# Gray Squirrels and Fox Squirrels

## *Natural History*

Gray Squirrels are likely to be found in urban, suburban and forested areas. Fox Squirrels prefer open areas, farm fields and river bottoms. Both species use nest boxes year round. Squirrels will nest in natural cavities, but they also create leaf nests called "dreys."

## *Nesting Habitat*

Squirrels use nest boxes in backyards, wood lots and farm groves.

## *Box Location*

Hang boxes on trees that are 10+" in diameter in areas with hardwood mast trees nearby, such as oaks, hickories or other nut-producing trees.

## *Box Installation*

Place boxes at least 18'-30' above ground on tree trunks which are least 10+" in diameter. Face the box entrance towards the east or south, downwind from prevailing winter winds. Attach the box to a tree with lag screws, and remember to loosen the screws a little bit each year as the tree grows. Wiring the box to the tree is not advised as it can girdle and kill the tree. Up to six nest boxes can be placed per acre depending on the quantity of mast nuts available.

Fill the nest box half full with dry leaves or straw.

## *Nest Box Dimensions*

The 3" diameter entrance hole should be placed on the side of box that is next to the trunk for easy access by the squirrel.

## *Modifications*

Instead of a wooden floor, the US Army Corp of Engineers Wildlife Resource Management Manual recommends a 1/2" by 1/2" (14 gauge) hardware cloth floor for drainage, and the box filled half way with dry leaves.

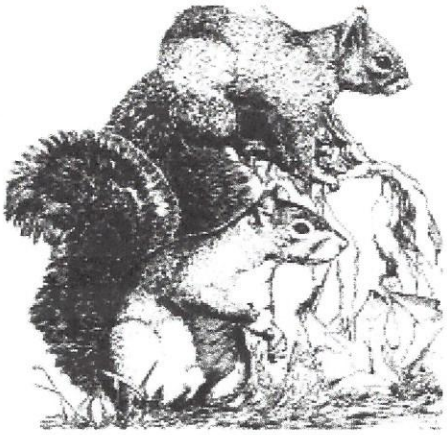
## *Notes*

Both wooden and tire "nest boxes" have been used by both Fox and Gray Squirrels. Nest boxes are heavily used in winter, so the best time to install a new box is in the fall.

