

The diet of a pair of Grey Falcons *Falco hypoleucos* was investigated in Sturt National Park, arid north-western New South Wales, by analysis of pellets andorts collected during October–December 2003 beneath a nest in a riparian Coolibah *Eucalyptus coolabah* beside a gibber plain. The falcons fledged a brood of four young in a year of above average rainfall in the first half (and average rainfall overall), from an estimated egg-laying date of early August. The falcons' breeding diet (n = 62 prey items from 58 dietary samples) consisted, by number, mainly of birds (99%, 63% being parrots) and one mammal; parrots formed most of the biomass (90%) of identified avian prey. Geometric Mean Prey Weight was 29.6 grams, and dietary diversity (Shannon Index) was 1.98. Small–medium (<100 g) granivorous birds were selected as prey ( $P < 0.01$ ). The juvenile offspring accompanied their hunting parents, associating with them for at least five months post-fledging.