tabulations from the point of view of genetical investigations. For the only realistic way of presenting genealogical information to a geneticist is on magnetic tape, every individual being listed together with his parents and such social, economic, and demographic information as may be required.

Dr Essen-Möller seems to have made some use of computers in preparing tabulations from his data, but the format of his tables is likely to appeal more to the demographer than the geneticist. He has eschewed the familiar parameters of the population geneticist, such as the Inbreeding Coefficient and the Coefficient of Relationship, and worked in the main with "connections" ("a single relationship of a proband to a relative") and "degrees of relationship" (the Coefficient of Relationship if only the principal relationship is recognised), both of which are summed and averaged freely: indeed, the "average degrees per connection" is encountered in Table XXIV, and has the value 0.212. Such a treatment may be descriptively advantageous for the demographer, but it is insufficiently exact for the geneticist.

The population is that of a rural part of Skåne at the key date of 1st July 1947, and comprises 2550 individuals. An attempt has been made to trace relationships arising from links which occurred up to a century and more before this date, and throughout his study the author has been very careful to estimate the completeness and reliability of his information. "The aim of the present investigation is to establish, up to a certain degree of relationship, the total general consanguinity prevailing in a geographically limited population on one particular day", and the author adds "this very type of data does not seem to have been as yet described in literature". The uninformed reader might take this to mean that such a detailed investigation of a population structure is unique, whereas in fact the recent contributions of Cavalli-Sforza, McKusick, Steinberg, and Morton (with, in each case, several colleagues) are of the same order of completeness, and the methodologies and techniques they use are considerably more advanced than Essen-Möller's.

The book is well-produced, and the few unusual word-forms will delight rather than irritate most native English-speaking readers ("ancestrial", "machinal" and "machinally", "vicanage", "mirrow"). There seems to be an error of calculation in Table X, where 5181.8125 should be 5281.8125.

To sum up: a thorough book on an important piece of work, but a book with a distinct aura of an earlier age in its methodological, technical, and statistical aspects.

A. W. F. Edwards

Department of Statistics, University of Aberdeen

BOOKS RECEIVED

- LA GÉNÉTIQUE DES POPULATIONS. Eugène Binder. Presses Universitaires de France. 1967. Pp. 126.
- ÄRFTLIGHETSLÄRANS URKUNDER. Ernst Nilsson. Bokförlaget Corona Lund. 1967. Pp. 160.

FUNCTIONAL DESIGN IN FISHES. R. McN. Alexander. Hutchinson University Library. 1967. Pp. 160. 10s. 6d. (Paperback), 25s. (Fullbound).

HARVESTING THE SUN: PHOTOSYNTHESIS IN PLANT LIFE. Anthony san Pietro, Frances A. Greer and Thomas J. Army. Academic Press, New York. 1967. Pp. 342. 60s.