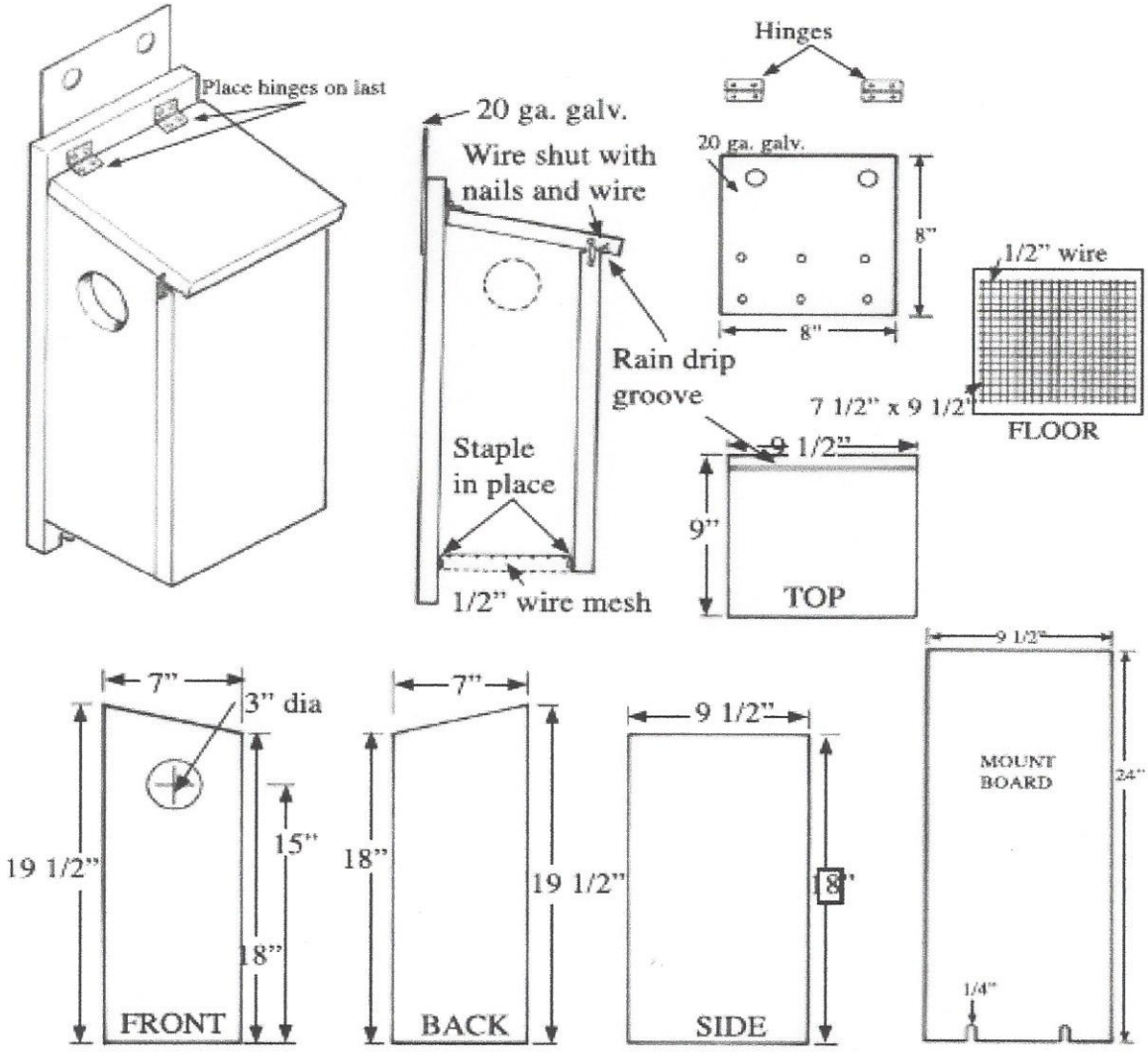
## *Primary Sources*

http://www.antler-ridge.com/pdf/squirrel_boxes.pdf
US Army Corp of Engineers Wildlife Resource Management Manual, Technical Report EL-86-11 Squirrel Nest Box Section 5.1.1

# GRAY AND FOX SQUIRREL NEST BOX



The squirrel house should be placed at least 30 feet above the ground in a tree at least 10 inches in diameter. The entrance hole should face either east or south, away from prevailing winter winds. The box can be made more enticing to squirrels by half-filling it with dry leaves. Attach the box to the tree with two lag screws and washers, and loosen the screws each year to allow for tree growth. Boxes should be set out in the fall, since the heaviest use is in winter. Three or more boxes per acre will maintain a maximum squirrel population. Boxes should be placed only in forests with nut-producing trees less than 60 years old.

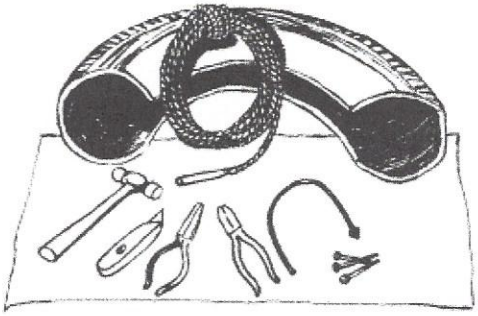



Source Ohio Division of Wildlife Publication 419 (406)
http://forestandrange.org/new_wetlands/pdfs/Ohio_DNR_nest_plans.pdf

## Tire Home

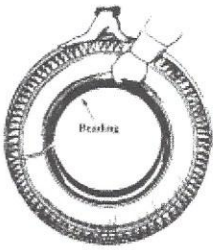
To make a tire squirrel den, you need the following:

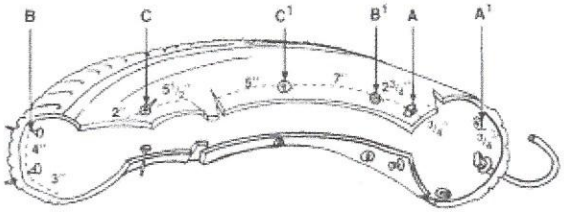
- half of a tire
- 75 feet of rope with metal tubing pinched to one end
- hammer
- cutting tool
- pliers
- wire cutters
- wire support loop
- nails and washers (or bolts and wing nuts)

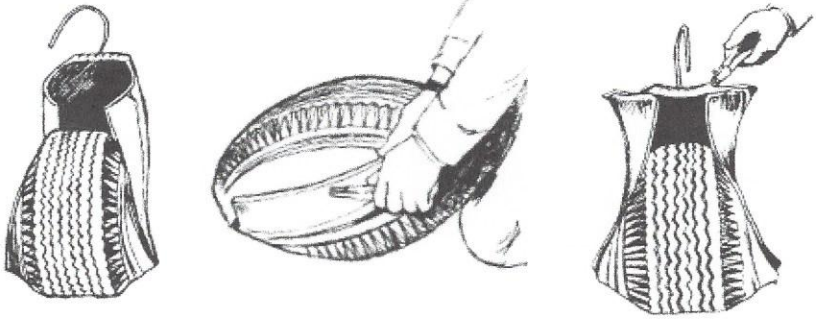


Follow these steps to make a squirrel den:

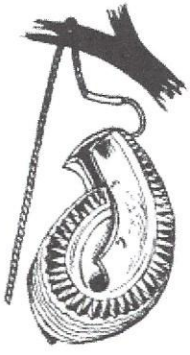
1. Remove the beading and cut the tire in half.
2. On each tire half, make cuts in the wall on each side. Your cuts do not need to be exactly as shown here; squirrels will still use the den.
3. Cut the holes so that the appropriate pairs match. Holes A, B, and C hold the nails or bolts that are then inserted in holes $A^1$, $B^1$, and $C^1$. All holes are punched a half-inch from the margins, except hole C, which is 2 inches from the end of the tire.
4. Bend the shorter end up and inside the longer one to form the nest opening. Insert the heavy wire loop to fit over the branch.
5. Fasten in three places on each side with 2-inch galvanized nails and washers and wing nuts.

