## **Supplementary Material**

## Impacts of changing fire regimes on hollow-bearing trees in south-eastern Australia

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## **Supplementary material**

**Table S1.** Coefficients for predicting age from DBH in linear models for a range of *Eucalyptus* species within the study area. The coefficients were calculated from mean annual diameter increments using the equation in the text. The coefficients for tree species with a "NA" in the mean annual diameter increment column were taken directly from linear models provided in the source. The y-intercept for all models used to predict age from DBH was set to zero. Where >1 estimate was available for a tree species we chose this value randomly from the available estimates in each run of the model.

	Mean diameter		
Tree species	increment (cm yr <sup>-1</sup> )	Coefficient	Source
Corymbia maculata	0.55	1.82	Bauhus et al. 2002
E. cameronii	0.36	2.78	Bowman et al. 2014
E. dalrympleana	0.34	2.94	Bowman et al. 2014
E. deanei	0.40	2.50	Bowman et al. 2014
E. fastigata	NA	1.35	Gibbons et al., 2010
E. grandis	0.42	2.38	Ngugi et al., 2015
E. microcorys	0.49	2.03	Wormington & Lamb 2013
E. microcorys	NA	2.39	Wormington & Lamb 1999
E. microcorys	0.40	2.50	Ngugi et al., 2015
E. obliqua	NA	1.55	Gibbons et al., 2010
E. pilularis	0.67	1.50	Wormington & Lamb 2013
E. pilularis	0.53	1.89	Ngugi et al. 2015
E. signata	0.38	2.63	Wormington & Lamb 2013

**Table S2.** Parameter estimates for predicting the proportion of trees with hollows from DBH for a range of tree species that occur within the study area. Logistic regression models were fitted to data in each source. Where >1 estimate was available for a tree species we chose this value randomly from the available estimates in each run of the model.

Species	Coefficient	Intercept	Source
Corymbia maculata	0.0612	-5.3669	Williams 2001
E. cameronii	0.0621	-5.7960	Williams 2001
E. dalrympleana	0.0542	-4.1611	Avi unpublished
E. deanei	0.0500	-4.9134	Williams 2001
E. fastigata	0.0345	-5.2184	Gibbons unpublished
E. fastigata	0.0531	-4.9631	Williams 2001
E. grandis	0.0700	-8.1077	Williams 2001
E. microcorys	0.0601	-5.7091	Williams 2001
E. obliqua	0.0488	-5.0129	Williams 2001
E. obliqua	0.0511	-5.9430	Gibbons unpublished
E. pilularis	0.0835	-8.3406	Williams 2001
E. signata	0.0419	-6.0675	Williams 2001



**Fig. S1.** Relationships used to predict tree age from tree diameter (DBH) for the 10 tree species in the simulation model. For each run of the simulation model the linear coefficient for this relationship was drawn randomly from a value that was up to  $\pm 30\%$  of the mean value for the tree species. The horizontal parts of the relationships represent standing dead trees.