

SILVICULTURAL AND ITS PRACTISE IN MALAYSIA

By
MOHD LOKMAN CHE JUSOH

**Final Project Submitted in Partial Fulfillment for the Diploma in Wood
Industry
Universiti Teknologi MARA
Pahang Branch**

October 2004

ACKNOWLEDGEMENT

First of all I would like to express my deepest appreciation to my supervisor, Cik Mazlin Kusin for giving me guidance, helping, critics, support and advice to finish up this thesis. I also want to thanks to Prof. Madya Abdul Jalil for teaching us how to write a thesis and also a billion thank to head program of Diploma in Wood Industry, En. Wan Nazri Wan Abdul Rahman.

Sincere thank also to my entire friend who give their hand and support to help in this final project. I very appreciate what you all have done to me. And to my entire respected lecturers, thank you so much.

I also want to extend my appreciation to those who are involved either directly or indirectly in completing this project. Deepest appreciation to my family for understanding me and give yours moral support when I needed it so much. May Allah S.W.T bless us all.

TABLE OF CONTENTS

		Pages
APPROVAL SHEET		i
DEDICATION		ii
ACKNOWLEDGEMENT		iii
LIST OF TABLES		vi
LIST OF PLATES		vii
LIST OF FIGURES		viii
LIST OF ABBREVIATIONS		ix
ABSTRACT		x
ABSTRAK		xi
CHAPTER	INTRODUCTION	1
I	1.1 General Background.....	1
	1.2 Objective.....	2
CHAPTER	LITERATURE REVIEW	3
II	2.1 Definition of Silviculture.....	3
	2.2 History of Silviculture.....	5
	2.2.1 European Origin.....	5
	2.2.2 Malaysian System.....	8
	2.3 Objective of Silviculture.....	9
	2.3.1 Way of Achieving Objective.....	11
	2.4 The Important of Silviculture.....	14
	2.5 Silviculture System.....	15
	2.5.1 High Forest System.....	16
	2.5.1.1 Clearcutting System.....	16
	2.5.1.2 The Selection System.....	18
	2.5.1.3 The Shelterwood System.....	21
	2.5.1.4 Seed Tree Method.....	24
	2.5.1.5 Uniform System.....	24
	2.5.2 Coppice System.....	25
	2.5.2.1 Simple Coppice System.....	26
	2.5.2.2 Coppice with Standard System.....	26
	2.5.2.3 Pollard System.....	27
	2.6 Silviculture Treatments.....	28
	2.6.1 Middle Cutting.....	29
	2.6.2 Weeding/Cleaning/Cutting Root.....	29
	2.6.3 Release or Liberation Cuttings.....	30
	2.6.4 Sanitation Cutting.....	31
	2.6.5 Salvage Cutting.....	32
	2.6.6 Thinnings.....	32
	2.6.6.1 Low Thinning.....	34

	2.6.6.2 High Thinning.....	35
	2.6.6.3 Mechanical Thinning.....	35
	2.6.7 Pruning.....	36
	2.6.8 Enrichment Planting.....	37
	2.6.9 Improvement Cut.....	38
	2.6.10 Fertilization.....	39
CHAPTER III	SILVICULTURE PRACTISE IN MALAYSIA.....	40
	3.1 Malayan Improvement Felling (1910 – 1932).....	40
	3.2 Malayan Refined Improved Felling (1933 – 1949).....	41
	3.3 Malayan Uniform System.....	44
	3.4 Selective Management System.....	46
	3.4.1 Characteristic of SMS.....	46
CHAPTER IV	DISCUSSION.....	48
	4.1 Distortion.....	48
	4.2 Development of Silviculture.....	49
	4.3 Silviculture Adaptation.....	50
	4.4 Tending Operation.....	52
	4.5 Usual Problem of Silviculture.....	52
CHAPTER V	CONCLUSION.....	56
	BIBLIOGRAPHY.....	57
	VITA.....	58

ABSTRACT

SILVICULTURE AND ITS PRACTISE IN MALAYSIA

By

Mohd Lokman Che Jusoh

October 2004

Silviculture is the art and science of tree production. It is based on an understanding of silvics, which is the study of forests and forest relationships. Silviculture is practiced on the assumption that a forest environment can be manipulated to make it more favorable to the growth of trees than the natural environment. Silviculture are been divided into two system and the application of this system are depend on the condition of the forest. In Malaysia, silviculture are been introduce when forest management are been modernize in 1930. There been a lot of modified to the usual silviculture system and the system are been replace according to the suitability to the forest. Silviculture are been applied in forest management system in Malaysia. Beginning with Malayan Improvement felling in 1910 to 1932 and then follow by Malayan Refined Improvement Felling (1933 – 1949). After that it's been replace with Malayan Uniform System in 1949 and today Selective Management System was used beginning at 1971. Silviculture is very important in forest management because it give a lot of benefit that can improve quality of production and also give benefit to nature.