

White-tailed Deer

Biology and Adaptations

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Whitetail Basics

- Cervidae Family - Cervids
 - Includes elk, moose, caribou, and mule deer
 - Split hooved
 - Adult males grow and shed antlers
 - No front incisors on upper jaw



White-tailed deer are the most widely distributed large animal in North America.

White-tailed deer range





White-tailed deer: *Odocoileus virginianus*

Buck
130-220 Pounds

Doe
90-130 Pounds



Named for the white hairs on the underside of its tail.

When startled by danger and fleeing an area whitetails “flag” their tails as a warning signal.

The whitetails coat is reddish brown in summer and turns to a gray brown in fall and winter.

Summer Coat



Kenneth M. Gale, , Bugwood.org

Winter Coat



Scott Bauer, USDA Agricultural Research Service, Bugwood.org

A fawn's spotted coat serves as camouflage. The spots imitate sunlight hitting the forest floor.



Most fawns are born during May and June.
In good habitat, does generally have twins.



A whitetail's keen senses of **smell**, **vision**, and **hearing** help them detect danger from predators.

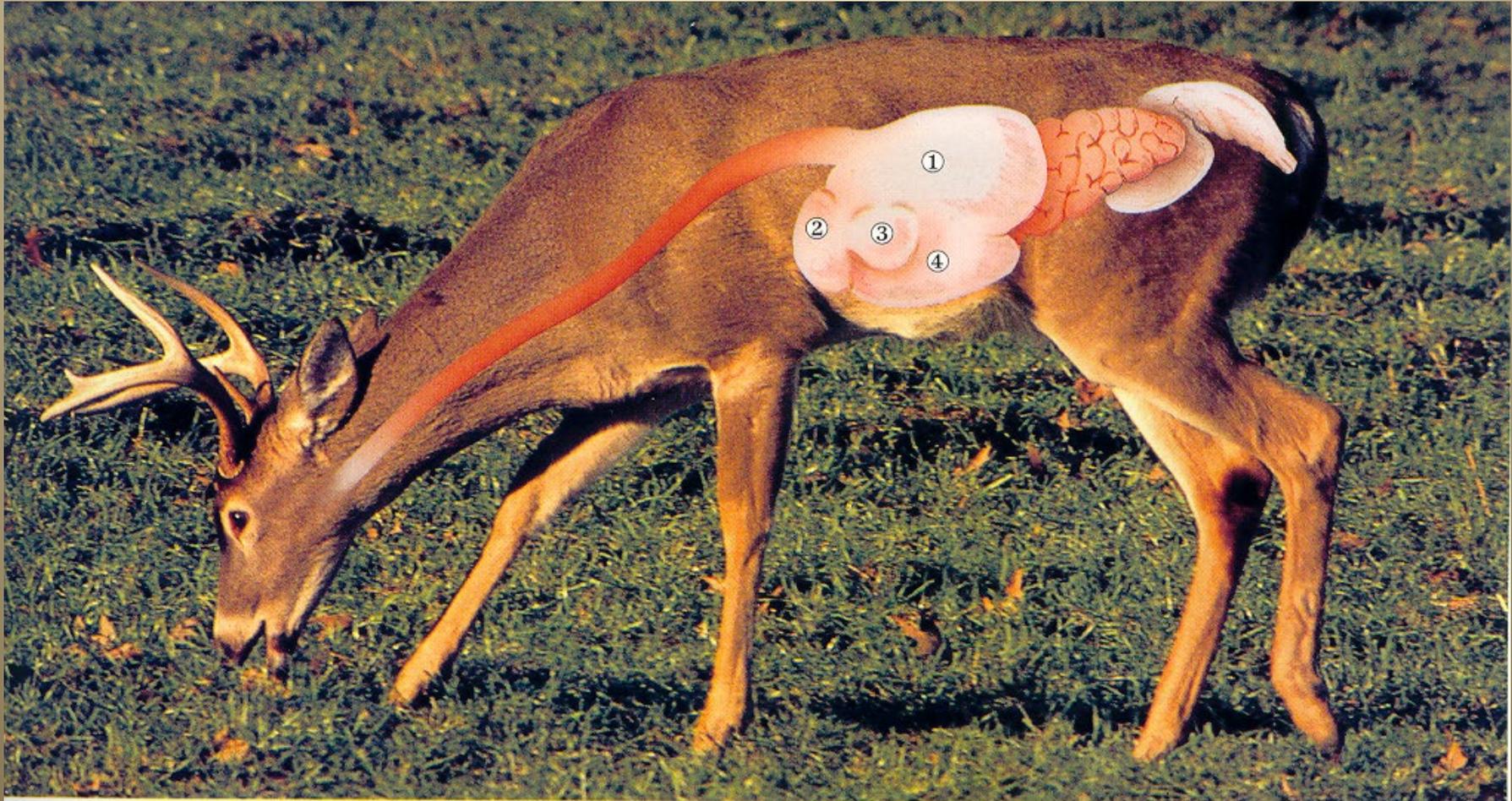


Whitetails can run and bound through dense vegetation at 40 miles per hour.





White-tailed deer, like cows, are ruminants or “cud” chewers. They have a 4 chambered stomach. The first chamber, called the *rumen*, stores food which is later regurgitated, chewed, and swallowed.



Deer are predominantly browsers feeding on leaves, buds, and twigs. An average adult deer requires 4-8 pounds of forage per day.



In heavily hunted areas deer rarely live past 3 years of age. Where hunting pressure is light deer may live to be 10 years of age.

