexes tend to have more injuries than adult males. This suggests that interfamilial aggression may include mothers. Bernier agreed with Green that the dynamic is not well documented, and noted that he has never observed it firsthand.

The size of fisher territories can vary, depending, in part, on the abundance of food. Females tend to have smaller territories, around five square miles on average, while males may occupy a space twice that size. According to Powell, most kits travel less than 12 miles before finding a space unclaimed by another fisher, though some have been known to travel up to 30 miles before settling down.

While the distances traveled and the particulars of inter-familial aggression

may vary, the results do not. By the time autumn winds down, fisher kits have struck out on their own and are no longer under the protective watch of their mothers.

A gallery exhibit featuring Outside Story illustrations and articles is open through November29 at the Montshire Museum in Norwich, VT. Carolyn Lorié lives with her rescue dog and very large cat in Thetford, Vermont. The illustration for this column was drawn by Adelaide Tyrol. The Outside Story is assigned and edited by Northern Woodlands magazine and sponsored by the Wellborn Ecology Fund of New Hampshire Charitable Foundation: wellborn@nhcf.org



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