Corallus ruschenbergerii (Tree Boa or Cascabel Dormillion)

Family: Boidae (Boas and Pythons)
Order: Squamata (Lizards and Snakes)
Class: Reptilia (Reptiles)

Fig. 1. Tree boa, *Corallus ruschenbergerii.*

[http://reptile-amphibian.blogspot.com/2010/04/ruschenberger-tree-boa.html , downloaded 8 November 2012]

TRAITS. The tree boa is also known as Ruschenberger's tree boa or cascabel dormillion, and was previously considered part of the widespread *Corallus hortulanus* species complex (Cook's tree boa). The adults are usually a dull khaki green or brown colour with a yellow chin, neck and underbelly. Additionally they can be seen with black checkered or scattered patterns on their tails. The younger individuals mainly range from pink, orange or a pale green with faint darker diamond shape blotches on its sides. The head is also a very distinctive aspect in identifying a tree boa as it is quite large, with the occiput appearing to be swollen (Boos, 2001). The head is also blunt with deeply pitted lip scales. In comparison to the head, the neck is thin. They grow up to longer than 2m in length some even 7 feet long, noting that the females are larger in size and thickness than the males; however the anal spurs are larger in the males (Boos, 2001). It is recognised as the largest species of the *Corallus* family but its scales are smaller than its familiar cousin the emerald tree boa and Amazon tree boa.

ECOLOGY. These boas are found in green rainforest type environments as well as mangroves and swamps. It is commonly seen in the mangrove trees at the Caroni Swamp in Trinidad (Boos, 2001). However, these boas were often seen in gardens and shrubs, one was noted to have been spotted after feeding on a bird in a local's cage (Boos, 2001). They can be found coiled up in trees (Fig. 2), near open water and reservoirs where the trees are taller with stronger branches, especially during the day as they are mostly nocturnal animals. Their diet consists of rodents, birds and lizards (Kricher 1997). Tree boas can also be found in South American countries such as Colombia and Venezuela.

SOCIAL ORGANIZATION. The cascabel dormillion is usually a solitary, nocturnal, territorial snake. Research done found that a total of 32 tree boas were observed from a total of 116 km line transect surveys in the Caroni Swamp (Taylor et al., 2010), each being a few hundred metres from another. Being solitary snakes they do almost all their activities alone except for mating, that is to say they do foraging, hunting as well as finding a new tree or area to rest singly. At times if the male is seen on the move he is in search of a mate. Often if more than one is found in the same spot or together, it usually is a sign of mating activity (they can be noticed wrapped in a ball around each other). If disturbed whilst resting they may become quite defensive, aggressive and alert. These snakes are commonly seen if one goes in search of them especially at night, as their eyes tend to glisten with the shine of a flash light at night time which seems to be the best point in time to look for them as during the day they can easily camouflage in the trees due to their brownish colour.

ACTIVITY. These boas are highly nocturnal creatures, sleeping during the day, coiled up in a tight spherical mass on a tree branch thus resulting in the local given name the cascabel dormilion which translates sleeping rattlesnake (as it was formerly believed to be a rattlesnake by locals of Trinidad and Tobago). At night they forage for sleeping birds (Fig. 3), lizards and some active rodents both on trees and on the ground (Fig. 4). The young feed on small amphibians and reptiles but this soon changes as they get older into feeding on larger more warm blooded mammals. Like all snakes after its meal, the cook's tree boa tends to stay one place and rest as it digests its food.

FORAGING BEHAVIOUR. Foraging is only done at night often in trees or on the ground of rainforest and mangroves. Cascabel dormillions are ambush hunters that swiftly bite and quickly constrict their prey on spotting it. They throw the first third of their bodies around the seized prey and wrap themselves forcefully in tight loops, all of this being done in one immediate motion. If on a tree, it is done whilst holding on with its prehensile tail (Bruce 2004). The killed prey is kept, held in a coil at the mid-body region whilst fresh prey is caught and constricted (Boos, 2001). Like some other snakes (pit vipers) it uses the heat-sensitive pits to detect its prey, before it does its wrapping action to paralyse and kill its catch, later swallowing it whole.

COMMUNICATION. These snakes are very solitary therefore little communication is done between them. However, if disturbed or agitated by another snake or individual it would tend to be highly aggressive and hiss before attacking with a bite (Kricher, 1997). During mating season the females like most female snakes would send out pheromones so that the males would sense it and come find her.

SEXUAL BEHAVIOUR. Courtship and mating of the tree boa involves many males to one female, they undergo a polygynous relationship. This occurs early in the dry season near February and March till April where the water levels are still high from the previous wet season. During mating season the snakes can be found in an unusually large ball often over water, which is the normal daytime resting position of these snakes. The ball consists of one large female to two or more males attending to her. Mating occurs only in mature individuals at about 2 years of age (Boos, 2001).

JUVENILE BEHAVIOUR. Like the adults, the young are often alone after being born. The newly born individuals of the boa species are usually carrot orange or pale green in colour making them distinctive from the adults but they are identical to them in the aspect of aggressiveness and willingness to be quite defensive in portraying biting behaviour. They can feed on small lizards, frogs and tiny nesting birds. Also, they have adapted to a cryptic life by hiding in places where there is thick epiphytic growth on the branches of large trees (Boos, 2001).

ANTI-PREDATOR BEHAVIOUR. The tree boa serves as prey for many animals such as large birds, ocelot and mongooses to name a few. In order to defend itself, they launch and strike a very quick bite at its opponent and if in trees although very clumsy at swimming will drop itself into the water nearby to get away from its predators if need be (Boos, 2001). They are non-venomous and therefore cannot depend on poison to kill its predator but can challenge its enemies with the use of its elongated teeth.

REFERENCES

Boos H. E. A. (2001). The Snakes of Trinidad and Tobago. Pg 60-63. United States of America. 1st Edition.

Bruce J., & Cooke, F. (2004). The Encyclopedia of Animals: A complete Visual Guide, pg 398. University of California Press.

Kricher J. C. A (1997). A Neotropical Companion: An Introduction to the Animals, Plants and Ecosystems of the New World Tropics. Princeton University Press.

Taylor K., Nelson H. P., Lawrence A. (2012). Population Density of the Cook's tree Boa (Corallus ruschenbergerii) in the Caroni Swamp, Trinidad". The University of the West Indies, Department of Life Sciences. Accessed November 10, 2012. http://sta.uwi.edu/fst/lifesciences/edulink/documents/Proceedings_Biodiversity_Research_Symposium.pdf

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Fig. 2. Tree boa, *Corallus ruschenbergerii*, perched sleeping on branch.

[http://www.flickr.com/photos/nclarkii/3116113914/sizes/m/in/set-72157630639257644/, downloaded 11 November 2012]

Fig. 3. *Corallus ruschenbergerii* about to ambush a frog.

[http://www.galerie-creation.com/collection-oxford-scientific-k-99131.htm?page=9, downloaded 11 November 2012]

Fig. 4. *Corallus ruschenbergerii* in search of food, possibly sleeping birds.

[http://www.flickr.com/photos/nclarkii/4228389234/sizes/m/in/set-72157630639257644/, downloaded 11 November 2012]