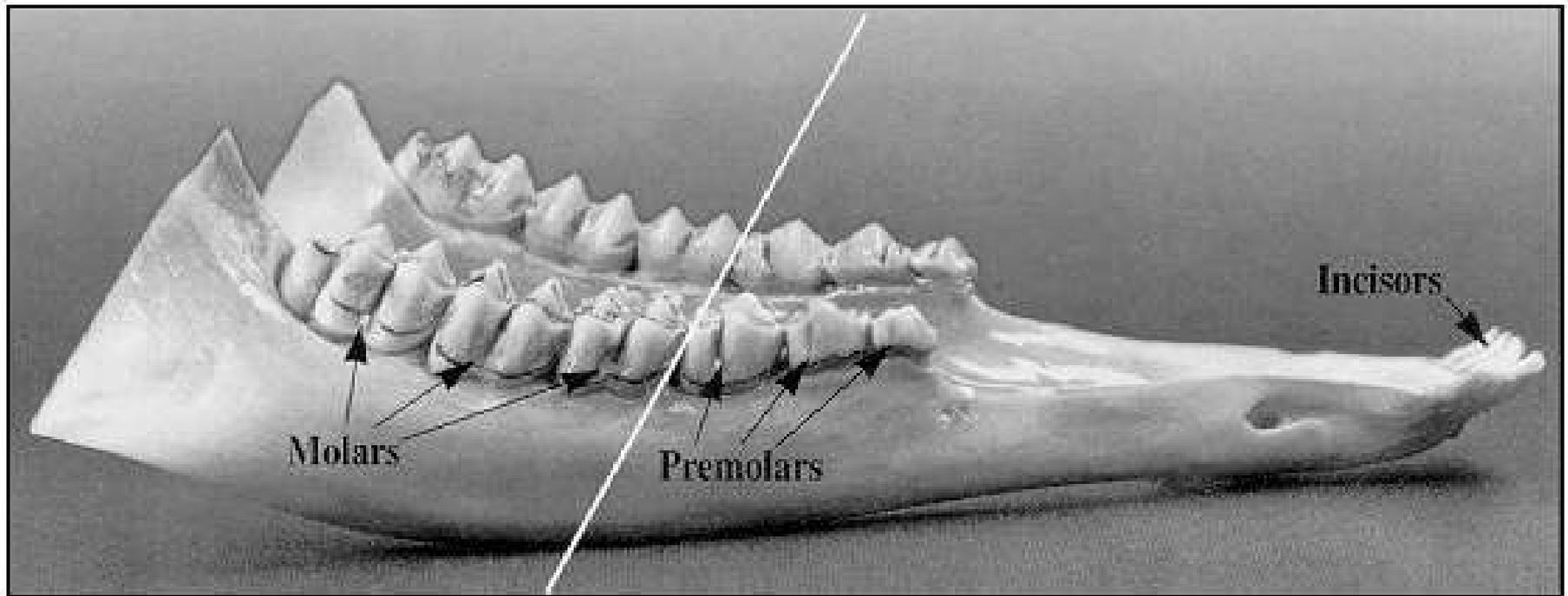


Fawns, shown here, can be recognized by their shorter facial features.

Body size is used to estimate a whitetail's age. Here a six-month old "button" buck is shown beside a mature 4 1/2-year-old buck.

