

The Swiss method of "Working by Checks" is described in great detail and liberally illustrated with tabulated data, diagrams, etc., which have been converted into quarter girth, Hoppus feet and acres by the translator for the benefit of the British reader. The book concludes with extracts from an actual Management Plan.

The maintenance of the health and resistance to damage of the forest through sound silviculture is placed before all other considerations, and secondly the maximum and continuous production of valuable timber on every acre.

H. Knuchel maintains, and quotes data in support of his views, that these objectives are best achieved by a mixed, uneven aged forest managed by the check method. The clear-felling system, even-aged stands and above all monoculture on these principles are rejected and stand condemned by the data he presents.

The health and productivity of the forest is maintained by the Forester in the forest with the marking axe. He must hold the delicate balance between species and site, form and size classes, growing stock and increment. In this, the highest expression of the art of forestry, he is guided by an intimate knowledge of the locality and the results of periodic complete enumerations of his growing stock.

H. Knuchel is an authority on the indivisible arts of silviculture and forest management and, with the experience of more than a century of forestry practice at his disposal, his teachings cannot be ignored even in New Zealand where conditions are unfavourable for "Working by Checks."

The contrast is so striking between the small intensively managed forests of Switzerland and our vast Pine farms and between the two economic climates that many New Zealand foresters may decide to leave this excellent book on the shelf. This is a mistake. In fact I commend this book to our Pine farmers (and, above all, to politicians and commercially minded gentlemen) for the re-affirmation of the fundamental principles of good forestry practice found therein—principles which they are liable to subordinate to the short-term profit motive.

J.U.

**THE SELECTION OF TREE SPECIES**—By Mark L. Anderson.  
Oliver and Boyd, Edinburgh, 1950. 146 pp. Price 12/6d.

This book deals with the siting of species in afforestation in the British Isles. The first section classifies sites, on land that is likely to be available for forestry, in terms of the plant communities that exist there, the primary framework consisting of six fertility classes, each of which is subdivided according to the degree of available moisture. A second section deals with individual tree species, and

includes notes on range and importance, ecology, qualities and uses of timber, introduction and results obtained, scope for use and technique. In Part II Dr. Anderson indicates what groups of species are suited to the various sites, special attention being paid to their relative reaction to frost and exposure, and to economic considerations where alternatives exist. The whole book is the distilled essence of thirty years experience of species siting; it is clearly and simply written and will prove a valuable guide in afforestation in Britain.

It is the notes on individual species that will be of major interest to New Zealand foresters. Many of the species dealt with are of importance in our own exotic forestry; and we have long awaited authoritative and comprehensive information on exotic species of possible forest use, including those such as Sitka spruce, *Abies* spp. and Japanese larch which have not yet been sufficiently tried. Such a work would desirably go further than Dr. Anderson's and include remarks on spacing, thinning and regeneration technique and should of course be based on New Zealand experience. In the meantime, *The Selection of Tree Species* should go some way to fill this want. Some of the information, such as that on technique, is not applicable here, and it is strange to hear that radiata pine seed does not store well. But the notes on species and the results obtained will be of direct value in further assessment of some of the less familiar exotic species in this country. Perhaps of equal but more indirect importance is the emphasis on an ecological approach in classifying sites prior to afforestation.

H.V.H.

**THE FORESTER'S HANDBOOK**—By H. L. Edlin. Thames and Hudson, London, 1953. 395 pp., 35 photogravure plates, 12 line drawings. Price 35/- net.

So many changing facets of forestry and forest research are covered each year in leaflets, bulletins, professional journals, and the like that there is a real need to consider the whole, every so often, in terms of current forest practice. In the Forester's Handbook, the author, well known already for his works on British trees, woodland crafts, and wild life, has attempted this. The result is a handbook which the author may fairly claim will satisfy this need by its adequacy logical presentation, easy style, and obvious knowledge of the practice of forestry.

Chapters 1 and 2 describe in turn Britain's Woodland Estate, and Tree Growth and Structure. A chapter each on seed collection and storage, and Nursery Work follows. The author then passes on to discuss in four chapters the key to successful establishment and development of the forest crop (assessment of the site factors on the Planting Site, Preparation for Planting, Planning the New Crop, and Choice of Species). A minor error occurs on p. 114 where the author