ONE MAN TREE FELLING—BY POWER SAW. C. H. Kerr, N.D.F. Forestry Booklet No. 4. (n.p.).

Although this booklet was originally printed for use within the Forestry Division, Department of Agriculture, Northern Ireland, it is worthy of much wider circulation, and would, I feel sure, be welcomed by all those engaged in or responsible for felling Sitka Spruce with power saws, either in the State Forest Service or in the private sector.

It is a booklet of great practical value which deals with the safety rules to be observed; the tools to be used and the method to be employed in felling trees of various sizes from first thinnings to final fellings. It could be used to advantage in training workers in proper chain saw technique.

The importance of employing the proper felling technique in all situations cannot be over emphasized, and the author rightly states in the introduction that "although the actual felling operation takes a relatively short period of time compared with other

work, it is of vital importance for the subsequent working process. Therefore it should be carefully planned and accurately performed."

The chain saw is an inherently dangerous machine, and the operator should exercise great care at all times when using it. The booklet lists 18 safety rules which operators should observe. Two of these relate to the clothing to be worn, and the protective equipment to be used by the operator, and 16 of them relate specifically to the handling of the chain saw. The observance of these rules should reduce significantly the accident risks associated with using a chain saw.

Since there are many variable factors, there can be no standard or best felling method according to the booklet. Some of these factors are given as site conditions, size of tree, and crown density. The execution of the felling job having regard to these factors is described in some detail and the reader is taken through the various methods to be used in felling (1) Large trees, (2) Large thinnings in an overstocked stand, (3) Leaning trees, (4) Diseased trees, (5) First and second thinnings.

A major contributing factor to the economic extraction of timber is the proper presentation of the material and this proper presentation is to a large degree dependent on precise directional felling. Accordingly the description of "root spur" or "buttress" removal, of the cutting of directional sink or "mouth", and of the felling cut deserve careful study. The author lists four characteristics of a good felling method and these are worthy of note.

They do include however this sentence: "It is best for the thick butt of the trunk to lie in the direction of extraction".

This is questionable as there are situations where it may be best that the top of the tree lies in the direction of extraction.

The felling methods described in the booklet are illustrated by excellent drawings and good quality photographs.

It is a booklet which can be recommended to those involved in the business of timber harvesting.