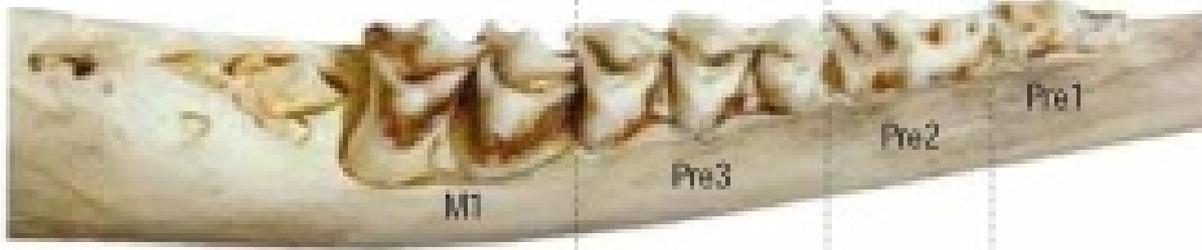


The pattern of tooth replacement and wear is used by biologists to determine a whitetail's age.

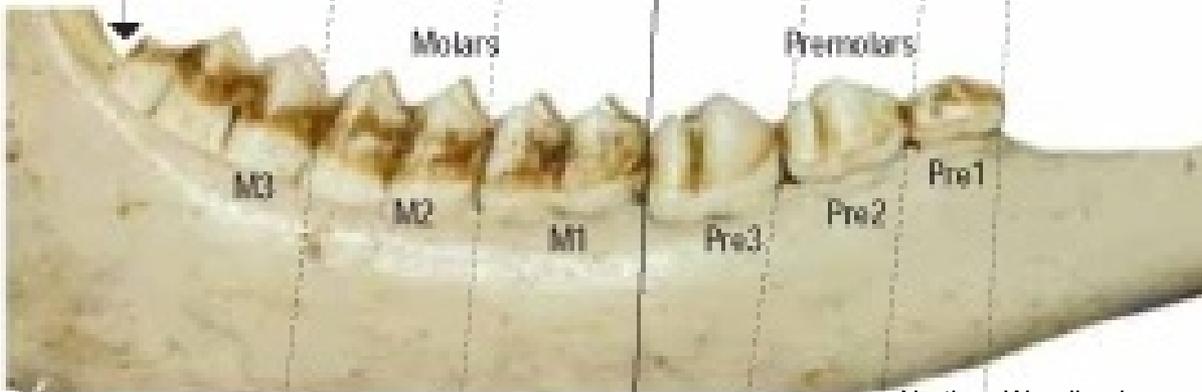
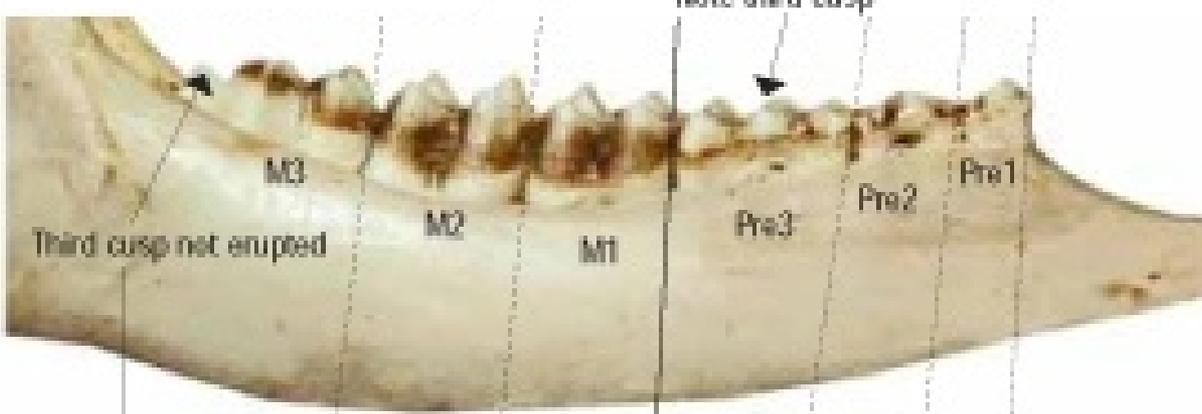


