UPDATES FROM THE FIELD


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Classic VHF radiotelemetry of animals with large home ranges is time consuming and there are often cases when the animals “disappear” due to unknown causes, one of which might be dispersion. Research is often hindered or even limited by national borders and/or inaccessible terrain. Use of GPS technology provides better efficiency in monitoring of movement of animals with higher precision even in remote areas and across national borders. Recent decreases of transmitters’ weight made this technology feasible for telemetry of mid-sized animals. We will present preliminary results from a study of Eurasian lynx (*Lynx lynx*) using the new lightweight (285 g) Televilt Tellus GPS collar with remote GSM download technology. We captured a young female lynx on Snežnik plateau in Southern Slovenia and fitted her with the GPS/GSM collar. We tracked her movement in the northern Dinaric mountain range of Slovenia and Croatia and estimated success rate of GPS positioning in this very rugged karstic terrain. In addition, we will present methodology we used for locating prey remains and success rate of finding them, as well as preliminary data on prey preferences and predation rate of Eurasian lynx in Dinaric landscapes.

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A Fine-Scale GPS Study of the Movements of African Lions (*Panthera leo*) on Ongava Game Reserve, Namibia

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Ongava Game Reserve (OGR) is a private reserve (270km²) located adjacent to the southern boundary of Etosha National Park (ENP) in Northern Namibia. OGR’s habitat is predominantly mopane scrub, and it is home to a fluctuating population of African lions (*Panthera leo*). There are at least three resident groups (*ngroup* = 4-9) and a varying number of transient specimens (from ENP), often adult males and coalitions of young adult animals, giving a total number of individuals in the range 24-33 (density about 9-12 animals / 100km²). In order to better understand the movements of the individuals, we fitted GPS collars (Blue Sky Telemetry, Scotland) to adult female resident lions and recorded their location every 15 minutes. After several months of recording, we were able to construct a comprehensive picture of the fine-scale movements of these animals, including idle / active times, movement velocities, visits to water holes and putative kill sites. We also found that the individuals made transient movements into areas significantly outside their home ranges as calculated by conventional observation methods. We suggest that under conditions where both group size and density are highly variable, home ranges are dynamic rather than static.

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