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Sedation of western grey kangaroos (*Macropus fuliginosus ocydromus*) with tiletamine-zolazepam

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Abstract

*It is sometimes necessary to restrain kangaroos (*Macropus spp*) for veterinary treatment or in the course of scientific research, but the associated stresses may induce capture myopathy in wild kangaroos. Judicious use of injectable sedatives can reduce the risk of capture myopathy. Zoletil[®], a proprietary mixture of tiletamine and zolazepam, is reported to have a wide safety margin, a small dose volume, and be quick acting for a range of animals. We investigated the dose-response relationship of Zoletil[®] in 26 western grey kangaroos (*Macropus fuliginosus ocydromus*). All kangaroos were recumbent within 5–10 min of intramuscular injection with mean (\pm SD) Zoletil[®] of 4.55 (\pm 0.98) mg kg⁻¹. Mean (\pm SD) time to recovery varied between individuals, 2.07 (\pm 0.41) h over all occasions, and was independent of dose rate. For animals that were assessed on multiple occasions, mean (\pm SEM) time to recover was reduced from 2.25 (\pm 0.09) h on the first occasion to 2.15 (\pm 0.10) h on the second occasion and 1.81 (\pm 0.11) h on the third. Since kangaroos sedated with Zoletil[®] are vulnerable to predation and injury during recovery, we believe they should be supervised until they are able to fend for themselves.*

Keywords: animal welfare, dose-response, recovery, sedation, tiletamine-zolazepam, western grey kangaroos