Data Papers

Ecology, 84(12), 2003, p. 3402 © 2003 by the Ecological Society of America

LIFE HISTORY CHARACTERISTICS OF PLACENTAL NONVOLANT MAMMALS

Ecological Archives E084-093

S. K. Morgan Ernest¹

¹Department of Biology, University of New Mexico, Albuquerque, New Mexico 87131 USA

Abstract. The purpose of this data set was to compile general life history characteristics for a variety of mammalian species in order to perform comparative life history analyses among different taxa and different body size groups. Data were collected from the literature, and data sources are documented for each species within the data file. Since life history characteristics will show minor variation with environmental conditions (resource availability, climate, competitive environment, and predation pressure) a general life history for each species was sought to average over minor differences in local populations. To create a general life history for each species, life history values are often an average from several literature sources. Life history variables included in the data set are: maximum lifespan (months), age of first reproduction (months), gestation time (months), weaning age (months), weaning mass (grams), litter size, litters per year, newborn mass (grams), and adult body mass (grams). Since these data were collected with the intent to examine general life history patterns, they are good for examining large-scale patterns, specifically in comparing life history characteristics for different orders or families of mammals. All orders of placental mammals, except Chiroptera (bats) are represented in this data set: Artiodactyla (161 species), Carnivora (197 species), Cetacea (55 species), Dermoptera (2 species), Hydracoidea (4 species), Insectivora (91 species), Lagomorpha (42 species), Macroscelidea (10 species), Perissodactyla (15 species), Pholidota (7 species), Primates (156 species), Proboscidea (2 species), Rodentia (665 species), Scandentia (7 species), Sirenia (5 species), Tubulidentata (1 species), and Xenarthra (20 species). There are two caveats on this data set, however. First, these data are not appropriate for asking population-level questions where the integration of life history parameters with specific environmental conditions is important. Second, while this data set is extensive, it is not exhaustive. The creation of an exhaustive data set is the ultimate goal, but that goal is still several years from completion. In the meantime, researchers utilizing the data set are urged to conduct their own search for data not reported within the current data set. Researchers are also encouraged to contact the author of the data set and alert her to literature sources containing data for missing variables or

Key words: adult mass; age of first reproduction; gestation time; life history; litter size; litters per year; maximum lifespan; newborn mass; non-volant mammals; weaning age.

Manuscript received 24 October 2002; revised 19 October 2003; accepted 20 October 2003. Corresponding Editor: W. K. Michener. ¹ E-mail: mernest@unm.edu

The complete data sets corresponding to abstracts published in the Data Papers section of the journal are published electronically in *Ecological Archives* at (http://esapubs.org/archive). (The accession number for each Data Paper is given directly beneath the title.)