

by M. Kokir.

There are many forested areas in the Manjimup Division which present the forester with a problem in prescribing a suitable method of treatment. An area described below is considered typical.

The A.P.I. Map Sheet describes the particular area as a KMA V SFD Stand. In order to obtain a more detailed knowledge of the area, five independently located one-acre assessment plots were established within the stand. The results of the assessment are very interesting - they are presented in the Table on the following page.

It can be seen from the table that Karri is the predominant species in the stand, averaging 37.5 loads/acre. However, of this 37.5 loads, only 11.1 loads can be considered useful growing stock, 25.1 loads are merchantable and require immediate cutting and 1.2 loads have no potential merchantability. The useless volume is mainly in cull trees.

Volume per acre of Marri is 14.2 loads of which 11.7 loads is not merchantable.

An important and undesirable fact is obvious in the Table. In the 12"-60" GBH class, Marri contributes an average of 33 stems per acre while Karri contributes only 7 stems per acre. Although there are about equal numbers of Karri and Marri in the >60" GBH class (which is also undesirable), the figures for the 12"-60" girth class are most alarming - particularly since about 80% of the Marri has no marketable potential.

Since the area is still virgin, a trade out is inevitable, both to pay for the upkeep of the area and to convert the site into productive forest. However, a heavy trade out involving removal of static volume plus severely fire-damaged trees must immediately expose the area to Marri dominance. What then of the chief aim of silviculture - the obtaining of regeneration of a desirable species? With so much Marri in the smaller size classes it seems unlikely that satisfactory Karri regeneration would develop.

A possible solution to the problem is the poisoning of Marri to liberate Karri. However, this would necessitate heavy expenditure on an area which is not a first class Karri site.

A better solution in my opinion would be to plant such areas with pines. The per-acre value of pine well exceeds that for the native hardwoods either Karri or Jarrah. The royalty derived from clear-felling the Karri should cover the costs of clearing, cultivation and preparation of the area for pine planting.

The advent of a pulp and paper industry in the lower South-west would be a great asset to our economy. The planting of pines would encourage such an industry to move into this area, as well as increasing the productivity of the forest.

ACRE.	TOTAL VOLUME. Lds. Per Ac.			NUMBER OF STEMS > 60" K & M		CLASS OF KARRI (Volume in Loads)			MARRI VOLUME IN LOADS		NUMBER OF STEMS 12" - 60"		
	K	M	J	K	M	Growing Stock	Available for Cutting	Unmarket- able.	Satis- factory	Unsatis- factory.	K	M	J
ONE	50.3	14.6	-	12	11	22.0	27.8	0.5	2.1	12.5	13	35	-
TWO	40.8	20.2	7.9	5	6	1.1	39.7	-	1.4	18.8	8	32	-
THREE	27.2	15.3	-	7	7	7.7	14.6	5.9	8.5	6.8	9	44	1
FOUR	42.4	16.1	1.9	8	7	13.3	29.1	-	-	16.1	5	39	1
FIVE	26.7	4.6	-	6	7	11.4	15.3	-	0.4	4.2	2	14	-
TOTAL FOR FIVE ACRES	187.4	70.8	9.8	38	38	55.5	126.5	6.4	12.4	58.4	37	164	2
AVERAGE PER ACRE.	37.5	14.2	2.0	7.6	7.6	11.1	25.1	1.2	2.5	11.7	7.4	32.8	0.4