PREFACE

About two years ago the League published a book of which Professor Gottfried von Haberler, now of Harvard University, was the author, under the title "Prosperity and Depression". The purpose of this book was to examine existing theories concerning the nature of what is currently termed the trade cycle, with a view to ascertaining what they had in common, the points at which differences of opinion arose and, in so far as possible, the causes of those differences. Its publication constituted the completion of the first stage of an enquiry into the nature and causes of the trade cycle that had been begun some years earlier. The second stage, as explained in the preface to Professor von Haberler's book, was to consist of an attempt "to confront these various theories with the historical facts—to subject them, in so far as those facts can be quantitatively expressed, to statistical analysis", and, in so far as they cannot be so expressed, to compare them with the recounted records of the past.

The present volume, entitled "Statistical Testing of Business-cycle Theories—A Method, and its Application to Investment Activity", is the first instalment of a brief series of pamphlets which it is proposed to issue in execution of one of the tasks involved by the second stage of the enquiry. It has been prepared by Professor J. Tinbergen, who has been seconded for this purpose from the Central Statistical Bureau of the Netherlands. The primary object of this volume is to explain the statistical method which—subject to any suggestions that may be received—it is proposed to employ. With a view to illustrating this method—known as multiple correlation analysis—three examples of its application to economic phenomena have been given; these examples relate to fluctuations in total investment, residential building and net investment in railway rolling-stock.

The results obtained in the elaboration of these examples will, it is believed, prove of interest to students of the business cycle; but those results are in fact only incidental to the primary objects of this publication, which are, as I have stated, to explain the system of statistical analysis employed and, it is hoped, to arouse discussion concerning it that may prove of value to those in charge of the enquiry.

The manuscript of this volume has already been sent to a number of statisticians in different countries for comment, and two meetings of economists and statisticians have been held at which the assumptions made and methods adopted have been discussed. Thanks are due to all those who have helped by their criticisms and suggestions, and especially to Professor D. H. Robertson, who has ungrudgingly put his time at the disposal of the League for the purpose of consultation with Professor Tinbergen on the economic issues involved.

This introductory volume on method will be followed shortly by the first of the proposed analytical studies, which will be devoted to post-war business cycles in the United States of America. It is hoped that, before that study is completed, further comments and suggestions concerning the method here explained may be received either through Press reviews or directly from those who are interested and competent in this primary problem of methodology.

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Geneva, January 1939.