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Phänologie und Morphometrie einer Blindschleichen-Population (*Anguis fragilis*) in Hattingen (NRW)

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Phenology and morphometry of a slow worm population (*Anguis fragilis*) from Hattingen (North Rhine-Westphalia)

We present phenological and morphological data of a slow worm population from Hattingen (North Rhine-Westphalia). We used artificial cover boards to capture a total of 365 individuals (including recaptures) at 16 occasions between March and September 2008–2011. Ninety-four animals (25.8%) were males, 174 (46.7%) were females and 97 (26.6%) were juveniles/subadults. The sex ratio was 1 : 1.85. More males were found in April, more females from Mai to July. In the following months, hatchlings dominated. The largest individuals were males with a total length of 39.6 cm and a snout-vent length (SVL) of 19.7 cm. The heaviest individual was a female with a body mass of 30.1 g. The tail of adult slow worms, which have not been previously subjected to caudal autotomy was always longer than the SVL. The average ratio of tail length/SVL was 119.7% for males, 117.4% for females and 107.8% for juveniles, respectively. The tails of hatchlings and individuals up to 13 cm SVL were mostly shorter than the SVL. No relationship was found between the total length and the ratio of tail length/SVL of males and females. There was a significant linear relationship between SVL and body mass with less explained variance for adults. Our results suggest that females of the studied population reproduce when they reach a SVL of 12 cm and a total length of 27 cm, and that such females reproduce every year. Presence of regenerated, previously broken tails was observed in 53.3% (n = 84) of males, 55.4% (n = 166) of females and 17.2% (n = 93) of juveniles, respectively, and increased with the SVL. The tail loss reached from a few percent to total loss, but no relationship was found between the percentage of tail loss and SVL. Dorsal blue spots were observed in 13.8% of males.

Key words: Reptilia, *Anguis fragilis*, phenology, morphometry, rate of tail autotomy.

Zusammenfassung

Wir stellen phänologische und morphometrische Daten einer Blindschleichen-Population aus Hattingen (NRW) vor. Die Untersuchungen mit Hilfe von KV erfolgten 2008–2011 bei 16 Begehungen zwischen März und September. Insgesamt wurden 365 Tiere (inklusive Wiederfänge) gefunden, davon 94 (25,8 %) Männchen, 174 (46,7 %) Weibchen und 97 (26,6 %) juvenile/subadulte Tiere, das Geschlechterverhältnis betrug 1 : 1,85. Die Verteilung der Funde auf die einzelnen Monate zeigte ein deutliches Überwiegen der Männchen im April, ansonsten dominierten die Weibchen (Mai, Juni und Juli) und nachfolgend die neugeborenen Jungtiere. Die längsten