TRIALS OF SOME EASTERN STATES EUCALYPTS IN THE KARRI FOREST AREA

by

R.J. Underwood

Introduction:

With the aim of studying the growth and development of some Eastern States Eucalypt species in the Karri forest environment, a number of trial plots were established in Nairn Block, Pemberton Division in July last year (Bradshaw, 1963).

These plots were recently inspected and measured and the results are extremely interesting.

The Plots:

Twenty-three plots, 0.1 acres each, were planted as follows :-

E. pilularis (Blackbutt) - 7 plots;
E. gigantea (Alpine ash) - 6 plots;
E. obliqua (Messmate Stringy Bark) - 5 plots;
E. scabra (White Stringy Bark) - 5 plots.

The stock was either tubed, potted or open rooted and the seedlings were planted at 9 x 9 ft. spacing. The plots were established in openings in the forest following logging, either on ash beds or ground disturbed by logging.

The whole area had a Regeneration burn in Autumn, 1963.

Results:

On the first week of October, 1964, all plots were inspected. A survival count was made, and the height of every tree measured. The results are shown summarized in Table 1 below.

TABLE 1

Species	Survival %	Mean of Plot mean heights
E.pilularis	81%	2' 6"
E.gigantea	49%	1' 5"
E.obliqua	79%	2' 1"
E.scabra	85%	1' 0"

Comments:

The overall condition of the Eucalypts was extremely good, with development of seedlings on ashbeds being consistently superior to that on landings and snig tracks. In nearly every plot - except those established on landings - height growth was being inhibited by the presence of fire weeds (Acacia pentadenia and Acacia urophylla), creeper (Kennedya coccinea) and in some cases, dense regeneration of Karri.

Since the survival potential of these species has now been indicated, this scrub will be cleaned out out of the plots, to allow a better study of their later development.

It is pleasing to note that the two best timber species planted (E. pilularis and E. obliqua) showed out to the best advantage. On the best plots, established on deep, well drained ashbeds, the height growth of these species is comparable with that of Karri seedlings on similar sites. For example -

TABLE 2

Species	No. of trees measured.	Mean Ht.	Ht. of tallest tree measured
E.pilularis (Plot 19)	47	4' 0½"	8' 1"
E.obliqua (Plot 13)	40	4' 5"	10' 0"
E.diversicolor (Plot 19)	50	4' 1½"	7' 7"

The Karri seedlings shown above were randomly selected from some 100-odd Karri seedlings which had regenerated naturally within Plot 19 following the 1963 Regeneration Burn.

Reference:

F.J. Bradshaw, Experimental Plot Register, Pemberton.

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