Your basic deer jaw. Incisors in the front, premolars and molars in the back, and a big space between.

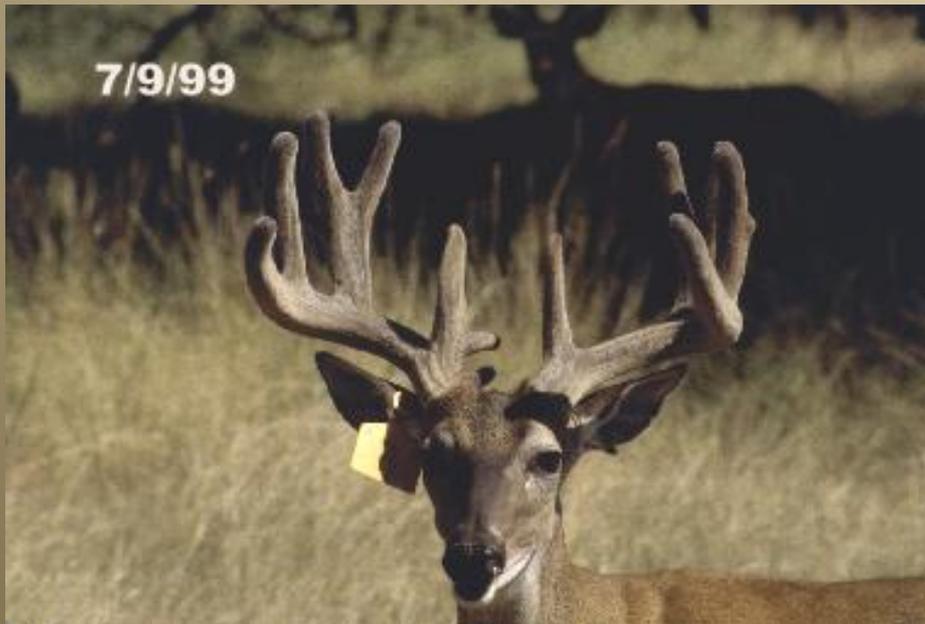
Fawn



1.5 Year Molars & Premolars



A bucks antlers are covered with “velvet” while they are growing.





Antler covered with velvet



Many factors affect a whitetail's antler development.

1. Diet - Nutrition

3. Genetics

2. Age

4. Herd Management



4-6 months



11-13 months



13-17 months



17-20 months



3.5 years

Whitetails leave many signs behind as evidence of their presence.

Buck Rub



S.S. Smith

Browse



D.R. Jackson

Track



A. Moors CouesWhitetail.com

Ground Scrape



Rich Geffert

Droppings



D.R. Jackson

Whitetail Habitat

- **Food** - consists of an abundant supply of grasses, forbs, browse, nuts, fruit, and crops
- **Water** - generally not a limiting factor, obtain much of what they need from the plants they eat
- **Cover** - necessary to elude hunters and other predators and for protection from the weather
- **Space** - area required to escape predators, locate a mate, and find sufficient food, water and cover



