



Arborpolitan's Bat Box Basics

Bat Box Specs: Our boxes measure (31" H) x (18" W) x (6" D) and, as bats prefer warmer houses, are painted black to retain as much solar heat as possible.

Ideal Location:

Per the *Bat House Builder's Handbook* (2022):

*In areas where high temperatures in July average 80° F or less, houses should be black and **receive at least 10 hours of daily sun**; more may be better. Even in areas where high temperatures in July average less than 100° F, houses of appropriate color should receive **at least six hours of direct sun daily**.*

Too little sun exposure can be the most important cause of bat house failure!

Boxes mounted in warmer locations have a greater range of internal temperature variations available for roosting. Likewise, boxes should be located 20 - 30 feet from tree branches or other obstacles and 12 - 20 feet above ground.

Bats find houses mounted on poles or buildings in less than half the time they typically need to find houses mounted on trees!

These houses offer better protection from both climate and predators, as well as benefit from increased temperature regulation.

Likewise, houses located nearest an area's largest water source are typically the most successful, as are those in or adjacent to the most diverse or natural vegetation; though these natural *bat-flyways* may be conspicuously absent from your neighborhood, there is still a good chance a population is nearby!

We have much to learn about the needs of individual bat species in some areas (including yours!) and providing a suitable habitat is a crucial step in assimilating their populations into the ecosystem. In some cases, it may be advisable to install multiple boxes at once in order to better appreciate and serve the needs and preferences of the nearby population.

Bat-Friendly Gardens: Fragrant flowers, herbs, and night-blooming plants attract a variety of nighttime insects and can expand range and enhance bat habitats. Try planting natives such as Goldenrod, Mountain Mint, Evening Primrose, Wild Red Raspberry, or Coral Honeysuckle. Pale-colored blooms also have a good chance of bringing in bugs and thereby attracting bats.

Bat Behavior: Each fall, as temperatures drop and insect numbers decline, bats respond by either hibernating or migrating. Come spring, generally around mid-April, they begin to return from their wintering sites. Successful bat houses usually attract their first bats the summer after installation, so boxes put up in fall or winter are likely to sit empty until the following summer. Nursery colonies often begin with just one or a few individuals in the first season, then expand their numbers over the next several years.

When bats move in, monitor their behavior to see which box or pair of boxes they prefer during temperature extremes through a daily or seasonal cycle. Abandoned or uninhabited boxes will provide important clues to their needs, enabling you and neighbors to enjoy improved success with future boxes!

Box Maintenance should not be needed for the first several years, though any leaks that develop must be repaired, and recaulking and painting may be necessary eventually. All repairs should take place when the bats are not present.

Paper wasps rarely build nests in the space available within the boxes, though if they begin to build a nest at the entrance, a blast from the garden hose should do the trick!



References: Tuttle, M. D., Kiser, M., & Kiser, S. (2022, October 13). *The Bat House Builder's Handbook*. Bat Week. Retrieved November 18, 2022, from <https://batweek.org>