

Advances in Ethology

36

Supplements to Ethology



Contributions to the

XXVII

International Ethological Conference

Tübingen, Germany

22-29 August 2001

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Science

Preliminary tests on learning and memory in the pitviper *Bothrops neuwiedi pubescens*

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Many papers have dealt with learning processes and memory capabilities in snakes, with moderate success in finding motivations for animals that do not need a regular food intake. Eighteen adult *Bothrops neuwiedi pubescens* accustomed to feed on white mice were tested in two ways after a fortnight's fasting. Five were presented a burning cigarette moving in front of the cage. All snakes flicked their tongues and struck violently against the glass. The same procedure was repeated one week, six weeks, and two years later. All the snakes flicked their tongues and moved towards the cigarette, but none struck. The other animals were presented a snake-hook with a piece of synthetic lamb's hide wrapped around its end, hand-warmed. All snakes flicked their tongues while approaching the lure. Only six of them approached quickly and struck, none of them did it two hours later. After a week, three of the six struck, and ten days later two, only one being a continued struck. In the first test, the violent beat against the glass wall acted as an aversive stimulus, forcing the snakes to verify the moving object as a prey. The second test provided no harm. The snakes whose flicking lasted longer did not struck, but none of them struck two hours later indicating that they could remember the lure. The progress along the following days, confirms it, although the fact that one animal struck again proves that not all animals were prone to learn.