



Tierschutz im Jagdbetrieb

Entwicklung und Begründung eines Verfahrens
zur Beurteilung der Eignung von Geschossen
zur Tötung von Säugetieren

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Entwicklung und Begründung eines Verfahrens zur Beurteilung
der Eignung von Geschossen zur Tötung von Säugetieren

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8 Summary

The killing of mammals in the hunting practice is regulated in Germany by the Animal Welfare Act and Federal and State Hunting Acts. It determines who (competent persons), where (areas where hunting is not prohibited and the person is eligible to hunt), when (hunting seasons), which animals (game species) may be killed, and by what method (rifle bullet). In Germany on average 1.7 million mammals (German Hunting Association, 2014) are killed per year. The killing of mammals by proper hunting practices may be carried out according to the Animal Welfare Act only if the animal suffers "no more than unavoidable pain". The use of rifle bullets is the legal means specified by the Federal Hunting Act. Bullet choice and application therefor stand in a direct relationship to the animal welfare. So far, no evaluation of the suitability of bullets has been standardized (Krone, 2008). The Federal Hunting Act regulates the suitability of bullets for hunting by species, bullet diameter and impact energy. It was investigated, what factors influence the observed effects of a killing shot. For this generalized, non-linear models were fit to existing data of ballistic parameters and observations to the shot effect from hunting situations (Gremse & Rieger, 2014). It is demonstrated that the use of "terminal ballistic" parameters for releasing kinetic energy into the target strongly improved model fit over the use of the parameter "impact energy". It was investigated under what light conditions and shooting distances which wild species are hunted and how this varies by the form of hunting (stand hunting, drive hunting, and stalk hunting). An analysis to terminal bullet strikes by hunt form was carried out. Based on these results, the method for killing ungulates in hunting practice to be judged by Animal Welfare Act standards is defined as "the aimed and deliberately executed killing shot, regardless of the form of hunting, with the terminally sufficiently effective rifle bullet." A procedure is derived and justified, to, without the abuse of live animals, determine in ballistic simulant material the projectile impact speed up to which it is terminally sufficiently effective and to determine limiting operational ranges for different calibers. A classification of the findings for judging killings in hunting practice by the Animal Welfare Act standards as part of hunters' competence (knowledge and skills) is provided.