

Den-tree use by Bobucks (*Trichosurus cunninghami*) in north-eastern Victoria.

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Tree hollows are an essential resource for most species of arboreal marsupial. We are investigating the use of den-trees by 48 radio-collared Bobucks (*Trichosurus cunninghami*) in the Strathbogie Ranges, north-eastern Victoria. We have collected more than 4000 daytime radio-fixes on Bobucks located in both a 150ha forest block and in narrow linear remnant forest vegetation beside roads. All individuals use multiple dens, however Bobucks in the forest population use significantly fewer dens than those in the roadside population (mean (\pm SE) 6.6 ± 0.6 dens/individual and 10.4 ± 0.9 dens/individual, respectively). In the forest population, each tree is used by only one adult male and female pair and their associated offspring, suggesting that Bobucks have some form of 'ownership' of particular trees, and den-sharing patterns suggest that these pairs defend access to their den-trees. In addition, most den-trees used by an individual are located on the periphery of the area used at night for foraging by that individual. It appears that suitable den-trees may be limiting at this site and we are artificially supplementing den availability using nest boxes to test the hypothesis that home range and social dynamics are influenced by den availability.

