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1 July 2001

MOVEMENTS AND MORTALITY OF FERRUGINOUS HAWKS BANDED IN MONTANA

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J. of Field Ornithology, 72(3):389-398 (2001). <https://doi.org/10.1648/0273-8570-72.3.389>

Abstract

Of 233 Ferruginous Hawks (*Buteo regalis*) banded as nestlings in three study areas of Montana over 16 years, 15 (6.4%) were recovered. Recovery rate increased with duration of study and cumulative number banded. Mean age at recovery for all Ferruginous Hawks banded in Montana was 390 days. Analysis indicated 50% of banded hawks were dead by between 0.35 and 0.70 yr and 95% were dead by between 1.5 and 3 yr of age. Survival estimated at one year was higher if hawks recovered by radio-tracking were excluded. Mean distance from the natal nest of all recoveries of Ferruginous Hawks banded in Montana was 824 km. Eight recoveries were of recently fledged hawks <1 km from the natal nest, but the remainder were recovered ≥ 1500 km from the natal nest. Recoveries that were outside natal 10-minute blocks ($n = 7$) occurred in northern Mexico, central New Mexico, southern California, and Texas; most (86%) were southeast of the natal nest. Six hawks died from unknown causes, five from predation, two from conflicts with power lines or towers, and two from injuries. Predation occurred more often within than outside natal 10-minute blocks. Recovery locations suggested that breeding populations of Ferruginous Hawks remain segregated during winter. Mortality from electrocution and collision may be important for some populations, especially those that winter in populated areas of California and Mexico.

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Alan R. Harmata, Marco Restani, George J. Montopoli, James R. Zelenak, John T. Ensign, and Peter J. Harmata "MOVEMENTS AND MORTALITY OF FERRUGINOUS HAWKS BANDED IN MONTANA," *Journal of Field Ornithology* 72(3), 389-398, (1 July 2001). <https://doi.org/10.1648/0273-8570-72.3.389>

Received: 18 May 2000; Accepted: 1 November 2000; Published: 1 July 2001

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