

Photo from the Daily Mail: Straw-coloured bats flock together during migration in Kasanka National Park in Zambia, Africa.



Bats are the only mammals that can fly and the second-largest group of mammals (after rodents), with 1,240 species of bats known.

They can be very small, from just a little bigger than an inch long, to having a 5 foot 7 inch wingspan.

Although some bats, like the vampire bat, do feed on blood, about 70% of bats actually eat insects, and most of the rest eat fruit.

This is the reason why almost all bats either migrate or hibernate during the winter. They cannot get enough food otherwise, because fruit doesn't grow in the winter and insects hibernate or go inside to places that are warm. So in order to survive, the bat either moves to a place that is warmer where they can get food, or hibernates to reduce how much food it needs.

Some bat species don't hibernate or migrate, but that's because they live in places that are a little warmer and where food is there for them all year round.

Some species both migrate and hibernate, moving to a warmer part of their territory first and then hibernating for the winter afterward.

The bats that hibernate usually live in caves and hibernate there, and the ones that live in trees usually migrate because there isn't enough protection in the trees for them, and they can be seen by predators and are exposed to bad weather.

There are nine species of bats in Pennsylvania. They are:

- Big Brown Bat (hibernates)
- Tri-Colored Bat (hibernates; they are slow flyers so it would be hard for them to migrate)
- Hoary Bat (migrates; only lives in Pennsylvania in the summer)
- Indiana Bat (hibernates in clusters of about 250 bats per square foot)
- Little Brown Bat (hibernates; Pennsylvania's most common bat, returns to the same hibernation spot every year)
- Northern Long Ear Bat (probably hibernates; little known about)
- Eastern Red Bat (migrates; flies south in September or October)
- Silver-Haired Bat (migrate and hibernate; flies south from Pennsylvania and then hibernates)
- Small-Footed Bat (hibernates in small crevices, alone or in small groups)

Bats are important in the ecosystem because they pollinate flowers and spread fruit seeds, as well as controlling the insect population. Some bats can eat 2,000 to 6,000 insects a night. (They are nocturnal, active at night.)

When bats migrate, they have a bigger risk of predators, as well as accidents like running into buildings or people. Normally bats can live about 10 to 20 years, but the oldest bat known lived to be 41.

One large risk to the bats of the eastern United States and Canada is White Nose Syndrome, which is caused by a fungus and which has led to the death of millions of bats.

Almost 50 percent of bat species are threatened or endangered.

## Sources

- Pennsylvania Bat Species, <u>http://www.batmanagement.com/Batcentral/batspecs.html</u>
- Bat Wikipedia, <u>https://en.wikipedia.org/wiki/Bat</u>
- Bat Migration, <a href="http://batconservation.org/learn/natural-history/">http://batconservation.org/learn/natural-history/</a>
- Fun Facts about Bats, <a href="https://youtu.be/b3w9ZbRQlek">https://youtu.be/b3w9ZbRQlek</a>
- Bats: Guardians of the Night, <u>https://youtu.be/P\_tykwBvqZ0</u>