

4<sup>TH</sup> INTERNATIONAL CONFERENCE ON  
BEAR RESEARCH AND MANAGEMENT, A REVIEW

The 4th International Conference on Bear Research and Management was held in Kalispell, Montana, on 20-24 February 1977. Registration totalled 308, with participants from 34 states and 4 provinces as well as Mexico, Japan, Italy, Norway, Sweden, and Poland. Seventy-two papers relating to the biology, ecology, and management of 4 species of bears were presented during 3 days of technical sessions.

An overview of conference proceedings reveals that significant progress has been made in nearly all phases of bear research and management during the past 3 years. Perhaps more important is the current emphasis on new and innovative techniques that will undoubtedly accelerate the learning process in the coming years. The value of radiotelemetry for study of elusive animals was conclusively demonstrated, while computers and satellites are being recognized for their potential contribution to bear research and management. At the same time, genetics and physiology are increasingly becoming avenues of research, with applications extending to human health. The need for reliable census techniques and effective aversive conditioning agents was expressed by many involved in field management of the various bear species.

The effect of human development and activities on bears and their management was a focal point of discussion throughout the conference. All species of bears are being affected but critical habitat for grizzly bears has received special attention during recent years. Participants generally agreed that bears require relatively large amounts of suitable habitat where human activities are strictly controlled. However, the means by which such areas are identified as well as their component parts will apparently require considerable additional research.

One of the more unique aspects of the presentations was the geographic comprehensiveness of bear research. This breadth provides opportunities for the study of bears along environmental gradients or ecoclines. Study along these lines was initiated by an informal working group with the goal of repeating and refining during future gatherings.

Proceedings of the conference will be published in early 1978. Contact C. J. Martinka, Conference Chairman and Editor of Proceedings, Glacier National Park, West Glacier, Montana 59936, for further information. The 5th International Conference on Bear Research and Management is tentatively planned for early 1980.—Lynn L. Rogers.

Rogers, L.L. 1977. Fourth International Conference on Bear Research and Management, a review. *Wildl. Soc. Bull.* 5(4):196-197.