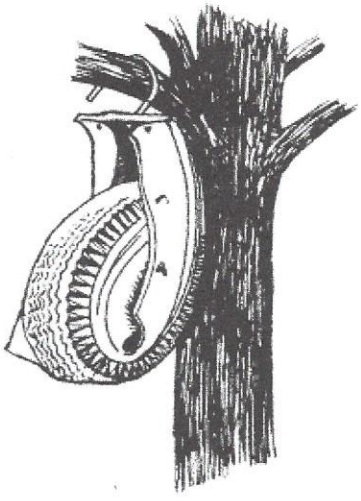




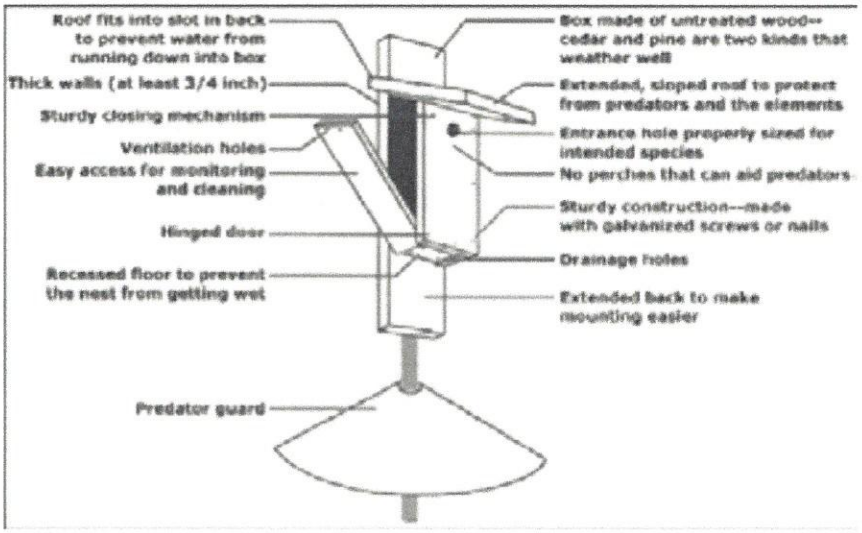
6. Drill 8 to 10 holes in the bottom of the tire den for adequate water drainage.
7. Insert the U-shaped support wire into the metal tube fixed to one end of the rope. Throw the free end of the rope over the selected branch and pull the tire up to the branch. The U-shaped support wire slips over the branch. Shake the rope free of the wire tire support.
8. **The den is now ready for a squirrel!**





# General Hints for All Nest Boxes

**Local habitat** is the primary factor determining which animals will utilize backyard nest boxes. Nest boxes can be substitute homes for cavity dwelling species that typically build their nests in tree trunks- like woodpeckers, squirrels, raccoons, some songbirds, and owls.




**Materials:** Nest boxes of untreated and unpainted wood are more attractive to birds and mammals and less toxic. Cedar, cypress, redwood, or pine are good choices. Nails, woodscrews and hinges must be rustproof. Painting boxes decreases the camouflage of the box, drawing in predators.

**Perches:** Perches on songbird houses create problems for our native species. Perches make it easier for predators to enter the box. Only non-native species of birds use perches, so boxes without perches are preferred.

**Ease of exit:** By adding rough or grooved interior walls to the nest box, fledglings and young animals can exit more easily when it is time.

**Warm nest:** By using lumber that is at least 3/4 of an inch thick, you provide insulation for young mammals and birds. Box should open from the side or top for maintenance and cleaning.

**Dry nest:** The interior of a nest box needs to be dry in order to keep young animals warm. A slightly slanted roof that overhangs the entrance hole keeps rain from entering the box. By constructing boxes with the floor recessed at least 1/4 inch up into the walls, water will not seep into the box floor. Drainage holes drilled in the floor allow animal waste and any other moisture to drain from the box. By cleaning out the box every year in fall, you prevent the bottom from rotting.

**Critical nest box features:** Make sure that your box incorporates features preferred by the particular species you hope to attract. These features include the double thick entrance hole size and extended roof to deter predators like squirrels. The height at which the box is posted, and the type of habitat surrounding the box need to need to match the desired species. Invest in a functional, rather than ornamental, nest box.

**Tree care:** Aluminum nails and screws are less damaging to trees when installing boxes on trees. Wiring boxes to trees can girdle and kill the tree.

***Other nest box plans are available from***:

1) Cornell Lab of Ornithology's website http:/ /nestwatch.org/ or http:/ /allaboutbirds.org.
2) http://www.wildlifehc.org/new/wp-content/uploads/2010/10/Artificial-Nesting-Structures.pdf
3) http://wdfw.wa.gov/living/projects/index.html
4) http://www.tnwatchablewildlife.org/woodworkingforwildlife.cfm
5) http://www.csu.edu/cerc/researchreports/documents/WoodProjectsforIllinoisWildlife.pdf