

Killbear Massasauga Rattlers: Recreation and Conservation

The meeting lasted only seconds, in fact, the encounter occurred without the three campers even realizing it. Intent on visiting the beach, they trooped on towards their destination, unaware they had just passed one of Georgian Bay's most misunderstood inhabitants, the Eastern Massasauga Rattlesnake. Coiled quietly in the shade of a small juniper, the snake had silently allowed the interlopers to pass within metres of its position, knowing that a warning rattle would only have drawn unwanted attention to itself.

Often discussed but rarely seen, the Eastern Massasauga Rattlesnake is this province's only venomous snake. Once found throughout much of southwestern Ontario, today the largest remaining populations occur on the Bruce Peninsula and the Eastern shore of Georgian Bay. In 1991 the Committee on the Status of Endangered Wildlife in Canada Designated the snake a threatened species, officially recognizing that human destruction of both individuals and habitat has seriously reduced the species' abundance and distribution. The Massasauga has achieved similar recognition in the United States where the snake is now considered endangered, threatened, or of 'special concern' in all 10 states in which it is found.

In Ontario, rattlesnake conservation involved the coordinated efforts of a group of dedicated National and Provincial Park staff, educators, wildlife managers and scientists. For example, as part of a new research partnership between the Ministry of Natural Resources and Carleton University, graduate student Chris Parent is studying the effects of human disturbance on Eastern Massasauga Rattlesnakes in Killbear Provincial Park.

This is an important conservation issue as the areas in which the snakes can still be found are increasingly used for outdoor recreational activities such as camping, cottaging, kinking and mountain-biking. As host to more than 200,000 visitors each summer, Killbear Provincial Park is an ideal location for this study.

To determine whether differences in activity patterns and habitat use exist between snakes found in areas frequented by humans and those found in relatively undisturbed areas, 16 park Massasaugas were surgically implanted with miniature radio transmitters this spring. Each transmitter weighs about as much as two quarters and emits a signal that allows Chris to track the snakes on a daily basis and establish their activity periods, home range sizes, habitat use and patterns of movement. Since each transmitter uses a different frequency, Chris tunes in different snakes the same way you tune in radio stations! To determine information on growth rates, population structure and population size, rattlesnakes are also captured, measured, weighted and injected with Passive Integrated Transpondors

Transmitters let you tune in snakes the way you tune in radio stations

(PIT tags) for individual identification. Finally, free-ranging rattlesnakes are subjected to standardized human approaches and their responses carefully documented. By comparing results from snakes found in different areas of the park, Chris will be able to determine whether snakes regular-



Busy days at Camp Hurontario. Joel McEwen, who handles maintenance and Pauline and Don Marston, co-directors were on the dock when GBT flew in. The camp, just north of Twelve Mile Bay expects 180 campers who will use 82 canoes, kayaks and sailboats to have jolly times on the waters of the Bay and on trips across northern Ontario.

ly exposed to human activity alter their behaviour in response to disturbance.

This research is supported by Carleton University, World Wildlife Fund Canada and Environment Canada's Endangered Species Recovery Fund and the Environmental Youth Corps program. Results will not only lead to improved management practices that take into account the increasing human activity in the snake's remaining range, but also contribute to the formation of a management strategy for the species in Killbear Provincial Park.

Of course, conserving the Massasauga will also require the goodwill of the hundreds of thousands of people who enjoy Georgian Bay every summer. For this reason, Killbear Provincial Park is holding a special presentation on the Eastern Massasauga Rattlesnake for homeowners, cottagers and other outdoor recreation enthu-

siasts, beginning at 2:00 pm on Friday, July 28, 1995. Participants will learn about the basic biology of the snake and special attention will be paid to issues concerning coexistence, including how to deal with snakes found on your property. Safe handling techniques will be demonstrated and audience questions and participation will be encouraged.

If you'd like to know how you can contribute to the conservation of the Eastern Massasauga Rattlesnake but are unable to visit Killbear Provincial Park, the Metro Toronto Zoo, Bruce Peninsula National Park, Georgian Bay Islands National Park and Science North also provide a variety of educational opportunities. By working together we can ensure that this species remains a fascinating part of the natural wonders of Georgian Bay.