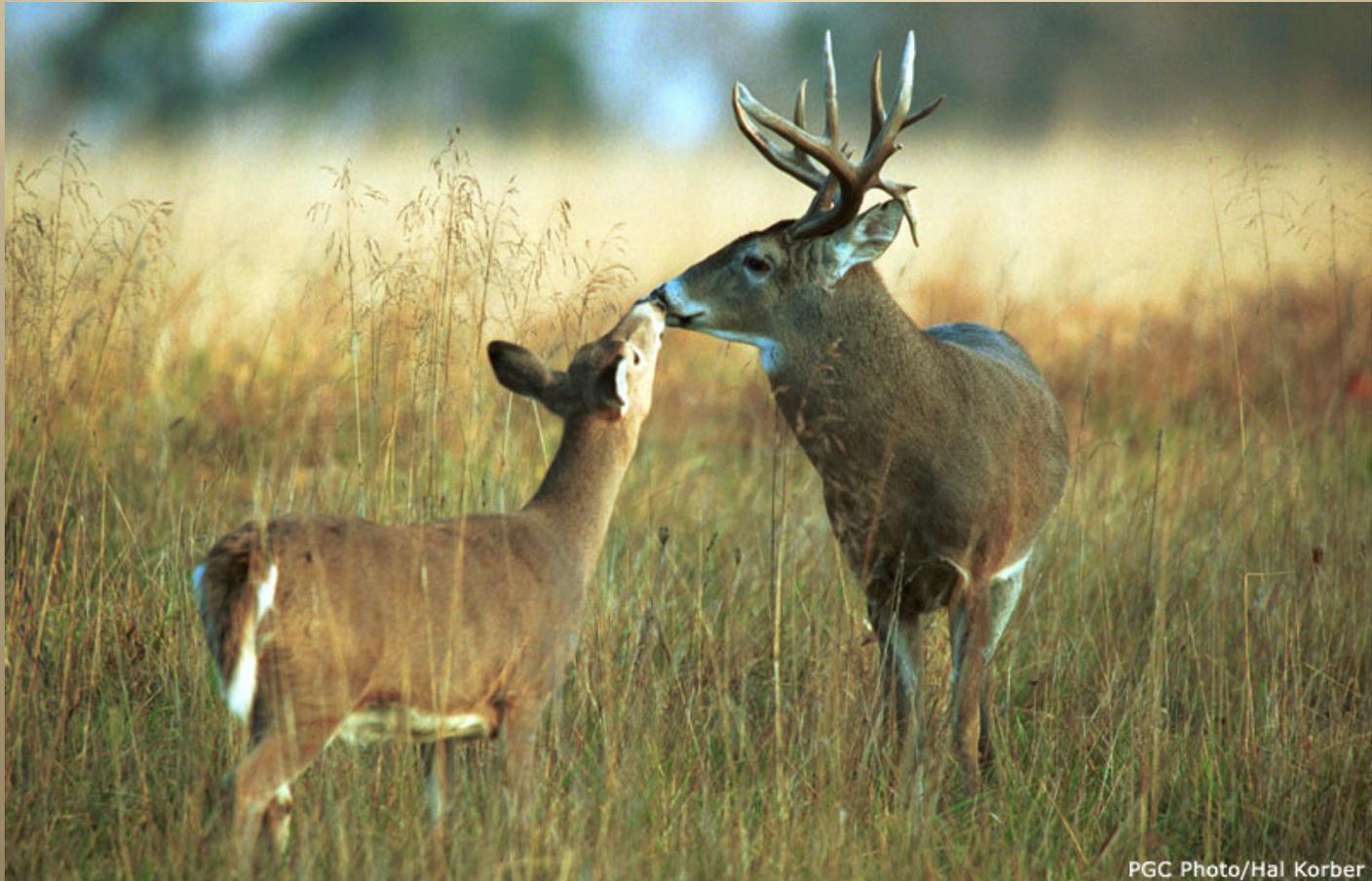
www.mynaturephotos.com

A young seedling/sapling forest provides excellent habitat. Whitetails also prefer “edges” or transition areas between fields and forests.



D. Jackson

White-tailed deer are a valuable, renewable, natural resource that must be managed





Questions